

ASEAN-India Development and Cooperation Report 2021

Avenues for Cooperation in Indo-Pacific





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Foreword

Ambassador (Dr.) Mohan Kumar

Chairman, RIS

It gives me immense pleasure to write the Foreword of the *ASEAN-India Development and Cooperation Report* 2021. RIS has continued with the tradition of coming out with this Report since 2015 and the ASEAN-India Centre (AIC) of the RIS deserves credit for the same.

It is now common knowledge that ASEAN is the lynchpin of India's Act East Policy. Both India and ASEAN are strategic partners and this strategic partnership will have a profound impact on the future of Asia. In this context, it is useful to note that both ASEAN and India share a common vision for both Asia and the Indo-Pacific region. An Asia which is multipolar and an Indo-Pacific region which is open, free, inclusive and rules-based is in the vital interest of both India and ASEAN. The principle of ASEAN-centrality in the concept of Indo-Pacific is by now well accepted by all stakeholders.

The ASEAN-India Development and Cooperation Report 2021 (AIDCR 2021) has provided us new ideas and suggestions in deepening the ASEAN-India Strategic Partnership as well as Indo-Pacific relations. In the backdrop of Covid-19 and the unfolding global order, the AIDCR 2021 is aimed at providing a comparative analysis of the ASEAN-India economies; examine the impact and implications of ASEAN-India integration; assess policy priorities, effectiveness, implementation imperatives and challenges; and discuss the themes central to the economic sustainability of the region, including public and foreign policy, trade facilitation, e-commerce and digital connectivity, energy cooperation and opportunities in the manufacturing and services sectors.

This Report has discussed several key issues which are relevant from the point of view of deepening the ties between India and ASEAN. In particular, it spells out the opportunities and outlines the challenges to unlock the ASEAN-India trade and regional value chain potential in the post-Covid-19 period. It also takes into account the discussions held in the recently held ASEAN-India Network of Think-Tanks (AINTT) roundtable.

The AIDCR is a flagship publication of the ASEAN-India Center (AIC) of the RIS. The very first report came out in 2015 and since then, the report has had a deep impact on literature and research work among scholars, diplomats and the think-tank community.

I would like to record my appreciation of the efforts that have been made by my senior colleague, Dr. Prabir De, and his Team, in bringing out this Report.

I am confident that this publication will be a valuable reference point for policymakers, academics and scholars.

Mohan Kumar

Preface

Prof. Sachin Chaturvedi

Director General, RIS

The present edition of the ASEAN-India Development and Cooperation Report 2021: Avenues for Cooperation in Indo-Pacific is being launched at a time when Covid-19 has spread its vicious tentacles all over the world and no respite forthcoming. The unprecedented health, safety and economic calamity resulting from the pandemic has shaken the whole world, calling for immediate course correction for the socio-economic and healthcare cooperation and integration at bilateral, regional, sub-regional and multilateral levels. This process calls for moving forward on the basis of the true philosophy of 'One World'. Fortunately, there is the strong inclusive agenda of Sustainable Development Goals to guide us. Thus, there is an urgent need to follow with true spirit and utter commitment the directive principles as enshrined in the Agenda 2030.

As is well known, RIS has always been at the forefront since 1992 in providing effective analytical support for deepening socio-economic integration among India and ASEAN member countries. The present Report is a firm step in that direction with complete emphasis on strengthening ASEAN-India cooperation in view of the insurmountable challenges thrown up by the Pandemic at various fronts.

The Report has 14 chapters that examine in depth the different aspects of the issues related to growth and development challenges in the Covid-19 era; emerging trends and new challenges in ASEAN-India trade relations; such as trade in services; production networks; non-tariff measures (NTMs); E-commerce and digital connectivity; trade corridors; energy cooperation; dealing with Corona pandemic; development partnership; people-to-people linkages; maritime security cooperation; and Indo-Pacific cooperation.

Apart from examining in depth these broad themes, the Report in view of India's 'Act East Policy' also makes specific recommendations and suggestions for way forward towards moving in the desired direction for robust ASEAN-India partnership. As per the vision, strong ASEAN-India ties are also vital for development of our North-East Region. Further, enhancing and boosting ASEAN-India economic cooperation is imperative for our engagements with: BIMSTEC and Mekong-Ganga Cooperation processes, CLMV and Indo-Pacific.

I convey sincere thanks to the Ministry of External Affairs, Government of India for their support and also to RIS Governing Body and Chairman, RIS for their guidance. I also take this opportunity to compliment the eminent experts, my senior colleague Dr Prabir De, Coordinator, ASEAN-India Centre at RIS, and his team for preparing this valuable Report. It would surely be found immensely useful by policy makers, academics, practitioners and stakeholders.

Sachin Chaturvedi

Message from Editor

Dr. Prabir De

Professor, AIC, RIS

ASEAN and India are bound together by their shared culture and heritage. Relation with ASEAN is one of the cornerstones of India's foreign policy. India has been increasingly engaged with ASEAN, and that is also growing rapidly. While initial months of the Covid-19 pandemic witnessed a deceleration of trade and investment between ASEAN and India, India's engagements with ASEAN nations in coping with the recent challenges have paved the way for friendship, good neighbourliness, peaceful co-existence and prosperity in the region. Also, the future looks promising as there is a clear sign of revival of trade in goods between ASEAN and India.

The steady and stable partnership between India and ASEAN has lent credence to the huge potentials for economic prosperity. As global partnerships alter, greater economic integration between India and ASEAN receives further momentum. In that cyclical order, deeper integration between India and ASEAN in all fields is likely to provide a strong impetus for the larger economic integration, particularly in the post-Covid-19 world. A stronger ASEAN-India partnership would also strengthen multilateralism, which the world is badly needed at the moment, and work towards building a common position, voice, and visibility in building Indo-Pacific.

The ASEAN-India Development and Cooperation Report 2021: Avenues for Cooperation in Indo-Pacific (AIDCR 2021) is written to explore further scope and opportunities in deepening the ASEAN-India Strategic Partnership. One of the objectives of the Report is to bring together ideas, perspectives and experiences as part of our efforts to promote ASEAN-India integration in the context of Indo-Pacific with particular focus on current challenges posed by the Covid-19 pandemic.

The freshly written 15 chapters including an Introduction of this Report examine the dimension of ASEAN-India relations, the challenges they bring, and the regional cooperative mechanisms that could provide solutions to them. It also underlines the need for deeper cooperation between ASEAN and India in search of collective solutions to these challenges and the collective path for a resilient recovery. The major issues are divided into four broad areas: (i) economic performance, trade, investment, (ii) trade facilitation and connectivity, (iii) sectoral cooperation, and (iv) Indo-Pacific cooperation. It also adds to the conceptual issues of Indo-Pacific in general and the Indo-Pacific Oceans Initiative (IPOI) in particular.

This second edition of AIDCR is very unique in the sense that there was almost no attempt in the past to document a comprehensive perspective on ASEAN-India relation, particularly in view of the changing global order. This Report intends to fill up that gap and enrich the literature. It also carries important messages for the forthcoming 17th ASEAN-India Summit and 15th East Asia Summit to be held in November 2020.

The Report has benefitted from the discussion and feedback received through several webinars conducted between May to September 2020 on various aspects on ASEAN-India relation and Indo-Pacific cooperation by the ASEAN-India Centre (AIC) at RIS. I am thankful to all speakers and participants of these webinars for their valuable.

Finally, I thank my colleagues Dr. Durairaj Kumarasamy and Ms Sreya Pan for their sincere research assistance in editing the volume and their deep commitment to the team work, and our journey that started just before the Covid-19 outbreak in India to complete this publication. I thank all external contributors of this Report. Not only worked under difficult situation, they were also generous to update their chapters voluntarily. I also acknowledge the cooperation received from Mr Tish Malhotra and Mr Sachin Singhal in publishing this volume.

I am sure this *AIDCR* 2021 will be invaluable to scholars, researchers, practitioners and policy-makers.

Prabir De

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The ASEAN–India Development and Cooperation Report: Avenues for Cooperation in Indo-Pacific (AIDCR 2021) has been prepared under the guidance of Dr Prabir De, Professor, ASEAN–India Centre (AIC), Research and Information System for Developing Countries (RIS), New Delhi. He is also the editor of this Report. Dr Durairaj Kumarasamy and Ms Sreya Pan are contributors of different chapters and have extended valuable research and administrative support. We are also thankful to all contributors for their valuable contributions in this Report.

In particular, we are grateful to Dr. Mohan Kumar, Chairman, RIS and Prof. Sachin Chaturvedi, Director-General, RIS for their encouragement and cooperation in publishing the Report.

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The AIDCR 2021 benefited from the discussions with distinquished delegates and speakers, who participated in several AIC webinars on ASEAN-India relations and Indo-Pacific Cooperation between May to September 2020. Their valuable inputs and recommendations are included in the respective chapters suitably.

We hope the findings of this *AIDCR 2021* will help India and ASEAN in strengthening the relations and designing new avenues for cooperation in Indo-Pacifc. It also carries important messages for the forthcoming 17th ASEAN-India Summit and 15th East Asia Summit to be held in November 2020. The ASEAN-India Centre (AIC) at RIS stands ready to contribute to the fulfillment of the ASEAN-India Strategic Partnership.

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Views expressed in this publication are those of the authors of the report and not the views of the Governments of India, ASEAN countries, Research and Information System for Developing Countries (RIS), ASEAN-India Centre (AIC) or the ASEAN Secretariat. Usual disclaimers apply.

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- 5 **ASEAN-India Investment Relations: Emerging Trends and Prospects** *Durairaj Kumarasamy and Komal Biswal*
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List of Abbreviations

3T Testing, Tracking and Treating
4IR Fourth Industrial Revolution

AANZFTA ASEAN-Australia-New Zealand Free Trade Area
AARDO Afro-Asian Rural Development Organization
ACCC ASEAN Connectivity Coordinating Committee

ACCSQ ASEAN Consultative Committee on Standards and Quality

ACDM ASEAN Committee on Disaster Management

ACE ASEAN Centre for Energy

ACMECS Ayeyawady-Chao Phraya-Mekong Economic Cooperation Strategy

ACTS ASEAN Customs Transit System

ADB Asian Development Bank

ADIF ASEAN Digital Integration Framework ADMM-Plus ASEAN Defence Ministers' Meeting Plus

AEC ASEAN Economic Community

AECA ASEAN Energy Cooperation Agreement
AEGFS ASEAN Experts Group on Food Safety

AEM ASEAN Economic Ministers

AEP Act East Policy

AEPSS ASEAN Emergency Petroleum Sharing Scheme

AFOC ASEAN Forum on Coal
AHS Effectively Applied

AIBC ASEAN-India Business Council

AIBSN ASEAN-India Business School Network

AIC ASEAN-India Centre

AIEF ASEAN-India Energy Forum

AIF ASEAN India Fund AIFTA ASEAN-India FTA

AIIA ASEAN-India Investment Agreement

AIJCC ASEAN-India Joint Cooperation Committee
AINTT ASEAN-India Network of Think Tanks
AIOUN ASEAN-India Open Universities Network
AIPA ASEAN Inter-Parliamentary Assembly

AISTDF ASEAN India S&T Development Fund
AITIGA ASEAN-India Trade in Goods Agreement
AITISA ASEAN-India Trade in Services Agreement

AIU Association of Indian Universities
AIUN ASEAN-India University Network
AIWGST ASEAN India S&T Working Group

AJCEP ASEAN-Japan Comprehensive Economic Partnership

AMAF ASEAN Ministers of Agriculture and Forestry

AMEM ASEAN Ministers of Energy Meeting

AMS ASEAN Member States

AOIP ASEAN Outlook on Indo-Pacific

APAEC ASEAN Plan of Action for Energy Cooperation APCT ASEAN Promotional Chapter for Tourism

API Active Pharmaceutical Ingredient

APLAC Asia-Pacific Laboratory Accreditation Cooperation

APSA ASEAN Petroleum Security Agreement

APT ASEAN Plus Three

APTA Asia-Pacific Trade Agreement

ARAI Automotive Research Association of India

ARF ASEAN Regional Forum

AWSC ASEAN Wide Self-Certification

ASC ASEAN Studies Center

ASCOPE ASEAN Council for Petroleum

ASEAN +3 FETN ASEAN Plus Three Field Epidemiology Training Network

ASEAN Association of Southeast Asian Nations

ASITAT ASEAN Sustainable Tourism Assessment Tool

ASSIST ASEAN Solutions for Investments, Services, and Trade

ASSOCHAM The Associated Chambers of Commerce of India

ASWG ASEAN Working Group

ATCCT ASEAN Tourism Crisis Communication Team

ATF ASEAN Tourism Forum

ATFC ASEAN Task Force on Codex

ATIGA ASEAN Trade in Goods Agreement
ATM+India ASEAN and India Tourism Ministers

AU African Union

AUN ASEAN University Network

AWGFI Ad-hoc Working Group on Food Irradiation

B2B Business to Business

BG Broad Gauge

BIMSTEC Bay of Bengal Initiative for Multisectoral Technical and Economic

Cooperation

BIS Bureau of Indian Standards
BIT Bilateral Investment Treaty
BPO Business Process Outsourcing

BRI Belt and Road Initiative
BRO Border Roads Organisation

BV Business Visitor

CAFTA China-ASEAN Free Trade Area
CARC Common Archival Resource Centre

CARICOM Caribbean Community

CBIC Centre Board of Indirect Taxes and Customs
CCFC Customs Clearance Facilitation Committee

CCG Chinese Coast Guard
CCT Clean Coal Technologies

CECA Comprehensive Economic Cooperation Agreement

CELT Centres for the English Language Training

CEPA Comprehensive Economic Partnership Agreement

CEPT Common Effective Preferential Tariff

CESDT Centres of Excellence in Software Development & Training

CFS Container Freight Station

CFSAI Container Freight Stations Association of India

CGE Computable General Equilibrium
CII Confederation of Indian Industry

CLMV Cambodia, Lao PDR, Myanmar, Vietnam

CLV Cambodia, Lao PDR, Viet Nam
CME Constructive Maritime Engagement

COO Certificate of Origin

COPE Committee on Publication Ethics

CPTPP Comprehensive and Progressive Agreement for Trans-Pacific

Partnership

CR Coverage Ratio

CRS Computer Related Services
CSS Contract Services Suppliers

CSSTEAP Center for Space Science and Technology Education in Asia and the

Pacific

CUES Code for Unplanned Encounters at Sea

DCA Defence Cooperation Agreement

DGCA Directorate General of Civil Aviation

DIFAP Digital Integration Framework Action Plan
DIPP Department of Industrial Policy and Promotion

DOTS Direction of Trade Statistics

DP Dialogue Partners
DPD Direct Port Delivery

DST Department of Science and Technology
DTTA Double Taxation Avoidance Agreement
EAMF Expanded ASEAN Maritime Forum

EAS East Asia Summit

EAS-EMM East Asia Summit Economic Ministers' Meeting

ECS Economic Cooperation Strategy

EDC Entrepreneurship Development Centre

EDI Electronic Data Interchange

EE&C-SSN Energy Efficiency and Conservation Sub-sector Network

EEPC Engineering Export Promotion Council

EEZ Exclusive Economic Zone
EIC Export Inspection Council

ERIA Economic Research Institute for ASEAN and East Asia
ESCAP Economic and Social Commission for Asia and the Pacific

EU European Union

FDI Foreign Direct Investment

FI Frequency Index

FICCI Federation of Indian Chambers of Commerce and Industry

FIEO Federation of Indian Export Organisations
FIPB Foreign Investment Promotion Board

FLM Friends of the Lower Mekong

FSSAI Food Safety & Standards Authority of India

FTA Free Trade Agreement

G2G Government to Government
GAIL Gas Authority of India Limited

GATS General Agreement on Trade in Services

GDP Gross Domestic Product
GMF Global Maritime Fulcrum
GMS Greater Mekong Subregion

GoI Government of India
GST Goods and Services Tax
GVC Global Value Chain

HADR Humanitarian Assistance and Disaster Relief HAPUA Heads of ASEAN Public Utilities Authorities

HCQ Hydroxychloroquine HS Harmonized System

IAI Initiative for ASEAN Integration ICC Indian Chamber of Commerce

ICCR Indian Council for Cultural Relations

ICES Indian Customs EDI System

ICGIndian Coast GuardICPIntegrated Check-PostICTIntra-Corporate Transferee

IEC International Electro-technical Commission

IFC-IOR Information Fusion Centre for Indian Ocean Region

IICB Indonesian Investment Coordination Board

IIM Indian Institute of Management
IIT Indian Institute of Technology

ILAC International Laboratory Accreditation Cooperation

IMAC Integrated Management and Analyses Centre

IMF International Monetary FundIMT India-Myanmar-ThailandIOC Indian Oil Corporation

IONSIndian Ocean Naval SymposiumIORAIndian Ocean Rim Association

IOR-ARC Indian Ocean Rim Association for Regional Cooperation

IPCS Institute of Peace and Conflict Studies

IPOI Indo-Pacific Oceans Initiative

IPPC International Plant Protection Convention

ISA International Solar Alliance
ISC Information Sharing Centre

ISO International Organization for Standardization
ISPM International Standards for Phytosanitary Measure

IT Information Technology
ITE International Travel Expo

ITEC Indian Technical and Economic Cooperation
ITeS Information Technology-enabled Services

IWT Inland Water Transport

JAEI Journal of Asian Economic Integration
JICA Japan International Cooperation Agency

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JV Joint Venture

KOICA Korea International Cooperation Agency

L&T Larsen & Toubro

LCS Land Customs Station

LMI Lower Mekong Initiative

LNG Liquefied Natural Gas

LPCO Licenses/Permits/Certificates/Other Authorization

LPD Landing Platform Dock
LPG Liquefied Petroleum Gas

LTTD Low-Temperature Thermal Desalination

MDA Maritime Domain Awareness

MDoNER Ministry of Development of North Eastern Region

MECC Maritime Enforcement Coordination Center

MEF Minimum Essential Force
MFN Most Favoured Nation

MGC Mekong-Ganga Cooperation

MIEC Mekong-India Economic Corridor

MNC Multinational Company
MNE Multinational Enterprise

MNRE Ministry of New and Renewable Energy

MOF Ministry of Finance

MOU Memorandum of Understanding
MPAC Master Plan on ASEAN Connectivity
MRA Mutual Recognition Agreement

MRC Mekong River Commission

MSME Micro, Small and Medium Enterprise

MVA Motor Vehicle Agreement

MW Megawatt

NABL National Accreditation Board for Testing and Calibration

Laboratories

NCWC National Coast Watch Center

NDMA National Disaster Management Authority

NEC-SSN Nuclear Energy Cooperation-SSN

NEP New Educational Policy
NER North East Region

NHIDCL National Highway and Infrastructure Development Corporation

Limited

NIH National Institute of Hydrography
NMA National Maritime Authority

NMCC National Maritime Coordination Centre

NMF National Maritime Foundation

NMSPoC National Maritime Security Point-of-Contact

NMSS National Maritime Security System

NOC No Objection Certificate
NPP Nuclear Power Plant

NRL Numaligarh Refinery Limited

NTFC National Transport Facilitation Committee

NTM Non-Tariff Measure

NTO National Tourism Organisation

OECD Organisation for Economic Co-operation and Development

OIE World Organisation for Animal Health

OP Operating Procedure
OVL ONGC Videsh Limited
P&C Parts and Components

PCA Permanent Court of Arbitration
PCR Polymerase Chain Reaction
PDF Project Development Fund

PG Post-Graduate

PGA Participating Government Agency

PM Prime Minister
POA Plan of Action
POC Point of Contact

PPA Power Purchase Agreement
PPE Personal Protection Equipment

QCI Quality Council of India QIP Quick Impact Projects

R&D Research and Development

RBI Reserve Bank of India

RCA Revealed Comparative Advantage

RCEP Regional Comprehensive Economic Partnership

ReCAAP Regional Cooperation Agreement on Combating Piracy and Armed

Robbery against Ships in Asia

RFID Radio-Frequency Identification

RGT Regasification Terminal

RHCC Regional HADR Coordination Centre

RIS Research and Information System for Developing Countries

RITES Rail India Technical and Economic Service

RMC Ready Mixed Concrete

RMCMA Ready Mix Concrete Manufacturers Association

ROO Rules of Origin

RSN Royal Singapore Navy

SAARC South Asian Association for Regional Cooperation
SCAAP Special Commonwealth African Assistance Programme

SCM Supply Chain Management

SCRI Supply Chain Resilience Initiative
SDG Sustainable Development Goal

SDO Standards Developing Organizations

SEZ Special Economic Zone

SME Small and Medium Enterprise SOM Senior Officials' Meeting

SOP Standard Operating Procedure

SPS Sanitary and Phytosanitary Measures

SS-FSI Sushma Swaraj Foreign Service Institute

SWIFT Single Window Interface for Facilitating Trade

TAGP Trans-ASEAN Gas Pipeline

TBS Trap Barrier System

TCIL Telecommunications Consultant India Limited

TFA Trade Facilitation Agreement

TH Trilateral Highway

TIPs Treaty of Investment Promotion

TLH Trilateral Highway

T-MVA Trilateral Motor Vehicle Agreement

TPP Trans-Pacific Partnership
TWF Trade Facilitation Agreement
U2U University to University

UG Under-Graduate

UGC University Grants Commission

UNCITRAL United Nations Commission on International Trade Law

UNCLOS United Nations Convention on the Law of the Sea

UNCTAD United Nations Conference on Trade and Development

UNESCAP United Nations Economic and Social Commission for Asia and the

Pacific

US United States
VAT Value-Added Tax

VITM Vietnam International Travel Mart

VSNL	Videsh Sanchar Nigam Limited
WDI	World Development Indicators
WDR	World Development Report
WoS	Wholly-Owned Subsidiaries

WPNS Western Pacific Naval Symposium

WTO World Trade Organization

Executive Summary

SEAN and India are bound together by their shared history, culture and civilisation. Relation with ASEAN is one of the cornerstones of India's foreign policy. There has been steady progress in the ASEAN-India relation since the Look East Policy (LEP) was introduced in 1992. India's relation with ASEAN has also received further momentum through the Act East Policy (AEP), which was inducted in 2014.

ASEAN-India partnership has many dimensions, rich experiences and witnessed 'least' integration to 'best' integration over time. In 2018, ASEAN and India commemorated 25 years of dialogue partnership and 15 years of Summit level partnership. The Commemorative Summit, attended by the Leaders from all the 10 ASEAN countries, came out with the *Delhi Declaration*, the guiding roadmap of ASEAN-India partnership. Today, the ASEAN-India Strategic Partnership has become the foundation of the emerging Indo-Pacific. The Indo-Pacific has obtained renewed vibrancy when ASEAN, in June 2019, and India, in November 2019, came out with their respective Indo-Pacific visions, namely, the ASEAN Outlook on Indo-Pacific (AOIP) and the Indo-Pacific Oceans Initiative (IPOI), respectively. In the same year, India's offer of 1000 scholarships to do PhD in Indian IITs was introduced, thereby adding further momentum to the ASEAN-India relation as well as Indo-Pacific.

Today, ASEAN and India face a common challenge to save their economies from the devastation of the Covid-19 pandemic. Some of the major challenges resulting from the pandemic are rising poverty, falling health and nutrition, declining trade and investment flows, disruption of supply chains, and travel and tourism – within and between countries. The need for stronger multilateral cooperation is, therefore, felt *sine qua non* to not only containing the pandemic and mitigate its social and economic effects but also bringing back the world economy to the growth path. It also underlines the need for deeper cooperation between ASEAN and India in search of collective solutions to these common challenges and the collective path for a resilient recovery.

Moving from cooperation to integration, there is a need to jointly address the challenges to strengthening the partnership between ASEAN and India in various fields. Understanding the core challenges that result in deeper integration requires better understanding the underlying dimensions: enhancing macroeconomic and financial stability; trade integration and investment promotion; higher competitiveness and innovation; connectivity improvement; sharing resources and knowledge; supporting equitable growth; strengthening regional institutions; among others. ASEAN-India cooperation is the key to promote economic stability, competitiveness, growth and integration in the region.

Setting in such a challenging phase of the relation, the *ASEAN-India Development and Cooperation Report 2021: Avenues for Cooperation in Indo-Pacific* (AIDCR 2021) explores renewed and promising scope and opportunities in deepening the ASEAN-India Strategic Partnership. One of the objectives of this Report is to bring together ideas, perspectives and experiences as part of our efforts to promote ASEAN-India integration in the context of ASEAN Economic Community (AEC) with particular focus on current challenges unleashed by the Covid-19 pandemic.

The ASEAN-India Centre (AIC) at RIS has produced the first issue of the AIDCR in 2015. In the last five years, ASEAN-India relations have moved upwardly. The second edition of the AIDCR 2021, therefore, provides a comparative analysis factoring the developments in last five years of the global and regional economies; examines the impact and implications of ASEAN-India integration in view of emerging Indo-Pacific; assesses policy priorities, effectiveness, implementation imperatives and challenges; and discusses themes central to the economic sustainability of the region, including public and foreign policy, trade facilitation and connectivity, energy cooperation, opportunities in the manufacturing and service sectors and digital connectivity. Most specifically, the Report provides insight into the work of regional cooperation and integration and suggests implications for both policy and programme interventions to strengthen the relations and introduces more academic substance into the policymaking process. This Report presents comprehensive regional cooperation and integration issues, not only on the partnership between ASEAN and India but also on East Asia Summit (EAS) Group relations.

This second edition of AIDCR 2021 is very unique in the sense that there was no major documented attempt in the past by think-tanks to bring a comprehensive perspective on the ASEAN-India relation, particularly in view of the ongoing global uncertainties. Therefore, this Report intends to fill that gap and enrich the literature. It has a total of 14 chapters, written for this Report. The chapters that follow examine the dimension of ASEAN-India relations, the challenges they bring, and the regional cooperative mechanisms that could provide solutions to them. The major issues are divided into four broad areas: (i) economic performance, trade, investment and value chain, (ii) trade facilitation and connectivity, (iii) sectoral cooperation, and (iv) Indo-Pacific cooperation.

Chapter 1: Growth Outlook and Key Development Challenges in the Covid-19 Period

The prime objective of this chapter is to analyse the growth outlook and development challenges for ASEAN and India in the Covid-19 period. A health crisis has generated an economic crisis globally. Some of the common economic devastations are noted as disruptions in the financial market and supply chains, and uncertainties in global trade, among others. The economic crisis triggered by Covid-19 hit hard most of the countries across the world. The developing world has been disproportionately impacted by the pandemic, especially those countries which are an integral part of the global value chains. The IMF has reported that the impact of Covid-19 on economic growth is even worse than the global financial crisis of 2007-08, and the global growth is expected to contract by 4.4 per cent in the year 2020, and 5.2 per cent in 2021. According to the IMF, the cumulative loss in output relative to the pre-pandemic projected path is expected to grow to US\$ 28 trillion by 2025. Therefore, the pandemic-driven global crisis is going to have long-lasting effects on economies including ASEAN economies and India.

ASEAN and India must invest in safeguarding economies from Covid-like crisis in the future. ASEAN and India have been witnessing high economic shock, which has shaken the economies of the region, both internally and externally. In this uncertain period, ASEAN and India have a common challenge to mobilise the needed resources, revive the domestic production, promote MSMEs, stabilise the macroeconomic situation, etc. At the same time, ASEAN and India have to strengthen and re-establish the supply chains, manage trade balance and capital flows, monitor foreign exchange reserves, etc. to address the external shocks. Under such a changing environment, ASEAN and India have newer developmental challenges, which have opened new opportunities, and scope of joint efforts to upscale trade and investment relations, engagement in traditional and non-traditional areas of cooperation (i.e., ICT, Digital Innovation, Industrial Revolution 4.0, etc.). ASEAN and India have announced fiscal and monetary policy measures to recover from an immediate health crisis and preserve lives and also initiated socio-economic programmes to avoid economic contraction. ASEAN and India should cooperate and work together to support increased production and ensure that the resources are optimally utilized. Besides, upholding a stable rules-based

international trading system would help to move towards stable economic recovery. In this context, the emerging architecture on 'Indo-Pacific' has a potential opportunity to foster economic relations, strengthen regional capacity and capability to recover from the Covid-19 crisis.

Chapter 2: ASEAN-India Trade Relations: Emerging Trends, Challenges and Opportunities

The world has witnessed a sharp decline in economic growth and trade, more particularly in the first half of 2020. World trade is expected to fall by 9.2 per cent in 2020 due to the Covid-19 pandemic and rise by 7.2 per cent in 2021. The recent release of growth forecast of IMF indicates that a rebound is expected in 2021 in developing Asia. Both developing Asia and advanced economies have weakened tremendously in trade due to the pandemic and also exposed to the slowing regional integration and interdependence with the global economy. Global trade was already slowing down before the pandemic started due to trade tensions and declining economic growth. In this context, this chapter analyses the trends of ASEAN and India trade relations amid the Covid-19 pandemic. Besides, ten-year completion of ASEAN-India FTA (AIFTA) has called for reviewing AIFTA and to explore new opportunities. Given that ASEAN and India are important driving forces of the emerging global order, this chapter presents the policy recommendations and a way forward to tap the potential opportunities to trade and enhance the regional integration in the Indo-Pacific.

India has taken steps towards economic integration, particularly with Southeast and East Asian countries. In the post-FTA period, the volume of trade in goods became asymmetric in favour of ASEAN, while India's exports have not witnessed a significant rise. Both India and ASEAN have substantially high untapped trade potential, which has remained unrealized due to barriers to trade and structural differences of the economies. The gap between actual and potential trade may widen due to pandemicled recession. While India could be emerging as the alternative market for ASEAN, particularly in the post-Covid-19 period and vice-versa, both would need to upgrade its manufacturing capabilities and build regional production networks as these constitute an integral component of intra-Southeast Asian trade. Finally, given the unfolding Indo-Pacific order, both ASEAN and India have to accelerate the pace of their economic reform processes to participate in and benefit from their trade creation possibilities. Besides, to strengthen trade relations, ASEAN and India should address the issues related to sensitive lists, non-tariff measures, and trade facilitation measures, among others. A review of ASEAN-India FTA in goods should, therefore, lead to facilitate more trade, generate jobs and reduce poverty.

Chapter 3: India-ASEAN Trade in Services: Prospects and Challenges

India is among the world's top 10 exporters and importers of commercial services. Given the growing importance of services in India's domestic economy as well as in international trade, India has offensive interests in various services, and therefore, services are becoming an important part of India's effort to economically integrate with ASEAN, though the initial focus in such integration was only on goods. The ASEAN-India Trade in Goods Agreement (AITIGA) entered into force on 1 January 2010, but the ASEAN-India Trade in Services Agreement (AITISA) was signed in 2014. This chapter aims at analysing India's services trade with the ASEAN region and how India's services trade interests are taken into consideration by ASEAN countries in the ASEAN-India Services Trade Agreement and the services trade FTAs signed between India and two of ASEAN members, namely, Singapore and Malaysia. It also discusses the opportunities and challenges in services trade between India and ASEAN in the current environment of the global pandemic.

Given its skilled human resources and buoyant services sector, India has a competitive advantage in services as compared to the ASEAN. The low share of ASEAN countries in India's services exports

is partly a reflection of low ambitions in the existing agreements, regulatory and cultural barriers and discriminatory standards applied by ASEAN countries for Indian service providers. In a post-Covid-19 world, the sensitivities towards globalization and international trade are likely to increase at a global level and India and ASEAN will not remain untouched from such sensitivities playing out. In particular, Mode 4 related sensitivities are likely to increase, which is already the most restrictive and sensitive mode in the AITISA. Therefore, given Mode 4's importance in India's services trade, India needs to include Mode 4 safeguard provisions whenever the review of this FTA takes place in future. India may also consider alternative approaches, such as negotiating bilateral labour agreements either with individual ASEAN countries or ASEAN as a bloc allowing the movement of natural persons in specific sectors or activities, for predetermined durations and with dedicated return mechanisms. Nonetheless, the pandemic has also created new opportunities for enhancing services trade between India and ASEAN, which India could leverage with suitable proactive steps, such as focusing on Mode 1 based services exports and address issues of data protection, liability, and infrastructure.

Chapter 4: ASEAN-India Investment Relations: Emerging Trends and Prospects

The Asia-Pacific region is the largest destination and source of foreign direct investment (FDI) globally, of which ASEAN and India have introduced several important policy reforms over the last few decades to attract FDI and gain investors' confidence. Due to the Covid-19 outbreak, there has been a slow down in the flow of FDI across the world. UNCTAD reported that the forecast for global FDI flows would decrease by upto 40 per cent (i.e., US\$ 1 trillion) in 2020 from US\$ 1.54 trillion in 2019. FDI is forecasted to decrease by 5 to 10 per cent in 2021 and show the recovery slowly from 2022 onwards. The impact of Covid-19 pandemic is more severe in Developing Asia due to supply chain disruptions, where most of the FDIs are in value chain intensive industries. This chapter analyses the trends in investment, investment barriers and policy measures to explore the investment opportunities between ASEAN and India. The chapter also looks into emerging investment opportunities amid Covid-19 outbreak and also potentials FDI and GVCs in ASEAN and India, given that multinational firms play a significant role in bringing international resources, technology sharing and production networking across countries, which could generate enormous benefits to MSMEs in the region. Besides, the chapter also presents some important policy recommendations to promote investments between ASEAN and India.

India's steady rise in FDI inflows and outflows with ASEAN and other countries in the region highlights that India offers potential investment opportunities. To further strengthen the investment linkages, ASEAN and India may come up with cooperative and collaborative mechanisms in the digital economy and pharmaceutical sectors to gain from comparative efficiency in the new export areas, which are based on digital technologies such as education, telemedicine, healthcare, medical tourism, entertainment, etc. Besides, the pandemic has potentially altered the trade and investment paradigm by disrupting global value chains and trade. India and ASEAN have the potential to take advantage of the new value chain opportunities by making way for a new sustainable supply chain in the region. ASEAN and India should cooperate towards designing appropriate policies, simplifying investment regimes and streamlining investment processes to further strengthen the value chain and investment linkages. Both ASEAN and India can attract FDI in the new export areas if we show the potential and comparative advantage with the rest of the world.

Chapter 5: ASEAN-India Production Networks in Covid-19 Times

The impact of supply chain disruptions due to Covid-19 pandemic is multidimensional due to high degree of integration and interdependence of value chains across the countries. The outbreak of Covid-19 has deeply disrupted the supply chain networks that have affected the supply of intermediate inputs

as well as final goods across the world. The Covid-19 pandemic and subsequent measures have led to restricting the flow of goods and services between the countries. This chapter discusses the impact of Covid-19 outbreak on ASEAN-India value chain integration and identifies the potential sectors for value chain linkages between ASEAN and India in the post-Covid-19 period. The chapter also addresses the barriers to value chain and investigates the impact of Covid-19 on different types of GVC participation in ASEAN and India.

The pandemic has also created an opportunity to promote trade and investment by realigning the supply chains. Relocation of industries away from China would create a new wave of industrialisation. Both ASEAN and India have the potential opportunities in terms of attracting FDI that are planning to relocate the firms in ASEAN and India and also new MNCs, which look for sustainable value chains across the region and to avoid high dependency on one single country. Both ASEAN and India can leverage the emerging scenario and support each other to build new and resilient supply chains. However, to explore this opportunity, both ASEAN and India must upgrade the skilling, improve logistics services and strengthen the transportation infrastructure. ASEAN and India may focus on sectors like healthcare, education, green energy, traditional medicine for R&D collaboration, etc. Also, ASEAN and India can explore the value chain linkages in producing health products and pharmaceuticals. Besides, there are huge business opportunities for SMEs and Start-ups in the post-Covid-19 time, particularly, in digital connectivity, e-commerce, cross-border delivery services, logistics business, etc.

Chapter 6: Dealing with Non-Tariff Measures (NTMs) between ASEAN and India

The trade relations between ASEAN and India have made significant progress over the last two decades. While the trade between them has grown over time, a large part of the trade potential remains unrealised due to high trade costs in the form of slow and unpredictable goods delivery, cumbersome customs procedures, non-tariff measures (NTMs), etc. This is highly apparent during the current Covid-19 pandemic where several countries including ASEAN and India have notified several NTMs related to Covid-19 to protect health and quality standards of the products procured to meet domestic consumption. NTMs, however, have serious implications on trade and are difficult for the firms, particularly SMEs to cope up with the change in the measures both in short and long terms due to lack of data availability, complexities and policy sources from various government regulatory agencies, etc. This chapter looks at the market access barriers arising from NTMs between ASEAN and India. This study also measures the incidence of NTMs and assesses their impact on trade between ASEAN and India both at country and sectoral levels. The chapter explores the regulatory environment between ASEAN and India.

ASEAN and India should identify the potential products those are of business interests and should build cooperation to work in areas where difficulties in recognising or validating certificates of testing and inspections and strengthen the use of international standards, mandatory documentation of equivalence procedure and adopting Codex consignment rejection guidelines, standards in English language and agreement on self-certification. Indian accreditation authorities should enter into mutual recognition agreements (MRAs) with similar agencies in ASEAN countries. This would facilitate lower transaction costs as well as hassle-free trade and helps to strengthen production networks across borders between ASEAN and India. ASEAN has initiated several work programmes to improve the NTMs and constituted an ASEAN Consultative Committee on Standards and Quality (ACCSQ) to undertake the harmonisation process and to implement mutual recognition agreement (MRAs) with international bodies. Streamlining NTMs through harmonisation of standards and regulations and mutual recognition of conformity assessment and reduction of border procedures is important for facilitating preferential market access between ASEAN and India. Only then any regional trade agreements can promote trade and investment activities.

Chapter 7: E-Commerce and Digital Connectivity: Strengthening India-ASEAN Collaboration

Digital integration and adoption of new technologies have been the basis of growth of India and the ASEAN countries in the era of the Fourth Industrial Revolution (4IR). ASEAN and India are emerging as fast adopters of digitalisation and some of the key drivers include favourable demographics, urbanisation, rising income levels, rising internet penetration, the proliferation of new technologies and digital tools, and availability of skilled workforce. Both are the fastest growing e-commerce markets, and the growth has been fuelled by services sector liberalisation, penetration of broadband and smartphones, growth of Start-ups, along with changes in consumer shopping habits and preferences. With the outbreak of the Coronavirus pandemic in 2020, the need for lockdown and social distancing has led to even faster adoption of e-commerce, which has now become an essential service. The pandemic has fast-tracked the process of online delivery of services such as education and healthcare. This chapter provides an overview of the status of digital integration and e-commerce in India and the ASEAN. This chapter also identifies the barriers and suggests policy recommendations to strengthen cross-border digital connectivity and e-commerce.

While India and many ASEAN countries are today importers of digital products and services, they are fast developing their capabilities which will enable them to export in the future. Jointly, they can target third-country markets leveraging on their mutual strengths. Governments can support private sectors through right policy initiatives to grow, expand, export and improve efficiency and global competitiveness. Collaborations should be established between India and ASEAN member countries in developing efficient and secure cross-border digital payment systems, through applying best practices within the region. Innovative technology startups and multinational firms can be roped in this regard. Cooperation also needs to be established between the national governments in removing restrictions on online payment methods. Efforts should be taken to develop a single and unified payments gateway/ system within the region. The region has centers of technology and digital innovations and this will be the key driver to enhance GDP growth and create jobs in the post-Covid period.

Chapter 8: ASEAN-India Trade Corridors: Current Status, Challenges and Way Forward

Trade between India and Southeast and East Asia has declined in recent years amid global slowdown due to Coronavirus pandemic. With broken supply chains due to lockdown and close up of transportation networks, the weak connectivity of India's North-East Region (NER) with the rest of India and neighbouring countries has remained a serious deterrent to India's engagement with the East. Reengaging with the East is, therefore, necessary in post-Covid-19 period. The Act East Policy (AEP) is an effort to intensify India's engagement with Southeast and East Asia. India's proactive role in building a connected market with an ambitious but realistic connectivity programme is the key focus of AEP. This chapter presents the emerging connectivity scenario between India and Southeast Asia. In particular, this chapter reviews India's broad proposals on connectivity projects with ASEAN against the backdrop of AEP as well as policy recommendations in ASEAN-India POA (2021-2025) for strengthening connectivity between India and ASEAN.

In the post-Covid-19 period, restoring connectivity and resilience of supply chains will be key to ASEAN-India economic integration. The ASEAN-India POA (2021-2025) recommends for transforming Trilateral Highway into an Economic Corridor. Supply Chain Resilience Initiative (SCRI) between India, Japan and Australia has been launched recently. The SCRI will add to the development of the economic corridor between ASEAN and India. It will also facilitate investments as well as spur economic growth in the region, which is vehemently needed at this post-Covid-19 period. ASEAN-India connectivity could serve as a basis for Indo-Pacific infrastructure cooperation.

Chapter 9: ASEAN-India Energy Cooperation: New Frontiers of Opportunities

Energy security is the key factor for economic development as it helps to alleviate poverty and uplift the poor. Countries envisioning strengthening value chains both at regional and global level need better and reliable access to electricity. In addition to food security, energy security is pertinent to address in the medium to long term by targeting towards sustainable use of resources to achieve the Paris climate change target for energy consumption. For instance, India shares both land and maritime borders with ASEAN. Both have wide access to the ocean, wind, solar and other forms of renewable energy sources. When the countries in ASEAN and India face common SDG targets and challenges in renewable energy, regional cooperation makes sense to generate wider benefits, particularly through sharing best practices, exchange of know-how, the conduct of training and capacity building and cross border energy connectivity while dealing with the common challenges together. To expand energy access, it is crucial to enhance energy efficiency and to invest in renewable energy.

Renewable energy has become the key focus of ASEAN-India energy cooperation. Since renewable energy sources produce very negligible or zero global warming emissions, deeper cooperation in renewable energy may help countries move towards low-carbon growth paths. The leaders of ASEAN and India have, therefore, called for stronger collaboration to achieve energy security and to meet the Sustainable Development Goals (SDG) for ensuring access to affordable, reliable, sustainable and modern energy for all.

The Covid-19 pandemic has distracted the energy outlook on both the supply side and demand side. The consumption pattern of energy demand has experienced a significant change and also the energy supply has been severely affected due to lack of production activities, disruption on transportation and logistics, country lockdown and so on. The Covid-19 has also provided an opportunity for ASEAN and India to diversify the supply chain and to engage in cross-border connections for energy supply to reduce the price and also to meet energy shortage. Therefore, both ASEAN and India could harness the potential opportunities that are created by the Covid-19 situation.

Chapter 10: Dealing with Corona Pandemic: ASEAN-India Cooperation

The world is experiencing an unprecedented health crisis due to Coronavirus pandemic. ASEAN and India have been badly affected in terms of both human health and economic conditions. This chapter is to present the responses of ASEAN and India in dealing with Covid-19 and discuss the areas of cooperation between India and ASEAN. ASEAN and India at various capacities have undertaken different measures and show preparedness to tackle the present challenges. In such a situation, learning from the best practices would help the countries to effectively control the spread of Covid-19 virus and rebound the economy subsequently. Singapore, Taiwan and Korea have been following a model based on the 3Ts (test, trace and treat), which offer good lessons to ASEAN and India. Health and economic crises have already generated several non-traditional security (NTSs) issues. Greater cooperation in the area of NTSs in times of Covid-19 may generate larger dividends while minimising the risks. Another rewarding area of cooperation between ASEAN and India would be the digital economy such as e-commerce, Fintech, etc.

ASEAN and India shall encourage the exchange of knowledge of traditional medicines, health professionals, testing kits, PPEs, medicines, etc. For example, the ASEAN-India Network of Traditional Medicines (AINTM) may be activated to take forward the cooperation in traditional medicine. Health ministers and officials of ASEAN and India may interact with each other regularly in order to provide collective assistance to fight against the Covid-19 and the needed political direction. India may also explore offering Quick Impact Projects (QIPs) to the ASEAN countries related to public healthcare. ASEAN and India shall work together for sustainable health and community building. Perhaps, building a green strategic partnership between India and ASEAN may pave the way to better meet the SDGs.

Chapter 11: Development Partnership: ACMECS and CLMV

India's Act East Policy (AEP) has intensified the engagements with Southeast and East Asian countries. India's proactive role in building a common and connected market with an ambitious but realistic connectivity programme is the key focus of AEP. The AEP has received greater momentum through the Mekong-Ganga Cooperation (MGC). With a maturing ASEAN-India relation, India's foreign policy achievements in eastern neighbourhood remained remarkable. India's decision to join ACMECS as Development Partner is quite appropriate since India has been actively engaged with the Mekong countries and already has initiated several projects in the Mekong sub region, which will certainly boost up MGC and ASEAN-India partnership. This chapter attempts to identify the linkages between ACMECS and MGC. In particular, this chapter looks at the specific projects from the list of ACMECS priority projects for joint implementation, focusing particularly on projects that can also complement joint projects already being undertaken by India with the ACMECS countries under both bilateral and regional frameworks such as the MGC, the Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC) and ASEAN-India Strategic Partnership.

In addition to India's engagement with the ACMECS via MGC and its ongoing MGC POA (2019-2022), India can lend its support as the development partner in the areas where India has comparative advantage in terms of technical knowledge and capability. India can also jointly implement the project in support of Thailand to mobilize the resources both financial and human skills, in which both ACMECS and MGC POAs have synergy. Some of the areas where India can offer its support are (i) assistance in soft infrastructure, (ii) supporting FinTech, and (iii) resources mobilization. In addition to the existing areas of cooperation, India has potential to engage in other areas for cooperation such as blue economy, disaster management, climate change, renewable energy, and physical and digital connectivity.

Chapter 12: Scaling up People-to-People Linkages between ASEAN and India: Education and Tourism

Socio-cultural issues in ASEAN-India relations assume special significance. Socio-cultural cooperation is one of the important pillars of ASEAN-India Strategic Partnership, which include human resource development, people-to-people contacts, education, health, biodiversity, climate change and disaster management. At the Commemorative Summit held in January 2018, the Leaders of ASEAN countries and India underscored the importance of cultural relations in building an inclusive and progressive society. Shared historical ties, culture and knowledge have continued to guide the sustained interactions between India and Southeast Asia. Cultural links between India and Southeast Asia reflect the multi-cultural and multi-heritage tolerance society. Educational relation is one of the important areas of cooperation between ASEAN and India, which can take the partnership to a new height. This chapter discusses the emerging scenario in the areas of education and tourism - the two vital pillars of the people-to-people linkages between ASEAN and India.

The present health crisis caused by Covid-19 has impacted the people-to-people linkages. Education and tourism are the two vulnerable sectors, which have faced severe downfall due to ongoing pandemic. There is no denying that education and tourism are the next promising sectors which can take the ASEAN-India relations to a new higher level in post-Covid-19 period. Both ASEAN and India shall facilitate accreditation of degrees and diplomas and set up the AIUN. Apart from education, tourism also plays a significant role in connecting people of the region. It has been observed that Thailand and Singapore offer more preferred tourism destinations for Indian tourists than other ASEAN countries, while, ASEAN tourists prefer Buddhist circuits and cultural heritage sites in India. This chapter recommends that both India and ASEAN shall work together to facilitate the people-to-people connectivity, particularly in the post-Covid-19 period. India and ASEAN shall undertake joint programmes to overcome the current challenges as outlined in this chapter. Innovative programmes such as setting up AITF may help strengthen the tourism sector.

Chapter 13: India-ASEAN Maritime Security Cooperation: The Indo-Pacific Context

The Indo-Pacific region has been witnessing the fastest economic, material and infrastructure development in the world. The Indo-Pacific vision has been embraced not only by most regional countries, but also the extra-regional major powers and regional stakeholders. These include Australia, India, Japan, France, the US, ASEAN, with Germany being the latest addition. This chapter aims to undertake a realistic and fact-based examination of the potential for cooperation between India and the ASEAN countries on issues of holistic maritime security, which includes maritime safety and good order, and also negotiating between the complex issue of major-power maritime rivalry in the region.

Given the increasing conceptual consonance on the Indo-Pacific vision, India could be a valuable partner for ASEAN to meet the common objectives of regional security. The Indo-Pacific is a predominantly maritime-configured region. Therefore, in a more comprehensive sense, such security would encompass a wide spectrum of imperatives, including preventing maritime crime and use of the sea by terrorists, assuring human safety at sea and in the littorals, ensuring the adherence of regional states and extraregional stakeholders to the established norms of conduct as stipulated in the prevailing maritime legal order, and maintaining a stable regional balance of power. Notwithstanding the challenges, there emerges immense untapped potential for India to collaborate with the ASEAN — both as a group and as individual countries — and the same have been proposed as the way ahead for consideration by policy-makers on both sides. The analysis has factored the threats and weaknesses (and vulnerabilities), as well as the strengths and opportunities, and the recommendations have emerged from the analytical effort to minimize the effects of the former while optimizing the dividends of the latter. Considering that the analysis is based on open-source inputs, the recommendations may need to be re-oriented and refined based on more precise official inputs.

Chapter 14: Indo-Pacific Cooperation: AOIP and IPOI

The Indo-Pacific obtained renewed vibrancy when ASEAN, in June 2019, and India, in November 2019, came out with their respective Indo-Pacific visions, namely, the ASEAN Outlook on Indo-Pacific (AOIP), and, the Indo-Pacific Oceans Initiative (IPOI), respectively. This chapter reviews the perspectives of Indo-Pacific that are shared by different countries and discusses the key elements of the IPOI and the AOIP, as also ensuring areas of cooperation, where ASEAN and India can work together for the integration of the region.

With the announcement of the AOIP and the IPOI in 2019, the Indo-Pacific has been imparted very significant international momentum and geopolitical traction. As an open global initiative, the IPOI draws on existing regional cooperation architecture and mechanisms to focus on seven central pillars that anchor the deeply interconnected areas of Maritime Security; Maritime Ecology; Maritime Resources; Capacity Building and Resource Sharing; Disaster Risk Reduction and Management; Science, Technology and Academic Cooperation; and Trade Connectivity and Maritime Transport. The AOIP and the IPOI demonstrate very substantive commonalities and greatly enhance the scope of cooperation, particularly in view of unfolding changes to the global order against the backdrop of the ongoing Covid-19 pandemic.

Introduction

The world is facing unprecedented crisis, unleashed by the Coronavirus. The ongoing Covid-19 pandemic has severely impacted lives and livelihoods, basic well-being, and the productivity of countries across the world. Some of the major challenges resulting from the pandemic are rising poverty, falling health and nutrition, declining trade and investment flows, disruption of supply chains, travel and tourism – within and between countries. The cumulative loss in global output relative to the pre-pandemic projected path is forecasted to grow from US\$ 11 trillion over 2020-2021 to US\$ 28 trillion over 2020-2025.¹ Challenges of confronting the global pandemic have brought to the fore the need for global cooperation and collective response. Faced with the greatest challenges since the Great Depression of the 1930s, the need for stronger multilateral cooperation is, therefore, felt sine qua non to not only containing the pandemic and mitigate its social and economic effects but also bringing back the world economy to the growth path. It also underlines the need for deeper cooperation between ASEAN and India in search of collective solutions to these challenges and the collective path for a resilient recovery. India's External Affairs Minister (EAM) reminded us: "The ASEAN is one of the crossroads of the global economy. India is the fifth-largest economy in the world. We are not only proximate to each other but together help shape Asia and the world."

ASEAN and India are bound together by their shared history and culture. In the contemporary period, relation with ASEAN is one of the cornerstones of India's foreign policy. There has been steady progress in the ASEAN-India relation since the Look East Policy (LEP) was initiated in 1992. India became a sectoral dialogue partner of ASEAN in 1992. In 1996, this was upgraded to full dialogue partnership. In 2002, India became a Summit level partner of ASEAN. These political level interactions are further strengthened through the Senior Officials' Meetings, as also specialised working groups in the various functional areas. At present, there are more than 30 senior official level interactions between India and ASEAN, cutting across all the sectors, and an annual summit of the heads of the countries. Besides bilateral assistance, financial support has been provided to ASEAN countries through (i) ASEAN-India Cooperation Fund, (ii) ASEAN-India S&T Development Fund, and (iii) ASEAN-India Green Fund.

India's relation with ASEAN is the core foundation of India's Act East Policy (AEP). India has been increasingly engaged with ASEAN, and that is also growing rapidly. There has been deepening of partnership between India and ASEAN across the three pillars, namely, politico-security, economic and socio-cultural. The combined region of ASEAN and India represents a total population of 1.8 billion, which is a quarter of the global population, and with a total GDP of over US\$ 3.8 trillion, the region presents one of the largest economic spaces in the world.³

Over time, the ASEAN-India partnership has crossed many milestones one after another (see Figure 1). In 2018, ASEAN and India commemorated 25 years of dialogue partnership and 15 years of Summit level partnership. The Commemorative Summit was attended by the Leaders from all the 10 ASEAN countries and came out with the *Delhi Declaration*, the guiding roadmap of ASEAN-India strategic partnership.

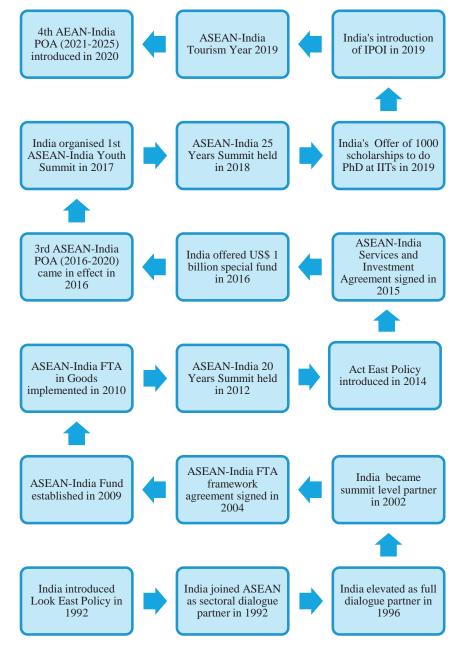


Figure 1: Crossing the Milestones: ASEAN-India Relations over Time

Source: Drawn by author based on secondary sources

Today, India's Act East is fast becoming the Act Indo-Pacific⁴. The Indo-Pacific has obtained renewed vibrancy when ASEAN, in June 2019, and India, in November 2019, came out with their respective Indo-Pacific visions, namely, the ASEAN Outlook on Indo-Pacific (AOIP) and the Indo-Pacific Oceans Initiative (IPOI), respectively. In the same year, India's offer of 1000 scholarships to do PhD in Indian IITs was introduced, adding further momentum to the ASEAN-India relation and the Indo-Pacific as well.

While initial months of the Covid-19 pandemic witnessed a deceleration of trade between ASEAN and India, India's engagements with ASEAN nations in coping with the Covid-19 challenges have paved the way for friendship, good neighbourliness, peaceful co-existence and prosperity in the region.⁵ The future looks promising as there is a clear sign of revival of trade in goods between ASEAN and India in later months.⁶

Reinforcing Trade and Investment Relations

Since the ASEAN-India FTA in goods came in effect in 2010, the trade between them has almost doubled to reach over US\$ 87 billion in 2019-20 (Table 1). ASEAN is currently India's fourth-largest trading partner, whereas, India is ASEAN's seventh-largest trade partner. Bilateral trade between ASEAN and India presently covers almost 11 per cent of India's global trade, marginally improved by one per cent between 2010-11 and 2019-20 (Table 1). Adding China, Japan and Korea in it, countries falling under the coverage of Act East Policy (AEP) contribute to about 1/3rd of India's global trade. Driven by imports, India's trade with ASEAN has grown faster than India's trade with the world. India faces significant non-tariff barriers in ASEAN that also limit its export with the ASEAN. Although trade growth, both in India and ASEAN, in recent months has faltered due to the Covid-19 pandemic and trade policy uncertainties, there is still untapped potential for further enhancing ASEAN-India trade.

2010-2011 2019-2020 Growth* Share of Share of **ASEAN** World To To To World **ASEAN** in To World | ASEAN in | (2010-11 -(2010-11 -**ASEAN ASEAN** World World 2019-20) 2019-20) (US\$ billion) (%)(US\$ billion) (%)(%)**Export** 25.63 249.82 10.26 31.55 313.36 10.07 2.10 2.29 **Import** 25.80 288.37 8.95 55.37 474.71 11.66 7.94 5.11 **Total** 51.43 538.19 9.56 86.92 788.07 11.03 5.39 3.89

Table 1: India's Trade with ASEAN

Note: *CAGR

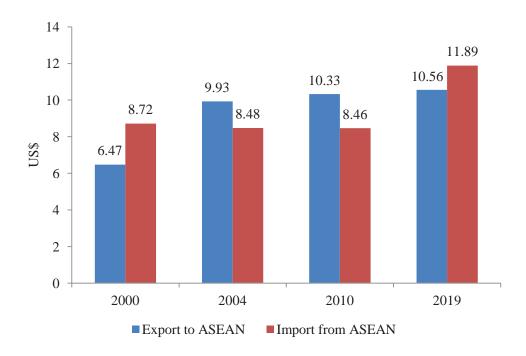
Source: Author's calculation based on Export-Import Data Bank, Department of Commerce, India

In per capita term, for each US\$ 100 global export by India, US\$ 10.56 came from ASEAN in 2019, increased marginally over 2004 and 2010, the period which witnessed relatively higher engagement between ASEAN and India (Figure 2). On the other, US\$ 11.89 worth import came from ASEAN for each US\$ 100 import by India from the world. The trend reiterates India's import dependency, but also shows much room to enhance trade between ASEAN and India.

The intensity of engagement in trade and investment can also be judged from the trends presented in Table 2. India's export and import with ASEAN in per capita term have increased since 2010 except for the later years when the trade growth slowed down amid persistent trade tensions and moderation in global economic growth.⁸ The policy uncertainties and negative effects arising from anti-globalisation measures have also affected bilateral FDI flows between ASEAN and India.⁹ What follows is that India's widening deficit in current account with ASEAN but a fluctuating surplus in the capital account signal a shift is needed in India's economic policy toward ASEAN (Figure 3). As of 2019, the net effect of both current and capital accounts is not in favour of India. To convert the deficit into a surplus, India may strive for bigger ASEAN markets seeking greater capital, trade and technology.

The pandemic has impacted the trade flows between ASEAN and India. Trade forecast reported in Chapter 2 indicates that the ASEAN-India trade in goods is likely to decline from US\$ 90 billion in 2019 to US\$ 84 billion in 2021. However, a sharp rise in ASEAN-India trade is possible along with a rebound of ASEAN economies and India from the current global crisis. One of the key challenges to India's export in this uncertain time is, therefore, to maintain the competitiveness in the global and regional markets by improving trade facilitation not only at home but also with the trade partners. Along with it, upgrading the ASEAN-India FTA (AIFTA) and its effective utilisation may perhaps add the required momentum to the bilateral trade flows while promoting sustainable and inclusive growth for both ASEAN and India.

Figure 2: What Does India's US\$ 100 Trade per Capita Mean to ASEAN-India Trade?



Note: *Taken in US\$ per capita

Source: Author's calculation based on IMF's DOTS and the World Bank's WDI

Table 2: Trends in India's Trade and Investment with ASEAN per Capita

Year	India's Per Capita FDI Inflows from ASEAN	India's Per Capita FDI Outflows to ASEAN	India's Per Capita Export to ASEAN	India's Per Capita Import from ASEAN	
		(US	S\$)		
2010	1.26	10.28	18.65	24.05	
2011	1.31	6.34	28.81	32.36	
2012	1.20	3.59	26.47	33.38	
2013	1.72	3.81	27.47	32.96	
2014	3.01	5.28	24.13	34.42	
2015	4.89	4.56	20.22	31.70	
2016	12.07	3.84	20.12	28.94	
2017	8.27	4.35	26.48	33.84	
2018	12.05	2.21	26.67	42.31	
2019	7.94	3.27	25.10	41.75	

Source: Author's calculation based on IMF's DOTS, ASEANStat, RBI and World Bank's WDI

Figure 3: India's Surplus in Capital Account and Deficit in Current Account with ASEAN*

Note: *In per capita term

Source: Calculated by author based on IMF DOTS and BOPS, and RBI

Table 3: India's Trade in Parts and Components (P&C) with ASEAN

	India's Export of P&C to ASEAN	India's Import of P&C from ASEAN	Share of India's Exports of P&C to ASEAN in World	Share of India's Imports of P&C from ASEAN in World		
	(US\$ Million)	(US\$ Million)	(%)	(%)		
2006	700.75	1814.42	2.9	5.5		
2018	2069.1	3817.13	8.1	7.4		

Source: Author's calculation based on WITS, the World Bank

Connecting with Value Chains

Another great opportunity to scale up the ASEAN-India partnership is the development of value chains. The Covid-19 pandemic has disrupted the supply chain networks and the supply of intermediate inputs and final goods across the world has been distrusted disproportionately. Chapter 5 of the Report indicates that the impact of supply chain disruptions is multidimensional due to high degree of integration and interdependence of value chains across the countries.

Current engagement in value chains between ASEAN and India is not substantial; about US\$ 5.8 billion was the total trade in P&C between them in 2018 (Table 3). In addition to the automobile sector, sectors which hold promise in value chains between ASEAN and India are electrical equipment, industrial

machines, road vehicles, construction equipments, power generating machines and telecommunications, and the services sectors such as ICT, R&D, pharmaceuticals, etc.¹¹ Innovative ideas like the Project Development Fund (PDF) is what ASEAN and India need more. To facilitate investments from India to CLMV countries (Cambodia, Myanmar, Lao PDR and Vietnam), the PDF has been announced by India few years back, but it is yet to be fully utilised.¹²

As China's economy loses momentum, investments from China are shifting abroad to cut operating costs, to save from business uncertainties and to search for new markets. Countries like India, Myanmar, Bangladesh, Vietnam, Thailand and the Philippines look like attractive alternatives. Relocation of industries away from China would create a new wave of industrialisation. ASEAN and India can leverage the emerging scenario and support each other to build new and resilient supply chains. However, to explore this opportunity, ASEAN and India must upgrade the skilling, improve logistics services and strengthen the transportation infrastructure.

Investment reform is another challenge for both India and ASEAN. Chapter 4 of this Report recommends that ASEAN and India should cooperate towards designing appropriate policies, simplifying investment regimes and streamlining investment processes to further strengthen the value chain and investment linkages. India's 'Atmanirbhar Bharat' or 'Self-Reliant India' Mission offers investment opportunities to ASEAN countries.

Business and economic cooperation between India and ASEAN in areas of mutual interest such as financial technology (FinTech), connectivity, start-ups, and innovation, empowerment of youth and women and the development of MSMEs is an important driver to move up the ASEAN-India relation in higher plateau.¹³

Advancing Science and Technology (S&T) Cooperation

Realising the significance of S&T for economic development, stronger cooperation between ASEAN and India in S&T would be complementary in terms of sharing the technical knowledge and resources between ASEAN member states and India. The importance of S&T in supporting the ASEAN-India cooperation has been acknowledged and established ASEAN India S&T Working Group (AISTWG) in 1996. India has allotted dedicated amount of US\$ 5 million for the ASEAN-India S&T Development Fund to engage in collaborative R&D projects and activities between them. The ASEAN-India Plan of Action (POA) (2021-2025) calls for strengthening cooperation and cross-sectoral collaboration in science and technology, including but not limited to joint research and development projects, and support implementation of the ASEAN Plan of Action on Science, Technology and Innovation (APASTI) 2016-2025, such as in the areas of health, environmental management, climate change adaptation and mitigation measures, agricultural technologies, alternative energy, biodiversity, food processing, advanced materials for development of value-added products, and space technology and applications. It also aims to promote cooperation in biotechnology including through capacity building and joint research and development for mutual benefit. It also encourages more programmes and projects under the ASEAN-India Science and Technology Development Fund. Deepening ASEAN and India cooperation on S&T would help to keep up with the evolving technological advancement and also for sustainable development for both ASEAN and India.

New Frontiers and High Value Connectivity

ASEAN-India connectivity could serve as a basis for Indo-Pacific infrastructure cooperation. Chapter 8 of this Report argues that completion of the India-Myanmar-Thailand Trilateral Highway and its extension to Cambodia, Lao PDR and Vietnam is pivotal for the next phase of ASEAN-India relation. In the post-Covid-19, restoring connectivity and resilience of supply chains will be key to ASEAN-India economic integration, particularly the development of India's Northeast India. The ASEAN-India Plan of

Action (POA) (2021-2025) recommends for transforming Trilateral Highway into an Economic Corridor. Supply chain resilience initiative (SCRI) between India, Japan and Australia has been launched recently. Figure 4 illustrates the current set up of regional blocs. The SCRI would facilitate the development of the economic corridor between ASEAN and India. It may also promote investments as well as spur economic growth in the region.

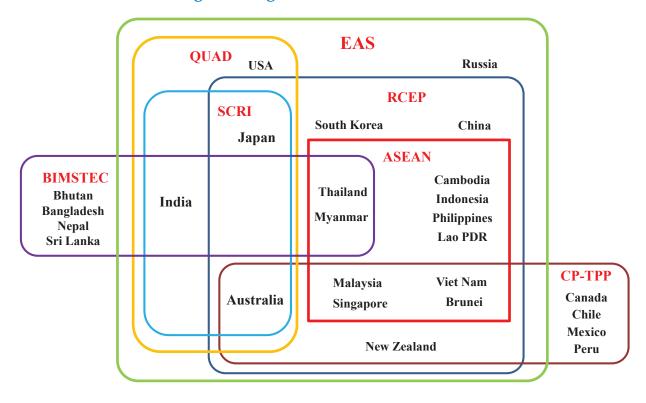


Figure 4: Regional Blocs in Indo-Pacific

Notes: EAS – East Asia Summit; SCRI – Supply Chain Resilience Initiative; QUAD – Quadrilateral Security Dialogue; BIMSTEC – Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation; ASEAN – Association of South East Asian Nation; RCEP – Regional Comprehensive Economic Partnership; CP-TPP – Comprehensive and Progressive Agreement for Trans-Pacific Partnership

Source: Author's own based on various secondary sources

Indo-Pacific Vision and Plan of Action

Deep integration between India and ASEAN is likely to provide a strong platform for the larger economic integration, particularly in the post-Covid-19. Nonetheless, the effective implementation of the Services and Investment Agreement, which were signed and ratified between India and ASEAN, are expected to raise the trade flow between the two partners, where a large part of bilateral trade between them is yet to be unlocked. Engaging in new areas like energy, maritime safety and security, blue economy, digital connectivity and e-commerce will effectively respond to the growing demand of new engagements. Any further efforts to deepen integration between India and ASEAN will, therefore, require collaboration and partnership by pooling our common interests as the global economy enters a new phase of integration. In such a testing time, working together to implement the POA (2021-2025) may help in achieving the roadmap for long-term ASEAN-India engagement.

Countries prefer regional blocs, which not only facilitate economic integration but also promote non-economic areas of cooperation. The rise of QUAD or SCRI is, thus, welcome steps. In any way, be it economic or non-economic, regional cooperation will be key to promoting economic stability, competitiveness, growth and integration in the region. Horimoto commented: "Countries of the Indo-Pacific should strive for sharing the concept of multilateralism as the basic regional principle". This is also not to deny that a stronger ASEAN-India partnership would also strengthen multilateralism, and work towards building a common position, voice, and visibility in building Indo-Pacific.

In this challenging time, ASEAN and India can play a major role in rebooting the global economy. In the demand side, better coordination can overcome low aggregate demand, which is a common challenge amid this global distress. Government's intervention is must to help overcome low aggregate demand in this Covid-19 time, which would reduce unemployment and stimulate growth. But, if the ASEAN-India region is to grow further, it is essential to press ahead with the supply-side infrastructure development that underpins industrial activity such as Make-in-India, improves people's livelihoods and facilitates the distribution of goods – all within countries, and higher cross-border physical and digital infrastructure, trade facilitation through harmonisation of standards, more development aids through grants and LOCs, faster movement of goods and services – all between countries. Both the initiatives will pave the way for not just infrastructure development but sustainable and resilient recovery, thereby fuelling global growth.

Moving from cooperation to integration, there is a need to jointly address challenges to strengthening the partnership between ASEAN and India in various areas. Understanding the core challenges that result in deeper integration requires better understanding the underlying dimensions: enhancing macroeconomic and financial stability; trade integration and investment promotion; higher competitiveness and innovation; connectivity improvement; sharing resources and knowledge; supporting equitable growth; strengthening regional institutions; among others.

The chapters that follow examine the dimension of ASEAN-India relations, the challenges they bring, and the regional cooperative mechanisms that could provide solutions to them. The major issues are divided into four broad areas: (i) economic performance, trade, investment and value chain, (ii) trade barriers and connectivity, (iii) sectoral cooperation, and (iv) Indo-Pacific cooperation.

AIDCR 2021: Why So Special?

ASEAN-India Development and Cooperation Report 2021: Avenues for Cooperation in Indo-Pacific (AIDCR 2021) is built upon the independent study commissioned by the ASEAN-India Centre (AIC) at RIS to explore further scope and opportunities in deepening the ASEAN-India Strategic Partnership. One of the objectives of the Report is to bring together ideas, perspectives and experiences as part of our efforts to promote ASEAN-India integration in the context of ASEAN Economic Community (AEC) with particular focus on current challenges posed by the Covid-19 pandemic.

The chapters provide a comparative analysis of the global and regional economies; examine the impact and implications of India–ASEAN integration; assess policy priorities, effectiveness, implementation imperatives and challenges; and discuss themes central to the economic sustainability of the region, including public and foreign policy, trade facilitation and connectivity, energy cooperation, opportunities in the manufacturing and service sectors and digital connectivity. Most specifically, the Report aims to provide insight into the work of regional cooperation and integration and suggest implications for both policy and programme interventions to strengthen the relations and introduce more academic substance into the policy making process. This Report presents comprehensive regional cooperation and integration issues, not only on partnership between ASEAN and India but also on East Asia Summit (EAS) Group relations.

This second edition of AIDCR is very unique in the sense that there was almost no attempt in the past to bring a new perspective on ASEAN-India relation, particularly in view of the ongoing global

uncertainties. This Report intends to fill that gap and enrich the literature. It has a total of 14 chapters, freshly written for this Report.

Chapter 1: Growth Outlook and Key Development Challenges in the Covid-19 Period

The prime objective of this chapter is to analyze the growth outlook and key development challenges for ASEAN and India in the Covid-19 era. A health crisis has generated an economic crisis globally. Some of the common economic devastations are noted as disruptions in the financial market and supply chains, and uncertainties in global trade, among others. The economic crisis triggered by Covid-19 hit hard most of the countries across the world. Developing world has been disproportionately impacted by the pandemic, especially those countries which are integral part of the global value chains. The IMF has reported that the impact of Covid-19 on economic growth is even worse than the global financial crisis of 2007-08, and the global growth is expected to contract by 4.4 per cent in the year 2020, and 5.2 per cent in 2021. According to the IMF, the cumulative loss in output relative to the pre-pandemic projected path is expected to grow to US\$ 28 trillion by 2025. Therefore, the pandemic-driven global crisis is going to have long-lasting effects on economies including ASEAN economies and India.

ASEAN and India must invest in safeguarding economies from Covid-like crisis in the future. ASEAN and India have been witnessing high economic shock, which has shaken the economies of the region, both internally and externally. In this uncertain period, ASEAN and India have a common challenge to mobilise the needed resources, revive the domestic production, promote MSMEs, stabilise the macroeconomic situation, etc. At the same time, ASEAN and India have to strengthen and re-establish the supply chains, manage trade balance and capital flows, monitor foreign exchange reserves, etc. to address the external shocks. Under such a changing environment, ASEAN and India have newer developmental challenges, which have opened new opportunities, and scope of joint efforts to upscale trade and investment relations, engagement in traditional and non-traditional areas of cooperation (i.e., ICT, Digital Innovation, Industrial Revolution 4.0, etc.). ASEAN and India have announced fiscal and monetary policy measures to recover from an immediate health crisis and preserve lives and also initiated socio-economic programmes to avoid economic contraction. ASEAN and India should cooperate and work together to support increased production and ensure that the resources are optimally utilized. Besides, upholding a stable rules-based international trading system would help to move towards stable economic recovery. In this context, the emerging architecture on 'Indo-Pacific' has a potential opportunity to foster economic relations, strengthen regional capacity and capability to recover from the Covid-19 crisis.

Chapter 2: ASEAN-India Trade Relations: Emerging Trends, Challenges and Opportunities

The world has witnessed a sharp decline in economic growth and trade, more particularly in the first half of 2020. World trade is expected to fall by 9.2 per cent in 2020 due to Covid-19 pandemic and rise by 7.2 per cent in 2021. Recent release of growth forecast of IMF indicates that a rebound is expected in 2021 in developing Asia. Both developing Asia and advanced economies have weakened tremendously in trade due to the pandemic and also exposed to the slowing regional integration and interdependence with the global economy. Global trade was already slowing down before the pandemic started due to trade tensions and declining economic growth. In this context, this chapter analyses the trends of ASEAN and India trade relations amid the Covid-19 pandemic. Besides, ten-year completion of ASEAN-India FTA (AIFTA) has called for reviewing AIFTA and to explore new opportunities. Given that ASEAN and India are important driving forces of the emerging global order, this chapter presents the policy recommendations and a way forward to tap the potential opportunities to trade and enhance the regional integration in the Indo-Pacific.

India has taken steps towards economic integration, particularly with Southeast and East Asian countries. In the post-FTA period, volume of trade in goods became asymmetric in favour of ASEAN, while India's exports have not witnessed a significant rise. Both India and ASEAN have substantially high untapped trade potential, which has remained unrealized due to barriers to trade and structural differences of the economies. The gap between actual and potential trade may widen due to pandemic-led recession. While India could be emerging as the alternative market for ASEAN, particularly in the post-Covid-19 period and vice-versa, both would need to upgrade its manufacturing capabilities and build regional production networks as these constitute an integral component of intra-Southeast Asian trade. Finally, given the unfolding Indo-Pacific order, ASEAN and India have to accelerate the pace of their economic reform processes in order to participate in and benefit from their trade creation possibilities. Besides, to strengthen trade relations, ASEAN and India should address the issues related to sensitive lists, non-tariff measures, and trade facilitation measures, among others. A review of ASEAN-India FTA in goods should, therefore, lead to generate more trade, generate jobs and reduce poverty.

Chapter 3: India-ASEAN Trade in Services: Prospects and Challenges

India is among the world's top 10 exporters and importers of commercial services. Given the growing importance of services in India's domestic economy as well as in international trade, India has offensive interests in various services, and therefore, services are becoming an important part of India's effort to economically integrate with ASEAN, though the initial focus in such integration was only on goods. The ASEAN-India Trade in Goods Agreement (AITIGA) entered into force on 1 January 2010, but the ASEAN-India Trade in Services Agreement (AITISA) was signed in 2014. This chapter aims at analysing India's services trade with the ASEAN region and how India's services trade interests are taken into consideration by ASEAN countries in the ASEAN-India Services Trade Agreement and the services trade FTAs signed between India and two of ASEAN members, namely, Singapore and Malaysia. It also discusses the opportunities and challenges in services trade between India and ASEAN in the current environment of global pandemic.

Given its skilled human resources and buoyant services sector, India has competitive advantage in services as compared to the ASEAN. The services FTAs signed by India with ASEAN countries have provided opportunities for Indian services providers to integrate with ASEAN and expand their footprints in this region. However, Indian services providers do not seem to benefit much from preferential market access given by ASEAN countries in their FTAs with India given the fact that the US and the EU continue to have a large share of India's services exports, particularly in IT services. The low share of ASEAN countries in India's services exports is partly a reflection of low ambitions in the existing agreements, regulatory and cultural barriers prevalent in these countries and partly the result of discriminatory standards applied by these countries for Indian service providers.

In a post Covid-19 world, the sensitivities towards globalization and international trade are likely to increase at global level and India and ASEAN will not remain untouched from such sensitivities playing out. In particular, Mode 4 related sensitivities are likely to increase, which is already the most restrictive and sensitive mode in the AITISA. Therefore, given Mode 4's importance in India's services trade, India needs to include Mode 4 safeguard provisions whenever the review of this FTA takes place in future. India may also consider alternative approaches, such as negotiating bilateral labour agreements either with individual ASEAN countries or ASEAN as a bloc allowing the movement of natural persons in specific sectors or activities, for predetermined durations and with dedicated return mechanisms. Nonetheless, the pandemic has also created new opportunities for enhancing services trade between India and ASEAN, which India could leverage with suitable proactive steps, such as focusing on mode 1 based services exports and address issues of data protection, liability, and infrastructure.

Chapter 4: ASEAN-India Investment Relations: Emerging Trends and Prospects

ASEAN and India are some of the major recipients of Foreign Direct Investment (FDI). FDI is considered as an important source for achieving greater and faster economic growth. FDI is also a major source of valuable technology and know-how while fostering linkages with domestic firms through backward and forward linkages. The Asia-Pacific region is the largest destination and source of FDI globally, of which ASEAN and India have introduced several important policy reforms over the last few decades to attract FDI and gain investors' confidence.

Globally, the flow of FDI has been slowed down due to the Covid-19 pandemic. For instance, UNCTAD reported that the forecast for global FDI flows would decrease by upto 40 per cent (i.e., US\$ 1 trillion) in 2020 from US\$ 1.54 trillion in 2019. FDI is forecasted to decrease by 5 to 10 per cent in 2021 and show the recovery slowly from 2022 onwards. The impact of Covid-19 pandemic is more severe in the Developing Asia due to supply chain disruptions, where most of the FDIs are in value chain intensive industries.

This chapter analyses the trends in investment, investment barriers and policy measures to explore the investment opportunities between ASEAN and India. The chapter also looks into emerging investment opportunities amidst Covid-19 outbreak and also potentials FDI and GVCs in ASEAN and India, given that multinational firms play a significant role in bringing international resources, technology sharing and production networking across countries, which could generate enormous benefits to MSMEs in the region. Besides, the chapter also presents some important policy recommendations to promote investments between ASEAN and India.

India's steady rise in FDI inflows and outflows with ASEAN and other countries in the region highlights that India offers potential investment opportunities. To further strengthen the investment linkages, ASEAN and India may come up with cooperative and collaborative mechanisms in the digital economy and pharmaceutical sectors to gain from comparative efficiency in the new export areas, which are based on digital technologies such as education, tele-medicine, healthcare, medical tourism, entertainment, etc. Besides, the pandemic has potentially altered the trade and investment paradigm by disrupting global value chains and trade. India and ASEAN have the potential to take advantage of the new value chain opportunities by making way for a new sustainable supply chain in the region. ASEAN and India should cooperate towards designing appropriate policies, simplifying investment regimes and streamlining investment processes to further strengthen the value chain and investment linkages. Both ASEAN and India can attract FDI in the new export areas if we show the potential and comparative advantage with the rest of the world.

Chapter 5: ASEAN-India Production Networks in Covid-19 Times

The Global Value Chain (GVC) promotes economic integration. The rapid growth of parts and components trade is a natural consequence of liberalised trade, where a final good is the result of a production process that takes place in different locations. In GVCs, both trade and investment are well integrated, particularly through MNCs. In the Asia-Pacific region, the contribution of trade in GVCs has reached 40 to 50 per cent in 2017. Therefore, production networks have become an important phenomenon in Southeast and East Asia. India has a limited number of products, where it leads in GVCs. India has gained competitiveness to form GVCs in 35 products that could sell in 50 countries. To realize such potentials, India has taken initiatives to encourage GVCs.

India's parts and components (P&C) exports to and imports from ASEAN are close to 10 per cent, and India's P&C trade with major ASEAN countries are Singapore, Thailand, Malaysia, Indonesia and Vietnam. In particular, ASEAN and India have substantial intra-sectoral level trade in P&Cs in the sectors like electrical equipment, industrial machines, road vehicles, power generating machines and

telecommunications. In addition, India also has a strong regional value chain base in the automobile sector with ASEAN countries such as Indonesia, Thailand and Malaysia. India also has high potential in some of the sectors which are interdependent with the services sector such as ICT, R&D, pharmaceuticals, etc.

The impact of supply chain disruptions is multidimensional due to high degree of integration and interdependence of value chains across the countries. The outbreak of Covid-19 has deeply disrupted the supply chain networks that have affected the supply of intermediate inputs as well as final goods across the world. The Covid-19 pandemic and subsequent measures have led to restrict the flow of goods and services between the countries. This chapter discusses the impact of Covid-19 outbreak on ASEAN- India value chain integration and identifies the potential sectors for value chain linkages between ASEAN and India in the post-Covid-19. The chapter also addresses the barriers to value chain and investigates the impact of Covid-19 on different types of GVC participation in ASEAN and India.

The pandemic has also created an opportunity to promote trade and investment by realigning the supply chains. Relocation of industries away from China would create a new wave of industrialisation. Both ASEAN and India have the potential opportunities in terms of attracting FDI that are planning to relocate the firms in ASEAN and India and also new MNCs, which look for sustainable value chains across the region and to avoid high dependency on one single country. ASEAN and India can leverage the emerging scenario and support each other to build new and resilient supply chains. However, to explore this opportunity, ASEAN and India must upgrade the skilling, improve logistics services and strengthen the transportation infrastructure. ASEAN and India may focus on sectors like healthcare, education, green energy, traditional medicine for R&D collaboration, etc. Also, ASEAN and India can explore the value chain linkages in producing health products and pharmaceuticals. Besides, there are huge business opportunities for SMEs and Start-ups in the post-Covid-19, particularly, in digital connectivity, e-commerce, cross-border delivery services, logistics business, etc.

Chapter 6: Dealing with Non-Tariff Measures (NTMs) between ASEAN and India

The trade relations between ASEAN and India have made significant progress over the last two decades. While the trade between them has grown over time, a large part of the trade potential remains unrealised due to high trade costs in the form of slow and unpredictable goods delivery, cumbersome customs procedures, non-tariff measures (NTMs), etc. The complexities and the application of NTMs have been increasing consistently over time. Most often NTMs are less transparent and add to the costs of doing business in the importing country. Exporters often consider NTMs as barriers to trade since compliance to standards makes additional cost and time to export, which also negatively affect the competitiveness of the products of the exporting countries.

While NTMs act as barriers to trade, it also maintains quality and health standards with a legitimate purpose, to protect domestic food and environment by imposing several technical measures. This is highly apparent during the current Covid-19 pandemic where several countries including ASEAN and India have notified several NTMs related to Covid-19 to protect health and quality standards of the products procured to meet domestic consumption. NTMs, however, have serious implications on trade and are difficult for the firms, particularly SMEs to cope up with the change in the measures both in short and long terms due to lack of data availability, complexities and policy sources from various government regulatory agencies, etc. This chapter looks at the market access barriers arising from NTMs between ASEAN and India. This study also measures the incidence of NTMs and assesses their impact on trade between ASEAN and India both at country and sectoral levels. The chapter explores the regulatory environment between ASEAN and India and suggests policy recommendations to strengthen the trade relation between ASEAN and India.

ASEAN and India should identify the potential products those are of business interests and should build cooperation to work in areas where difficulties in recognising or validating certificates of testing and inspections and strengthen the use of international standards, mandatory documentation of equivalence procedure and adopting Codex consignment rejection guidelines, standards in English language and agreement on self-certification. Indian accreditation authorities should enter into mutual recognition agreements (MRAs) with similar agencies in ASEAN countries. This would facilitate lower transaction costs as well as hassle-free trade and helps to strengthen production networks across borders between ASEAN and India. ASEAN has initiated several work programmes to improve the NTMs and constituted an ASEAN Consultative Committee on Standards and Quality (ACCSQ) to undertake the harmonisation process and to implement mutual recognition agreement (MRAs) with international bodies. Streamlining NTMs through harmonisation of standards and regulations and mutual recognition of conformity assessment and reduction of border procedures is important for facilitating preferential market access between ASEAN and India. Only then any regional trade agreements can promote trade and investment activities.

Chapter 7: E-Commerce and Digital Connectivity: Strengthening India-ASEAN Collaboration

Digital integration and adoption of new technologies have been the basis of growth of India and the ASEAN countries in the era of the fourth industrial revolution (4IR). The two economies are emerging as fast adopters of digitalisation and some of the key drivers include favourable demographics, urbanisation, rising income levels, rising internet penetration, proliferation of new technologies and digital tools, and availability of skilled workforce. Today, India and the ASEAN are fastest growing e-commerce markets, and the growth has been fuelled by services sector liberalisation, penetration of broadband and smart phones, growth of Start-ups, along with changes in consumer shopping habits and preferences. With the outbreak of the Coronavirus pandemic in 2020, the need for lockdown and social distancing has led to even faster adoption of e-commerce, which has now become an essential service. The pandemic has fast-tracked the process of online delivery of services such as education and healthcare. The governments in India and ASEAN have implemented online clearance processes to help businesses.

Prior to the Covid-19 pandemic, India's digital economy generated around US\$ 200 billion annually. This is likely to increase with the pandemic. One of the important benefits of digital connectivity and e-commerce channels is to link the small and medium enterprises (SMEs) to global markets at a low cost. The objective of this chapter is to provide an overview of the status of digital integration and e-commerce in India and the ASEAN, identify the barriers and suggest how the two economies can collaborate to strengthen cross-border digital connectivity and e-commerce.

Today, India and ASEAN are at a difficult time when trade flows have reduced, and countries are facing a GDP slowdown and unemployment. As countries try to revive from the Covid-19, both the economies can leverage on their digital and e-commerce initiatives that they have implemented/are implementing to move towards a technology-driven economy. This chapter shows that the growth of digital connectivity, e-commerce and Start-ups creates opportunities for digital integration across India and ASEAN, leveraging on their mutual strengths. There is a need for addressing the domestic regulatory gaps and there is scope for enhancing cross-border regulatory cooperation.

While India and some ASEAN countries are today importers of digital products and services, they are fast developing their capabilities which will enable them to export in the future. They can target third country markets, leveraging on their mutual strengths. Governments can support private sectors through right policy initiatives to grow, expand, export and improve efficiency and global competitiveness. The region has centers of technology and digital innovations and this will be the key driver to enhance GDP growth and create jobs in the post-Covid-19 period.

Chapter 8: ASEAN-India Trade Corridors: Current Status, Challenges and Way Forward

Over two decades have passed since India undertook the Look East Policy (LEP) in an effort to strengthen economic and strategic linkages with Southeast and East Asian countries. While India's footprint in Southeast and East Asia has increased considerably, overall performance has been somewhat mixed. Trade between India and Southeast and East Asia has declined in recent years amid global slowdown due to Coronavirus pandemic. Cooperation on the non-economic front has also continued to create concern. With broken supply chains due to lockdown and close up of transportation networks, the weak connectivity of India's North East Region (NER) with the rest of India and neighbouring countries has remained a serious deterrent to India's engagement with the East. Re-engaging with the East is, therefore, necessary in post-Covid-19. The Act East Policy (AEP) is an effort to intensify India's engagement with Southeast and East Asia. India's proactive role in building a connected market with an ambitious but realistic connectivity programme is the key focus of AEP.

This chapter presents the emerging connectivity scenario between India and Southeast Asia. In particular, this chapter reviews India's broad proposals on connectivity projects with ASEAN against the backdrop of AEP as well as policy recommendations in ASEAN-India POA (2021-2025) for strengthening connectivity between India and ASEAN. Over time, ASEAN-India connectivity has transformed to deal with complicated but focused connectivity programmes. Compared to what it was in 2010, a decade later the connectivity agenda between ASEAN and India covers not only hard multimodal connectivity but also the soft side of connectivity such as trade facilitation. In particular, maritime connectivity has gained immense importance in the backdrop of Indo-Pacific maritime domain.

In the post-Covid-19, restoring connectivity and resilience of supply chains will be key to ASEAN-India economic integration. The ASEAN-India POA (2021-2025) recommends for transforming Trilateral Highway into an Economic Corridor. Supply Chain Resilience Initiative (SCRI) between India, Japan and Australia has been launched recently. The SCRI will add to the development of the economic corridor between ASEAN and India. It will also facilitate investments as well as spur economic growth in the region, which is vehemently needed at this post-Covid-19 period. ASEAN-India connectivity could serve as a basis for Indo-Pacific infrastructure cooperation.

Chapter 9: ASEAN-India Energy Cooperation: New Frontiers of Opportunities

Energy security is the key factor for economic development as it helps to alleviate poverty and uplift the poor. Countries envisioning strengthening value chains both at regional and global level need better and reliable access to electricity. In addition to food security, energy security is pertinent to address in the medium to long term by targeting towards sustainable use of resources to achieve the Paris climate change target for energy consumption. For instance, India shares both land and maritime borders with ASEAN. Both have wide access to ocean, wind, solar and other forms of renewable energy sources. When the countries in ASEAN and India face common SDG targets and challenges in renewable energy, regional cooperation makes sense to generate wider benefits, particularly through sharing best practices, exchange of know-how, conduct of training and capacity building and cross border energy connectivity while dealing with the common challenges together. To expand energy access, it is crucial to enhance energy efficiency and to invest in renewable energy.

Renewable energy has become the key focus of ASEAN-India energy cooperation. Since renewable energy sources produce very negligible or zero global warming emissions, deeper cooperation in renewal energy may help countries move towards low-carbon growth paths. The leaders of ASEAN and India have, therefore, called for stronger collaboration to achieve energy security and to meet the SDGs for ensuring access to affordable, reliable, sustainable and modern energy for all.

The Covid-19 pandemic has distracted the energy outlook on both supply-side and demand side. The consumption pattern of energy demand has experienced a significant change and also the energy supply has been severely affected due to lack of production activities, disruption on transportation and logistics, country lockdown and so on. The Covid-19 has also provided an opportunity for ASEAN and India to diversify the supply chain and to engage in cross-border connections for energy supply to reduce the price and also to meet energy shortage. Therefore, both ASEAN and India could harness the potential opportunities that are created by the Covid-19 situation.

Chapter 10: Dealing with Corona Pandemic: ASEAN-India Cooperation

The world is experiencing an unprecedented health crisis due to the Coronavirus pandemic. ASEAN and India have been badly affected in terms of both human health and economic conditions. ASEAN and India at various capacities have undertaken different measures and show preparedness to tackle the present challenges. Testing, tracking and treating (3Ts) are the common objective of ASEAN countries and India to overcome the health crisis. The objective of this chapter is to present the responses of ASEAN and India in dealing with Covid-19 and discuss the areas of cooperation between India and ASEAN.

ASEAN and India have been effectively fighting against the Covid-19 pandemic. Both are facing similar challenges and risks. In such a situation, learning from the best practices would help the countries to effectively control the spread of Covid-19 virus and rebound the economy subsequently. Singapore, Taiwan and Korea have been following a model based on the 3Ts (test, trace and treat), which offer good lessons to ASEAN and India. Health and economic crises have already generated several non-traditional security (NTSs) issues. Greater cooperation in the area of NTSs in times of Covid-19 may generate larger dividends while minimising the risks. Another rewarding area of cooperation between ASEAN and India would be the digital economy such as e-commerce, Fintech, etc.

ASEAN and India shall encourage the exchange of knowledge of traditional medicines, health professionals, testing kits, PPEs, medicines, etc. For example, the ASEAN-India Network of Traditional Medicines (AINTM) may be activated to take forward the cooperation in traditional medicine. Health ministers and officials of ASEAN and India may interact with each other regularly in order to provide collective assistance to fight against the Covid-19 and the needed political direction. India may also explore offering Quick Impact Projects (QIPs) to the ASEAN countries related to public healthcare. ASEAN and India shall work together for a sustainable health and community building. Perhaps, building a green strategic partnership between India and ASEAN may pave the way to better meet the SDGs.

Chapter 11: Development Partnership: ACMECS and CLMV

India's Act East Policy (AEP) has intensified the engagements with Southeast and East Asian countries. India's proactive role in building a common and connected market with an ambitious but realistic connectivity programme is the key focus of AEP. The AEP has received greater momentum through the Mekong-Ganga Cooperation (MGC), which was initiated in 2000 based on the civilizational rivers of Ganga and the Mekong. MGC has been celebrating 20 years of establishment in 2020. Later, Thailand has initiated the Ayeyawady-Chao Phraya-Mekong Economic Cooperation Strategy (ACMECS) in 2003, which is a cooperation framework among the five countries in the Mekong sub-region, namely, Cambodia, Lao PDR, Myanmar, Thailand, and Vietnam to utilize the diverse strengths of the member countries and to promote balanced development in the subregion. Thailand has invited India, South Korea, Japan and China to join as development partners of ACMECS. India has accepted the invitation and joined as a Development Partner on 29 July 2019. With a maturing ASEAN-India relation, India's foreign policy achievements in eastern neighbourhood remained remarkable. India's decision to join ACMECS as Development Partner is an appropriate step since India has been actively engaged with

the Mekong countries and already has initiated several projects in the Mekong subregion, which will certainly boost up MGC and ASEAN-India partnership.

This chapter attempts to identify the linkages between ACMECS and MGC. In particular, this chapter looks at the specific projects from the list of ACMECS priority projects for joint implementation, focusing particularly on projects that can also complement joint projects already being undertaken by India with the ACMECS countries under both bilateral and regional frameworks such as the MGC, the Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC) and ASEAN-India Strategic Partnership.

In addition to India's engagement with the ACMECS via MGC and its ongoing MGC POA (2019-2022), India can lend its support as the development partner in the areas where India has comparative advantage in terms of technical knowledge and capability. India can also jointly implement the project in support of Thailand to mobilize the resources both financial and human skills, in which both ACMECS and MGC POAs have synergy. Some of the areas where India can offer its support are (i) assistance in soft infrastructure, (ii) supporting FinTech, and (iii) resources mobilization. In addition to the existing areas of cooperation, India has potential to engage in other areas for cooperation such as blue economy, disaster management, climate change, renewable energy and physical and digital connectivity.

Chapter 12: Scaling up People-to-People Linkages between ASEAN and India: Education and Tourism

Socio-cultural issues in ASEAN-India relations assume special significance. Socio-cultural cooperation is one of the important pillars of ASEAN-India Strategic Partnership, which include human resource development, people-to-people contacts, education, health, biodiversity, climate change and disaster management. At the Commemorative Summit held in January 2018, the Leaders of ASEAN countries and India underscored the importance of cultural relations in building an inclusive and progressive society. Shared historical ties, culture and knowledge have continued to guide the sustained interactions between India and Southeast Asia. Cultural links between India and Southeast Asia reflect the multi-cultural and multi-heritage tolerance society. Educational relation is one of the important areas of cooperation between ASEAN and India, which can take the partnership to a new height. This chapter discusses the emerging scenario in the areas of education and tourism - the two vital pillars of the people-to-people linkages between ASEAN and India.

The present health crisis caused by the Covid-19 has impacted the people-to-people linkages. Education and tourism are the two vulnerable sectors, both have faced severe downfall due to the ongoing pandemic. There is no denying that education and tourism are the next promising sectors which can take the ASEAN-India relations to a new higher level in post-Covid. There are ample opportunities to scale up the activities in the education and tourism sectors, and this chapter has identified some of these activities succinctly. One of the conclusions of this chapter is that both ASEAN and India shall facilitate accreditation of degrees and diplomas, and setting up of the AIUN.

Apart from education, tourism also plays a significant role in connecting people of the region. It has been observed that Thailand and Singapore offer more preferred tourism destinations for Indian tourists than other ASEAN countries, while, ASEAN tourists prefer Buddhist circuits and cultural heritage in India. This chapter recommends that both India and ASEAN should work together to facilitate the people-to-people connectivity, particularly in the post-Covid-19 period. India and ASEAN may undertake joint programmes to overcome the current challenges as outlined in this chapter. Innovative programmes such as setting up the AITF may help strengthen the tourism sector.

Chapter 13: India-ASEAN Maritime Security Cooperation: The Indo-Pacific Context

The Indo-Pacific region has been witnessing the fastest economic, material and infrastructure development in the world. This is leading to the regional countries' common desire for a benign maritime environment devoid of insecurities caused by all disruptive forces, either state actors, or non-state entities, or even natural forces. This quest led to the Indian and Japanese think-tanks to conceive the 'Indo-Pacific' idea more than a decade ago in 2006-07. Whereas the term 'Indo-Pacific' was not new, its revival germinated from the increasing security linkage between the Indian and Pacific oceans since the turn of the 21st Century. Unlike in the past, this linkage was now premised on maritime security and good order at sea. Since its revival in the current geopolitical context, the Indo-Pacific vision has been embraced not only by most regional countries, but also the extra-regional major powers and regional stakeholders. These include Australia, India, Japan, France, the US, ASEAN, with Germany being the latest addition.

This chapter aims to undertake a realistic and fact-based examination of the potential for cooperation between India and the ASEAN countries on issues of holistic maritime security, which includes maritime safety and good order, and also negotiating between the complex issue of major-power maritime rivalry in the region.

Given the increasing conceptual consonance on the Indo-Pacific vision, India could be a valuable partner for ASEAN to meet the common objectives of regional security. The Indo-Pacific is a predominantly maritime-configured region. Therefore, in a more comprehensive sense, such security would encompass a wide spectrum of imperatives, including preventing maritime crime and use of the sea by terrorists, assuring human safety at sea and in the littorals, ensuring the adherence of regional states and extraregional stakeholders to the established norms of conduct as stipulated in the prevailing maritime legal order, and maintaining a stable regional balance of power. Notwithstanding the challenges, there emerges immense untapped potential for India to collaborate with the ASEAN – both as a group and as individual countries – and the same have been proposed as the way ahead for consideration by policy-makers on both sides. The analysis has factored the threats and weaknesses (and vulnerabilities), as well as the strengths and opportunities, and the recommendations have emerged from the analytical effort to minimize the effects of the former, while optimizing the dividends of the latter. Considering that the analysis is based on open-source inputs, the recommendations may need to be re-oriented and refined based on more precise official inputs.

Chapter 14: Indo-Pacific Cooperation: AOIP and IPOI

This chapter reviews the perspectives of Indo-Pacific that are shared by different countries and discusses the key elements of the IPOI and the AOIP, as also ensuring areas of cooperation, where ASEAN and India can work together for the integration of the region. With the announcement of the AOIP and the IPOI in 2019, the Indo-Pacific has been imparted very significant international momentum and geopolitical traction. As an open global initiative, the IPOI draws on existing regional cooperation architecture and mechanisms to focus on seven central pillars that anchor the deeply interconnected areas of Maritime Security; Maritime Ecology; Maritime Resources; Capacity Building and Resource Sharing; Disaster Risk Reduction and Management; Science, Technology and Academic Cooperation; and Trade Connectivity and Maritime Transport. The AOIP and the IPOI demonstrate very substantive commonalities and greatly enhance the scope of cooperation, particularly in view of unfolding changes to the global order against the backdrop of the ongoing Covid-19 outbreak.

Even in this Covid-19 period, countries of the Indo-Pacific have ample scope for further deepening their integration. Strengthening economic integration requires a shared strategic vision, political will, and strong commitment, which are the keys for the success of Indo-Pacific. Without doubt, ASEAN centrality

would be a major driving force for speeding-up cooperation within the Indo-Pacific. Multidimensional regional cooperation within the Indo-Pacific would not only foster economic relations but would, in addition, strengthen regional capacity, and enhance regional capability while dealing with the region's complex security challenges.

The Indo-Pacific has a significant role to play in building both the economic and security architecture of the region. Protecting marine resources, biodiversity, and developing adaptive and mitigative strategies to offset the deleterious effects of climate change, enhancing sustainable development, promoting connectivity, reducing marine pollution, promoting disaster-management and relief, information sharing, capacity building and capability enhancement, generating maritime domain awareness, developing quality infrastructure, increasing non-polluting maritime trade and transport, strengthening the digital economy, promoting energy cooperation, and facilitating maritime tourism, are just a few of the several areas that could be explored further through cooperation amongst the Indo-Pacific partnering countries.

The long-term funding and supply of quality infrastructure are the biggest challenges in the Indo-Pacific region. India's SAGAR and IPOI, Japan's Quality Infrastructure, ASEAN's Master Plan on ASEAN Connectivity 2025, the USA's Blue Dot Network, and other initiatives across the region, are all aimed at strengthening regional connectivity. There is a large potential to consolidate and mobilise financing for infrastructure projects across the region by developing a comprehensive financing scheme as well as creating a master plan for Indo-Pacific connectivity and building the needed institutions to drive its constituent programmes.

Endnotes

- Refer, IMF (2020)
- Refer, the speech delivered by the External Affairs Minister of India at the 6th Roundtable of the ASEAN-India Network of Think-Tanks (AINTT) on 21 August 2020, available at https://www.mea.gov.in/Speeches-Statements.htm?dtl/32904
- 3. India has also signed FTAs with several ASEAN member countries, reinforcing the economic relations. Refer Appendix 1 for more details.
- 4. Refer, for example, De (2020)
- Refer, Chapter 10 of this Report
- Refer, Chapter 2 of this Report
- Refer, Chapter 6 of this Report
- 8. Several Asian economies recorded slower export growth due to weaker external demand from developed countries and the potential negative effect from persisting trade tensions (ADB, 2019)
- Refer, Chapter 4 of this Report
- 10. Refer, Raychaudhuri et al. (2021)
- 11. See, Chapter 5 of this Report
- 12. Total fund allotted is US\$ 77 billion to start with.
- Refer, Chair's Statement of the 16th ASEAN-India Summit, held on 3 November 2019 at Bangkok
- 14. See, Chapter 1 of this Report
- 15. See, Chapter 3 of this Report
- 16. Till now, three POAs were developed and implemented: POA (2004 2010), POA (2010-2015), and POA (2016-2020)
- 17. Refer, Horimoto (2020)
- 18. This was also noted in the first edition of the AIDCR 2015 (refer, AIC-RIS, 2015)

References

- ADB. 2019. Asian Economic Integration Report 2019, Asian Development Bank (ADB), New Delhi.
- AIC-RIS. 2015. ASEAN-India Development and Cooperation Report 2015, ASEAN-India Centre (AIC) Research and Information System for Developing Countries (RIS), Routledge, New Delhi.
- De, P. 2020. Act East to Act Indo-Pacific: India's Expanding Neighbourhood, Knowledge World, New Delhi
- Horimoti, T. 2020. Indo-Pacific Order and Japan–India Relations in the Midst of COVID-19, *Journal of Asian Economic Integration*, Vol. 2, No. 2, available at https://journals.sagepub.com/doi/full/10.1177/2631684620940476
- IMF. 2020. World Economic Outlook 2020: A Long and Difficult Ascent, International Monetary Fund (IMF), Washington, D.C.
- Raychaudhuri, A., De, P., Gupta, S. (eds.). 2021. World Trade and India: Multilateralism, Progress and Policy Response, Sage, New Delhi.

Appendix 1

Appendix Table 1: List of Trade and Investment Agreements Signed between ASEAN and India

Sr. No	Agreement	Date of Signed / Implementation
1	India - ASEAN Trade in Goods Agreement	13 August 2009 (signed), 1 January 2020 (implemented)
2	India - ASEAN Agreement on Trade in Services	1 July 2015 (ratified)
3	India - ASEAN Agreement on Investment ratified	1 July 2015 (ratified)
4	India – Thailand FTA- Early Harvest Scheme (EHS)	1 September, 2004 (implemented)
5	India - Singapore Comprehensive Economic Cooperation Agreement (CECA)*	29 June 2005 (signed) 1 August, 2005 (implemented)
6	India -Malaysia Comprehensive Economic Cooperation Agreement (CECA)	18 February 2011 (signed) 1 July, 2011 (implemented)
7	India-Indonesia Comprehensive Economic Cooperation Agreement (CECA)	Negotiation on-going since 2011

Note: *Two reviews of CECA completed and third review in progress.

Source: Department of Commerce, India

1

Growth Outlook and Key Development Challenges in the Covid-19 Period

1. Introduction

The Coronavirus (Covid-19) outbreak has disrupted people's lives and interrupted economic activities across the world. A health crisis has generated an economic crisis globally. Some of the common economic devastations are noted as disruptions in financial market and supply chains, and uncertainties in global trade, among others. The economic crisis triggered by the Covid-19 hit hard most of the countries across the world. Developing world has been disproportionately impacted by the pandemic, especially those countries which are integral part of the global value chains.

The IMF has reported that the impact of Covid-19 on economic growth is even worse than the global financial crisis of 2007-08, and the global growth is expected to contract by 4.4 per cent in the year 2020, and 5.2 per cent in 2021¹. According to IMF, the cumulative loss in output relative to the pre-pandemic projected path is expected to grow to US\$ 28 trillion by 2025 (IMF, 2020). Therefore, the pandemic-driven global crisis is going to have long lasting effects on countries including ASEAN economies and India.

ASEAN and India have been witnessing high economic shock, which has shaken the economies, both internally and externally. Today, ASEAN and India have a common challenge to mobilise the needed resources to fight against Corona pandemic, revive the domestic production, promote MSMEs, stabilise the macroeconomic situation, to mention a few. At the same time, ASEAN and India have to strengthen and re-establish the supply chains, manage trade balance and capital flows, monitor foreign exchange reserves, etc. to address the external shocks. ASEAN and India must invest in safeguarding economies from Covid-19 like crisis in the future. Under such a changing environment, ASEAN and India have newer developmental challenges, which have also opened new opportunities, and scope of joint efforts to upscale trade and investment relations, engagement in traditional and non-traditional areas of cooperation (i.e., ICT, Digital Innovation, Industrial Revolution 4.0 and so on.).

The prime objective of this chapter is to analyse the growth outlook and key development challenges for ASEAN and India in the Covid-19 period. The rest of the chapter is organised as follows: Section 2 discusses the Covid-19 outbreak and its effect on economic growth scenario and its vulnerability in ASEAN and India. The policy measures in response to Covid-19 in ASEAN and India are described in Section 3. Development challenges amidst Covid-19 are discussed in Section 4. Concluding remarks are drawn in Section 5.

2. Pandemic, Economic Growth Scenario and the Vulnerability in ASEAN and India

As on 18 October 2020, with some variation across countries, most of the ASEAN countries reported lower confirmed Covid-19 cases per million and related deaths than most other regions. Indonesia, the Philippines and Singapore have more than 1000 per million Covid-19 cases recorded, whereas, Cambodia, Lao PDR and Vietnam have recorded very low Covid-19 cases and deaths. The cumulative number of cases in India has been rising since the pandemic broke out, but at a slower rate. Little more than 5000 Covid-19 cases per million people are registered in India, which is next to the USA and Singapore at the time of reporting. Pandemic in China has recorded less than 100 Covid-19 cases per million population (see Table 1). India has witnessed over 68,000 tests per million population, which has been much higher than many ASEAN countries.

Table 1: Covid-19 Cases as on 18 October 2020

Country	Total Cases	Total Deaths	Total Recovered	Total Cases	Deaths	Tests		
				(Per million population)				
Indonesia	3,57,762	12,431	2,81,592	1,304	45	14,651		
The Philippines	3,54,338	6,603	2,95,312	3,221	60	39,391		
Singapore	57,911	28	57,798	9,876	5	5,61,103		
Myanmar	34,875	838	16,370	640	15	9,131		
Malaysia	19,627	180	12,561	604	6	57,345		
Thailand	3,686	59	3,481	53	0.8	13,999		
Vietnam	1,126	35	1,031	12	0.4	12,772		
Cambodia	283		280	17		9,638		
Brunei	147	3	143	335	7	1,44,161		
Lao PDR	23		22	3		8,136		
ASEAN	8,29,778	20,177	6,68,590	1,607	17	87,033		
India	74,94,551	1,14,064	65,97,209	5,415	82	68,080		
China	85,685	4,634	80,802	60	3	1,11,163		
USA	79,66,729	2,17,071	54,57,684	25,296	678	3,79,040		

Source: WHO.

In the beginning of the Covid-19 outbreak, ASEAN countries took series of steps for containment and imposed emergency lockdown after few cases were reported. Thailand reported the first case of Covid-19 on 13 January 2020. Vietnam took early precautionary measures to curtail the outbreak. Some ASEAN countries such as Indonesia and the Philippines have experienced lower capacity and lack of resources for testing kit, leading to under-detection and low monitoring of the spread of Covid-19 in their countries. India at the beginning stage of Covid-19 spread imposed stringent measure to curtail the spread. India imposed complete emergency lockdown on 20 March 2020 and further extended it till July 2020, and imposed partial lockdown across the country at the later stage. Despite several stringent measures, the outbreak has reached across India and witnessed about 7.50 million Covid-19 confirmed cases, next to the USA (8.27 million) as on 18 October 2020. Though India managed to control the spread of Covid-19, it is still at the risk of a second wave. India may gain from ASEAN experiences in terms of managing the spread of Covid-19, where some of the ASEAN countries have been using advanced communication technology and artificial intelligence in tracking, tracing and testing to control the spread of Coronavirus. At the 8th EAS Economic Ministers' Meeting, held on 28 August 2020, the Ministers acknowledged that the Covid-19 global pandemic has created unprecedented challenges that have caused not only loss of lives but also economic downturn for most countries across the world.²

(a) IMF Projections* (b) ADB Projections[#] 20.0 8 ASEAN financial 6.7 6.6 6.6 6.4 ASEAN Plus 6 7.2 15.0 India 6 China 6.8 GDP Growth (%) 6.2 USA 5.9 6.1 6.1 4 2 Developing Asia 2018 2017 2021 Developing Asia excluding the NIEs 2015 2016 2018 2019 2017 -10.0 -2 **Forecast** Forecast -15.0

Figure 1: GDP Growth Projections

Notes: *IMF projections based on October 2020 update; ADB projections based on September 2020 update; GDP – gross domestic product, NIEs = newly industrial economies of Hong Kong, China, the Republic of Korea, Singapore and Taipei, China. *Sources:* ADB (2020) and IMF (2020).

The impact of Covid-19 on economy has been far worse than what the countries experienced in the last global financial crisis (Figure 1a), mainly due to the disruption of regional and global supply chains, trade, travel and tourism. The continued spread of the outbreak has forced the region reeling under massive economic shocks and financial turmoil since March 2020. In addition, countries have taken containment measures to control the pandemic, resulting in deep and extensive negative shock to the respective economy in the 1st half of the 2020. IMF has reported that the world growth would be contracting by 4.4 per cent in 2020 and is projected to experience far worse than the global financial crisis (IMF, 2020a). Figure 1b shows the trend in GDP growth, which has been already declined from 5.9 per cent in 2018 to 5.2 per cent in 2019 due to trade tension mounted between the USA and China and weakening domestic investment in the developing Asia.3 In addition, the Covid-19 has been further deteriorated, resulting which the growth rate may likely to fall close to -0.7 per cent in 2020 and later, the growth is projected to recover to 6.8 per cent in 2021. For instance, the expected GDP growth rate of some of the ASEAN countries may turn into negative growth such as Thailand (-7.1 per cent), Singapore (-6.0 per cent), Malaysia (-6.0 per cent), Cambodia (-2.8 per cent) in 2020 (Table 2). Similarly, ASEAN plus countries would also experience deep negative shock, where India's GDP growth rate is expected to fall by -10.3 per cent in 2020. It is expected that both ASEAN and India may revive from the Covid-19 shock and projected to improve the GDP growth rate steadily by 3 to 9 per cent in 2021, respectively.

Table 2: GDP Growth Rate in ASEAN and ASEAN Plus

(%)

	Pagion/Country	Pre- a	nd Post- l	inancial	Crisis	Pre-Co	vid-19	IMF Forecast*		
	Region/Country		2008	2009	2010	2018	2019	2020	2021	
	Brunei Darussalam	0.1	-2.0	-1.8	2.7	0.1	3.9	0.1	3.2	
	Cambodia	10.2	6.7	0.1	6.0	7.5	7.0	-2.8	6.8	
	Indonesia	6.3	7.4	4.7	6.4	5.2	5.0	-1.5	6.1	
 	Lao PDR	7.9	7.8	7.4	8.0	6.3	4.7	0.2	4.8	
ASEAN	Malaysia	6.3	4.8	-1.5	7.5	4.7	4.3	-6.0	7.8	
\SE	Myanmar	12.5	7.6	4.4	5.2	6.4	6.5	2.0	5.7	
1	Philippines	6.6	4.2	1.1	7.6	6.2	5.9	-8.3	7.4	
	Singapore	9.0	1.9	0.1	14.5	3.4	0.7	-6.0	5.0	
	Thailand	5.4	1.7	-0.7	7.5	4.2	2.4	-7.1	4.0	
	Vietnam	7.1	5.7	5.4	6.4	7.1	7.0	1.6	6.7	

Table 2 continued...

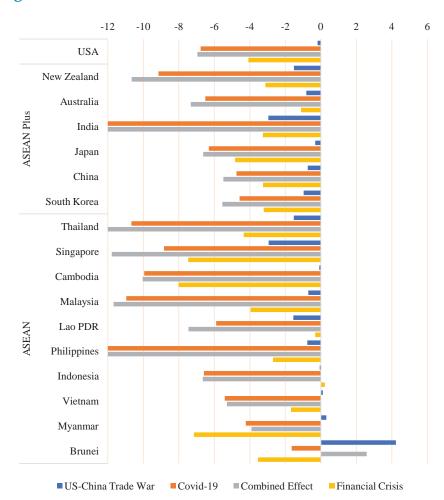
Table 2 continued...

9	Australia	4.4	2.7	1.9	2.4	2.7	1.8	-4.2	3.0
Plus	China	14.3	9.7	9.4	10.6	6.8	6.1	1.9	8.2
	India	9.8	3.9	8.5	10.3	6.1	4.2	-10.3	8.8
AN	Japan	1.7	-1.1	-5.4	4.2	0.3	0.7	-5.3	2.3
ASE	South Korea	5.8	3.0	0.8	6.8	2.7	2.0	-1.9	2.9
< <	New Zealand	4.0	-0.4	0.3	2.0	3.2	2.2	-6.1	4.4
	USA	1.9	-0.1	-2.5	2.6	2.9	2.3	-4.3	3.1

Note: IMF projections based on October 2020 update.

Source: IMF (2020).

Figure 2: ASEAN and India Vulnerabilities of the Covid-19 Period



Notes: The vulnerability index based on Vu (2020) is calculated as follows: Financial Crisis – difference between growth rate of average of 2005 to 2007 and growth rate of 2008 and 2009; US-China Trade War – difference between growth rate of average of 2016 to 2018 and growth rate of 2019; Covid-19 – difference between growth rate of average of 2017-2019 and growth rate of 2020. Combined effect - is the sum of two effects of US-China Trade War and Covid-19 shock mentioned above. The data on actual GDP growth rate for 2005-20018 are from IMF (2020). The GDP growth forecasts for 2020 is based on IMF projections based on October 2020 update.

Source: Authors' calculation based on IMF (2020).

Figure 2 shows the vulnerability index⁴ of Covid-19 shock on the economic growth, and how further the economic growth has deteriorated due to US-China trade war, which began in 2018 (pre-Covid-19 period) that has triggered the combined effect on weakening the GDP growth rate of all the ASEAN and ASEAN plus countries. Figure 2 also shows the episode of Covid-19 shock, which is much more severe than the last global financial crisis. The sign and magnitude of the index indicate the degree of the country's vulnerability to the shock. For instance, the impact of the US-China trade war has revealed mixed effect among ASEAN and ASEAN plus countries, whereas Singapore, Thailand, Malaysia, Lao PDR, India, Australia, South Korea, New Zealand and China have experienced negative and large shock. The mixed effect in ASEAN and ASEAN plus countries is due to the rise in FDI inflows to the region resulting of shifting MNC's production out of China.⁵

Further, Figure 2 also suggests that except Brunei, the vulnerability of Covid-19 on economic growth is very substantial across ASEAN and ASEAN plus countries. In particular, Thailand, Singapore, Malaysia, Cambodia, New Zealand, and Australia have witnessed negative and large shock, followed by the rest of the countries in bloc which have experienced negative shock between 4 to 6 per cent, respectively. Therefore, the combined effect of US-China trade war and Covid-19 shock has severely affected the development prospects of countries in the short-term. Both ASEAN and India require a big push in their economies to revive from the ongoing economic crisis. Once the crisis subsides, both of them will have to undertake another set of reforms in order to repair the damages left over by the Covid-19 and also to promote long-term prospects of the economies.

Vulnerabilities in trade is severe for ASEAN and India. Growth of exports and imports is highly deteriorated – declined by almost 25 per cent for the entire South Asian region. Both Southeast Asia and East Asia have experienced negative growth rate of about -7 per cent for the period January to June 2020 (Figure 3). Despite contraction in exports and imports, both Southeast Asia and East Asia have experienced trade surplus, whereas the surplus for the period January-June 2020 is below than what was recorded for the same period in previous years. On the contrary, South Asia has experienced relatively lesser trade deficit of about -US\$ 77 billion in January-June, 2020, compared to the previous year of about US\$ 123 billion in 2019 (January-June) (Figure 4). Similar pattern is also revealed for the Indo-Pacific and advanced economies.

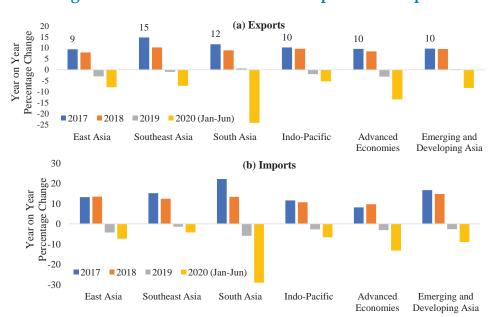


Figure 3: Year-on-Year Growth of Exports and Imports

Note: Growth rate for 2020 (Jan-June) is between 2019 (Jan-June) and 2020 (Jan-June) *Source:* DOTS, IMF.

2017 2018 2019 (Jan-June) 2020 (Jan-June)

2020 (Jan-June)

2020 (Jan-June)

2020 (Jan-June)

2020 (Jan-June)

2020 (Jan-June)

2020 (Jan-June)

2020 (Jan-June)

Figure 4: Current Account Balance among Selected Regions

Source: DOTS, IMF.

Exports in some of the ASEAN and ASEAN plus countries have declined by about 20 per cent during the Coronavirus outbreak. Among ASEAN countries, exports from Cambodia, Lao PDR, Myanmar and Thailand have declined by about 20 per cent between June 2019 and June 2020. The impact of Covid-19 outbreak is very visible when compared to the growth rate of exports for the years 2018 and 2019 (Table 3). Table 3 shows relaively less impact in case of import growth between June 2019 and June 2020, which has declined by less than 20 per cent for most of the ASEAN countries and the same has declined by 48 per cent in case of India. The growth rate of exports and imports in case of China during the Coronavirus outbreak has not affected much when compared with other countries in the region.

Table 3: Trends of ASEAN and ASEAN Plus Trade

				Expor	ts		Imports					
Country		2019	Growth Rate (2018- 2019)	June 2019	June 2020	Growth Rate (June 2019 - June 2020	2019	Growth Rate (2018- 2019)	June 2019	June 2020	Growth Rate (June 2019 - June 2020)	
		(US\$ billion)	(%)	(US\$ billion)		(%)	(US\$ billion)	(%)	(US\$	billion)	(%)	
	Brunei	7.3	10	0.5	0.7	43	5.0	21	0.4	0.4	-20	
	Cambodia	16.2	27	1.4	0.9	-30	21.5	18	1.9	1.6	-14	
	Indonesia	167.3	-4	11.8	11.9	1	173.7	-10	12.1	11.4	-5	
—	Lao PDR	5.9	3	0.5	0.4	-13	7.3	-1	0.6	0.6	-6	
ASEAN	Malaysia	238.1	-4	18.3	19.4	6	204.8	-6	15.8	14.5	-8	
4SE	Myanmar	18.1	8	1.3	1.0	-25	18.6	-4	1.5	1.5	0	
	The Philippines	70.9	5	6.1	5.7	-6	120.8	11	8.5	12.9	52	
	Singapore	390.7	-5	30.4	28.6	-6	359.2	-3	28.7	25.2	-12	
	Thailand	245.4	-2	21.7	16.7	-23	238.9	-4	18.6	15.3	-18	
	Vietnam	259.4	9	21.0	22.1	5	249.0	8	19.1	20.4	7	

Table 3 continued...

Table 3 continued...

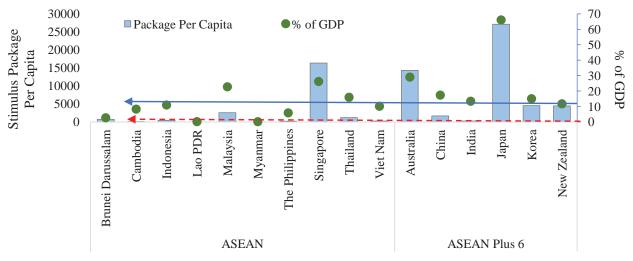
,,	Australia	272.6	7	24.3	21.8	-11	227.0	-6	17.4	17.0	-3
Plus 6	China	2498.5	0	212.8	213.6	0	2069.0	-3	161.9	167.2	3
	India	324.9	0	25.0	21.9	-12	479.9	-6	40.3	21.1	-48
AN	Japan	705.6	-4	60.9	45.2	-26	720.8	-4	55.5	44.5	-20
ASE	South Korea	542.6	-10	44.0	39.2	-11	502.8	-6	40.1	35.6	-11
	New Zealand	40.0	-0.35	3.3	3.3	-1	42.2	-3	3.1	3.0	-3

Source: DOTS, IMF.

3. Policy Measures in Response to Covid-19

Both ASEAN and India have experienced huge economic losses in the Covid-19 period. Supply chain disruptions have affected the trade in goods and services significantly, especially tourism and related services. Supply side shock and demand side crunch have affected the production and consumption in ASEAN countries and India. To revive from the Covid-19 crisis, ASEAN and India have initiated series of fiscal, monetary and trade policy measures and spent at least 10 per cent of GDP as stimulus. For instance, except Brunei, Cambodia, Lao PDR, Myanmar and the Philippines, rest ASEAN countries have spent more than 10 per cent of GDP as stimulus in response to Covid-19 (see Figure 5). India has spent about 13.4 per cent of GDP for various measures. Japan, Australia, Singapore and Malaysia have spent more than 20 per cent of GDP as the stimulus package, respectively.

Figure 5: Expenditure on Economic Stimulus Package by Per Capita and Share in GDP



Source: Asian Development Bank Covid-19 Policy Database, ADB.

Table 4: Policy Measures in Response to Covid-19 in ASEAN and India*

Measure	India	Brunei Darussalam	Cambodia	Indonesia	Lao PDR	Malaysia	Myanmar	The Philippines	Singapore	Thailand	Vietnam
Monetary Measure											
Value (US\$ Billion)	216.3		0.21	102.9	0.008	24.4	0.03	50.6	93.9	46.7	12.9
Interest rate cuts	√			√		√		√		√	
Liquidity Injection			√								
Regulatory forbearance	√				√						√
Refinancing Facilities						$\sqrt{}$					
Reserve Requirement Ratio Cuts	√		√	√		√				√	
Foreign Exchange Stabilisation and Controls	√			√							
Regulatory Measures in Banking	√		√	√			√	√	√	√	√
Fiscal Policy											
Value (US\$ Billion)	164.4	0.32		76.8	0.02	47.5	0.07	7.9	27.5	40.5	13.6
Fiscal Stimulus Package	√	√	√	√		√	√	√	√	√	√
Supporting SMEs		$\sqrt{}$	$\sqrt{}$	$\sqrt{}$	$\sqrt{}$						
Tax Exemption/Delay Deferment	√	$\sqrt{}$	√	√		√	√	√	√	√	$\sqrt{}$
Tariff Exemption Covid-19 Controls	√										√
Relief Measure	√		√		√			√			
Welfare Benefits	√	√	√	√	√	√	√	√	√	√	
Support to the Health care Sector	√	√	√	√		√	√	√	√	√	√
Support to MSMEs	√	√	√	√	√	√	√	√	√	√	√
Assistance to Priority Sector				√		√		√		√	$\sqrt{}$

Note: * For the period January-September 2020.

Sources: Authors' compilation based on ADB Covid-19 Policy and IMF Covid-19 Database; and the United Nations (2020).

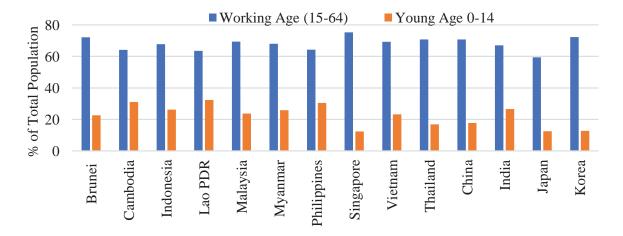
Table 4 presents complementary fiscal and monetary policy measures in response to Covid-19. Both ASEAN and India have initiated several fiscal policy measures such as initiation of stimulus packages, support to MSMEs, tax exemption, relief measures, welfare and health care services, etc. and expansionary monetary policy measures such as cutting interest rates, liquidity injection to the economy, open market operations to monitor the foreign exchange, easy loan facilities to the individual and businesses, relaxing banking regulatory to improve liquidity, etc. They have announced several stimulus packages for the

MSMEs. However, ASEAN countries have focused on four sectors such as travel, tourism, MSMEs and agriculture. India may look into the packages offered by the ASEAN that help to integrate regional supply chains leading to revive the MSMEs. ASEAN countries have offered income tax deferment, VAT collection deals and concessional loans.

4. Development Challenges in ASEAN and India

The major strength of ASEAN and India is primarily vast market size and strong human capital. The most populous nations in ASEAN are Indonesia (271 million), followed by the Philippines (108 million) and Vietnam (96 million). India is the second largest populated country with 1366 million in 2019 in Asia, which is expected to overtake China's population of 1398 million in few years time (see Table 5). Both ASEAN and India have youth population of about 25 to 30 per cent of their respective total population and the working age population of more than 60 per cent in 2019, which are the biggest strength of the region in terms of market size and labour supply to the production for the world (see Figure 6).

Figure 6: Share of Young and Working Age Population in ASEAN and India, 2019



Source: WDI, World Bank.

China and India are among the top ten largest economies in the world in 2019 and it is forecast that by 2050 both China and India would be the world's top two largest economies. The combined GDP of ASEAN is about US\$ 3.1 trillion, which is majorly contributed by Indonesia, Singapore, Malaysia, Thailand and the Philippines. The GDP per capita in Singapore, Brunei and Malaysia are considerably higher, touching US\$ 65,233, US\$ 31,087 and US\$ 11,415, respectively, in 2019. The GDP per capita in the ASEAN countries vary between US\$ 2000 to US\$ 7800 with the lowest GDP per capita recorded in Myanmar (US\$ 1408). India's GDP per capita is much lower than most of the ASEAN countries. In 2019, India's per capita GDP at current price was about US\$ 2,104, whereas, China's GDP per capita was five-time higher than that of India (US\$ 10,262).

The combined global trade of ASEAN and India is about US\$ 3.62 trillion in 2019. Except CLMV countries, the total trade of the other six ASEAN countries are more than US\$ 500 billion, having combined trade surplus of about US\$ 20 billion in 2019. India's total trade is about US\$ 804 billion with the trade deficit of about US\$ 155 billion in 2019. China is a trade-driven economy in the region with the total trade of about US\$ 4.5 trillion and has been maintaining trade surplus of about US\$ 429 billion in 2019.

Table 5: Basic Indicators of Selected Regional Countries, 2019

Region	Country	Land area Total (million Populatio sq. km) (million)		Current GDP	GDP Per Capita	Total Trade	Trade Balance Surplus/ Deficit
Reg		sq. kmj	(million)	(US\$ billion)	(Current US\$)	(US\$ billion)	(US\$ billion)
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
	Brunei Darussalam	0.01	0.43	13	31087	12.30	2.21
	Cambodia	0.18	16.49	27	1643	37.63	-5.30
	Indonesia	1.81	270.63	1119	4136	341.03	-6.41
	Lao PDR	0.23	7.17	18	2535	13.14	-1.41
AN	Malaysia	0.33	31.95	365	11415	442.94	33.27
ASEAN	Myanmar	0.65	54.05	76	1408	36.72	-0.48
< <	The Philippines	0.3	108.12	377	3485	191.64	-49.89
	Singapore	*	5.7	372	65233	749.90	31.49
	Thailand	0.51	69.63	544	7808	484.29	6.45
	Vietnam	0.31	96.46	262	2715	508.40	10.37
	ASEAN	4.00	661.00	3173.00	13146.00	2818.00	20.00
	China	9.39	1397.72	14343	10262	4567.50	429.60
us	India	2.97	1366.42	2875	2104	804.76	-155.03
ASEAN Plus	Japan	0.36	126.26	5082	40247	1426.43	-15.17
EAD	South Korea	0.1	51.71	1642	31762	1045.36	39.84
ASE	Australia	7.69	25.36	1393	54907	499.53	45.62
	New Zealand	0.26	4.92	207	42084	82.26	-2.16
	Indo-Pacific	74.23	5239.58	64041	578094	20589.12	-559.38

Note: * Negligible.
Source: WDI, World Bank.

Most of the ASEAN countries and India are domestic demand driven economies. Therefore, any shock in the domestic consumption would reflect in their economic growth. For instance, growth in India declined from 8 per cent in 2015 to 5 per cent in 2019 as domestic investment and consumption collapsed⁷ (Figure 7). Growth in China has declined from 7.1 per cent in 2015 to 6.1 per cent in 2019 due to trade tensions with the USA and weakening domestic demand. Figure 7 also shows that Singapore economy has slowed considerably. While most of the ASEAN countries have slowed mildly, Singapore in particular has witnessed a fast decline in growth partly due to the contraction of domestic demand and fall of merchandise exports. In addition, due to prolonged uncertainty from the trade conflict, weak global demand, and a downturn in the electronics cycle weighed on growth in the more open subregions of East and Southeast Asia.⁸ The contribution of investment to growth has also declined sharply due to contraction in the domestic demand and fall in exports, which might have affected the production capacities and declining profits. Overall, fall in economic growth was started prior to Covid-19, which is further deteriorated during the current pandemic outbreak in both ASEAN and India.

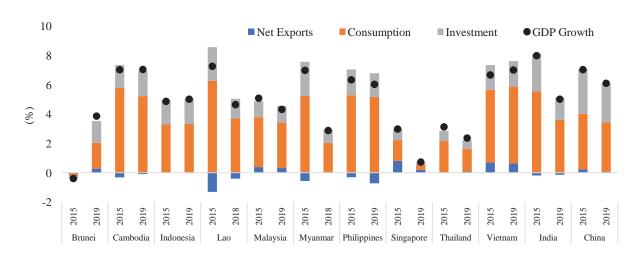


Figure 7: Demand Side Contribution to GDP Growth

Source: WDI, World Bank.

Social vulnerability are quite high due to economic shock. Cambodia (17.70 per cent), the Philippines (21.60 per cent), Lao PDR (23.40 per cent) and Myanmar (24.80 per cent) are the ASEAN countries which are having more than 20 per cent of population living below the poverty lines, whereas in case of India, it is about 21.90 per cent in 2018, respectively. ASEAN and India have been putting continuous effort to check the rising poverty rate and uplift the poor through various policy measures. Added to that, the Covid-19 outbreak has put more pressure and commitment to the government to initiate several social welfare measures, which are directly benefiting the poor such as direct money transfer, food supply through public distribution system, health care, etc.⁹

ASEAN and India should work together to revive the agriculture sector as it provides large-scale jobs and helps to reduce poverty. Both should continue with their respective national stimulus packages for MSMEs, strengthen domestic competitiveness and jointly work for resilient recovery. India may consider increasing bilateral and regional development aid to ASEAN through additional Line of Credit (LoC), technical assistance, etc.

Unemployment rates are low in most ASEAN countries. Cambodia (0.68 per cent), Lao PDR (0.63 per cent) and Thailand (1.10 per cent) have registered the lowest unemployment in ASEAN region in 2019. On the other hand, Brunei, the Philippines, and Indonesia have registered the highest unemployment of more than 5 per cent rate in 2019. ASEAN economies have been witnessing a structural shift in employment. In most ASEAN economies, manufacturing as a share of total employment is falling, while services share is rising. This could reduce the share of wage workers more and services sector tends to have more self-employed people and independent professionals. This also has implications for overall productivity growth, since productivity in manufacturing is highest in the ASEAN region, especially in electronics, textiles, and machineries, among others.¹⁰

Table 6: Socio-Economic Development Indicators, 2018

Coı	untry	Poverty Headcount Ratio (2018)	GINI Coefficient (2018)	Human Development Index Rank (2018)	Unemployment Rate (%) (2019)	Natural Resource Depletion (% GNI) (2017)	CO2 emissions (Metric Tons Per Capita) (2016)
	Brunei Darussalam	-		43	9.32	10.9	18.26
	Cambodia	17.70	0.46	146	0.68	1.0	0.63
	Indonesia	9.80	0.57	111	5.28	1.9	2.15
Z	Lao PDR	23.40	0.50	140	0.63	6.3	2.59
ASEAN	Malaysia	0.40		61	3.28	3.1	8.09
AS	Myanmar	24.80	0.49	145	4.00	2.7	0.48
	Philippines	21.60	0.50	106	5.08	0.7	1.18
	Singapore	-	0.75	9	2.25	0.00	6.69
	Thailand	9.90	0.59	77	1.10	1.6	4.11
	Vietnam	6.70	0.51	118	2.21	1.0	2.06
9	Australia	-	0.76	6.0	5.18	3	15.54
ns	China	1.70	0.56	85	3.62	0.9	7.18
ASEAN Plus	India	21.90	0.52	129	6.00	1.0	1.82
A	Japan	-	0.85	19	2.36	0.01	8.94
SE	South Korea	-	0.71	22	3.78	0.006	12.11
	New Zealand	-	0.74	14	4.05	0.5	7.33
	South Asia (Excluding India)	21.26	0.51	-	4.49	0.77	1.14
	USA	-	0.70	15	3.67	0.2	15.50

Sources: UNDP Database and WDI, World Bank.

India recorded about 6 per cent of unemployment rate in 2019. During the outbreak of Covid-19, India's unemployment rate is presumed to have increased. The Covid-19 has drastically affected the normal functioning of firms in the supply chain, which has hit the MSMEs across the country. In case of ASEAN countries, unemployment rate is expected to rise across all member countries. ¹¹ Several million workers have lost their jobs. ¹² In particular, the Covid-19 outbreak has affected employment of young people - about one in six young people worldwide have lost their job. ¹³ With the outbreak of Covid-19, India has monetarily supported millions of citizens through direct cash transfer and public distribution system (see Box 1). Both ASEAN and India have announced fiscal packages to help affected businesses and households (see Table 4 and Figure 5), which may help to revive the economies and create new jobs and employment opportunities for the masses.

Human Development Index (HDI) reflects the development progress on aspects of human quality in a country. The development of HDI varies across the ASEAN region. For instance, the HDI rank is high in Singapore (9), Brunei Darussalam (43) and Malaysia (61). On the other hand, the HDI rank is low for some of the ASEAN countries like Lao PDR (140), Myanmar (145), and Cambodia (146) in 2019. This shows the existence of wider HDI gap in ASEAN. At the 36th ASEAN Summit, ASEAN has adopted: "ASEAN Declaration on Human Resources Development for the Changing World of Work, which commits ASEAN member states to promote lifelong learning with a view to preparing the region's human resources to adapt to the changing world to work due to technological advances, demographic transition and greening economies". ¹⁴ India's HDI rank is as low as 129 in 2019, compared to other ASEAN plus

countries in 2019. What follows is that the Covid-19 has not only affected economies but also the human development through declining health condition and labour movement.

Box 1: Direct Benefit Transfer in Covid-19 Period

Digital technology has been a cornerstone of India's public policy since 2014 with the creation of the JAM trinity (Jan Dhan bank account for the underprivileged, Aadhaar number and Mobile phone number). This allows easy transfer identification and direct transfer of government benefits such as subsidies and cash transfers to the people through their Aadhaar seeded bank accounts under the Direct Benefit Transfer (DBT) programme. In the past seven years, DBT emerged as the accepted way of delivering development schemes with the delivery of over 450 schemes to more than 900 million people through this mode.

With the outbreak of the Covid-19, DBT emerged as a boon in providing succour and relief to millions of citizens whose livelihood was impacted. The Public Financial Management System (PFMS) recorded the highest number of transactions in a single day on 30 March, 2020 of 2.19 crore transactions largely driven by DBT payments. Cash amounts were transferred using the digital payments technology vehicle, Public Financial Management System (PFMS) under Central Schemes (CS) and Centrally Sponsored Schemes (CSS). Between March 24 and April 17, the DBT payments under all the central sector/centrally sponsored schemes through PFMS amounted to Rs 27,442.08 crore in the accounts of 11.42 crore beneficiaries through schemes like PM-KISAN, Mahatma Gandhi National Employment Guarantee Scheme (MGNREGS), National Social Assistance Program (NSAP), Prime Minister's Matru Vandana Yojana (PMMVY), National Rural Livelihood Mission (NRLM), National Health Mission (NHM), scholarship schemes of various ministries through the National Scholarship Portal (NSP). In addition, states like UP, Bihar, Madhya Pradesh, Tripura, Maharashtra, Jammu & Kashmir, Andhra Pradesh also leveraged on the DBT platform of PFMS. Through 180 welfare schemes, the state governments using PFMS have disbursed to 4.59 crore beneficiaries, an amount of Rs 9,217.22 crore between March 24 and April 17, 2020. Till 9 October, 2020, of the financial year 2020-21, a total of 47 Crore beneficiaries received DBT relief to the tune of Rs. 1,41,714 crore.

Source: Authors' compilation from various sources.

Climate change is one of the major concerns in both ASEAN and India. ASEAN is most vulnerable to the adverse impacts of rising global temperatures. ASEAN countries remain committed to cut emissions and decarbonise their economies. One of the key commitments made by ASEAN is to achieve a 21.9 per cent reduction in 2020. Besides, there are also other initiatives being developed to target specific sectors, such as the ASEAN Fuel Economy Roadmap for the Transport Sector 2018-2025. 15 Vision and Strategic Plan for ASEAN Cooperation in Food, Agriculture and Forestry (SP-FAF) 2016-2025 was adopted by the AMAF in 2015 to provide a platform for ASEAN to strengthen mechanisms, and develop capabilities to prevent and reduce losses due to disasters and emergencies through concerted national efforts and intensified regional and international cooperation. Various action programmes have been proposed such as increasing investment in research and development (R&D) in the areas of technologies and management systems with a focus on resilience to facilitate climate smart agriculture, land use, and fishery in cooperation; and promote good agriculture practices to minimise the negative effects on natural resources. These action programmes will further strengthen food security arrangement in the region. India has initiated the International Solar Alliance (ISA), where most of the ASEAN countries are prospective members of ISA, among which Cambodia has signed and Myanmar has signed and ratified the ISA Framework Agreement (see Box 2). ISA's focus is to bring together a group of nations to endorse clean energy, sustainable environment, public transport and climate through solar power utilisation and move towards low-carbon growth path.

To meet these challenges, ASEAN and India have clear developmental ambitions to achieve progress and prosperity for the nations (Table 7). Most of the ASEAN countries and India have common goal to achieve uplift their economic status, raise the per capita income and quality of life of the people, alleviate poverty, and empower the economy through digital and technological innovation in the next 20 to 30 years.

Box 2: International Solar Alliance (ISA)

The International Solar Alliance (ISA) is a treaty-based intergovernmental organisation launched by Prime Minister Narendra Modi of India and Former President François Hollande of France for addressing the special energy needs of solar-resource-rich countries. ISA's mission is to provide a dedicated platform for cooperation among solar-resource-rich countries and the wider global community including bilateral and multilateral organisations, industry and other stakeholders to support the increasing use and quality of solar energy in meeting energy needs of prospective ISA member countries in a safe, convenient, affordable, equitable and sustainable manner. Eighty-eight countries have signed and seventy countries have signed and ratified the ISA Framework Agreement. ISA commits itself to the following objectives: collectively address key common challenges to scale up solar energy applications; mobilise investments of more than US\$ 1000 billion by 2030; take coordinated action through programmes and activities launched on a voluntary basis, aimed at better harmonisation, aggregation of demand, risk and resources, for promoting solar finance, solar technologies, innovation, R&D, capacity building, etc.; reduce the cost of finance to increase investments by promoting innovative financial mechanisms and mobilising finance from Institutions; scale up applications of solar technologies and facilitate collaborative research and development (R&D) activities in solar energy technologies among member countries and promote a common cyber platform for networking, cooperation and exchange of ideas among member countries.

Source: https://isolaralliance.org/

Table 7: Development Vision of ASEAN and India

Country	Development Ambition	Document (Year of Issue)
Brunei	Joining the world's top 10 in quality of life and per capita income in 2035	Vision 2035 (2004)
Cambodia	Aiming to become an upper-middle-income nation by 2030 and a developed country by 2050	Prime Minister Hun Sen's statement (2013)
Indonesia	Becoming an advanced and prosperous nation among the world's largest five economies by 2045	The Vision of Indonesia 2045 (2019)
Lao PDR	Becoming an upper-middle-income country by 2035	The 8 th Five-Year National Socioeconomic Development Plan, 2016-2020 (2016)
Malaysia	Elevating the country's status to a developed economy by 2020	The 11 th Malaysia Plan (2015)
Myanmar	People working together to build a brighter future in a pluralistic and prosperous nation	The Myanmar Sustainable Development Plan, 2018-2030 (2018)
The Philippines	Becoming a prosperous middle-class society free of poverty by 2040	Our Ambition 2040 (2015)

Table 7 continued...

Singapore	Envisioning a "Smart Nation" that is a leading economy powered by digital innovation, and a world-class city	Singapore's Smart Nation Initiative (2014)
Thailand	Turning Thailand into a developed country by 2037	National strategy Thailand 4.0 (2018)
Vietnam	Becoming among the top three ASEAN countries in industry by 2030, with some of its industries being globally competitive; becoming a modern industrialized country by 2045	The Political Bureau Resolution No.23-NQ/TW (2018)
India	Atmanirbhar Bharat 'self-reliant India'; Targeting US\$ 5 trillion economy by 2025; India Development Vision 2030 to be proactive and responsible bureaucracy; Alleviate poverty, malnutrition and illiteracy; vision towards modern, technology-driven, high growth, equitable and transparent society.	Interim-Budget (2019) and Economic Survey (2020)

Sources: Vu (2020) and other secondary sources.

ASEAN and India's development vision prior to the Covid-19 did not anticipate such a strong impact on both to the economy and health of people. The 'New Normal' experience due to the Covid-19 outbreak has posed both challenges and opportunities. ASEAN and India at different levels have cooperated and initiated several projects and programmes for the prosperity of the nations. ASEAN and India can leverage the emerging Covid-19 scenario and support each other to build new and stronger supply chains. Some of the ASEAN countries are already well integrated with the global value chains, which will help them regaining the faith of the global investors. New supply chains may offer new business opportunities to MSMEs, which are presently suffering from the lack of orders. Besides, there are huge business opportunities for MSMEs and Start-ups in the post-Covid-19, particularly in digital connectivity, e-commerce, cross-border delivery services, logistics business, etc.

5. Concluding Remarks

The rise of Covid-19 cases and the series of downwards thereafter have slowed down the economic activities in ASEAN and India. ASEAN and India have responded swiftly to the pandemic by initiating several fiscal and monetary policy measures. Due to severe economic disruptions and to contain the inflation pressures, central banks have sharply lowered their policy rates, relaxing liquidity constraints, reforming banking norms to encourage bank lending to the households and businesses. On the other hand, ASEAN and India have announced fiscal policy measures to recover from immediate health crisis and protect lives and have also initiated socio-economic programmes to avoid economic contraction. While these are standalone measures, there is scope of working together to support increased production and ensure that the resources are optimally utilised. Besides, upholding a stable rules-based international trading system would help to move towards stable economic recovery. In this context, the emerging architecture of 'Indo-Pacific' has a potential opportunity to foster economic relations, strengthen regional capacity and capability to recover from the Covid-19 crisis.

Endnotes

- 1. Refer, for example, IMF (2020)
- 2. Refer, ASEAN (2020a)
- Refer, ADB (2020)
- 4. Vu (2020) estimated the vulnerability index, which is calculated based on the gap in GDP growth between the rate observed for the 'damage' year and average three-year GDP growth of previous period prior to the 'damage' year. The sign and magnitude of the index for a country regarding a given shock indicates the degree of the country's vulnerability to the shock.
- 5. Refer, Vu (2020).
- 6. Refer, for example, PWC (2017).
- 7. Refer, IMF (2020)
- 8. Refer, ADB (2020)
- 9. Refer, Table 4 for more details
- 10. Refer, for example, PHD (2019).
- 11. Refer, for example, UN (2020).
- 12. Refer, for example, Hutt (2020).
- 13. Refer, for example, ILO (2020).
- 14. Refer, for example, ASEAN (2020b).
- 15. Refer, for example, ASEAN (2020c).

References

ADB. 2020. What Drives Innovation in Asia? Asian Development Outlook, Manila, April 2020.

ASEAN. 2020a. Joint Media Statement. The Eighth EAS Economic Ministers' Meeting, 28 August 2020.

- 2020b. Chairman's Statement of the 36th ASEAN Summit, Cohesive and Responsive ASEA. 26 June 2020. Available at: https://asean.org/storage/2020/06/Chairman-Statement-of-the-36th-ASEAN-Summit-FINAL.pdf
- 2020c. View Point, H.E. Say Samal Minister of Environment, Cambodia Chair, ASEAN Ministerial Meeting on the Environment, The ASEAN, Issue No.5, September 2020. Available at: https://asean.org/storage/2020/10/ The-ASEAN-Magazine-Issue-5-September-2020.pdf
- DEA. 2020. Macroeconomic Report. Economic Division, Department of Economic Affairs, Government of India, May 2020.
- Hutt, David. 2020. Mass unemployment the new normal in SE Asia. *Asia Times*, May 29, 2020. Available at https://asiatimes.com/2020/05/mass-unemployment-the-new-normal-in-se-asia/
- IMF. 2020. World Economic Outlook 2020. International Monetary Fund, October 2020.
- PHD. 2019. India's Trade and Investment Opportunities with ASEAN Economies. PHD Chamber of Commerce and Industry, November 2019, New Delhi.
- PWC. 2017. The Long View: How will the global economic order change by 2050? Price Water Coopers, February 2017. Available at: https://www.pwc.com/gx/en/world-2050/assets/pwc-the-world-in-2050-full-report-feb-2017.pdf
- Ray, S. S. 2020. Jobless: India's unemployment rate rises to nine-week high of 9.1%. *Financial Express*, August 18, 2020. Available at: https://www.financialexpress.com/economy/jobless-indias-unemployment-rate-rises-to-nine-week-high-of-9-1/2057859/
- United Nations. 2020. The Impact of Covid-19 on South-East Asia, Policy Brief, Geneva, July, 1-29. Available at: https://www.unescap.org/sites/default/d8files/2020-07/SG-Policy-brief-COVID-19-and-South-East-Asia-30-July-2020.pdf
- Vu, K. 2020. ASEAN Economic Prospects Amid Emerging Turbulence: Development Challenges and Implications for Reform. *Foreign Policy Paper*, Brookings Foreign Policy, July 2020. Available at: https://www.brookings.edu/wp-content/uploads/2020/07/FP_20200715_asean_economic_prospects_vu.pdf (assessed on 3 October 2020)

2

ASEAN-India Trade Relations: Emerging Trends, Challenges and Opportunities

1. Introduction

he world has been facing extraordinary challenges due to the outbreak of Coronavirus pandemic (Covid-19), which has disrupted the lives of the people, businesses and other economic activities across the world. The world has witnessed a sharp decline in the economic growth and trade, more particularly in the first half of 2020. The world trade is expected to fall by 9.2 per cent in 2020 and rise by 7.2 per cent in 2021¹.

Recent release of growth forecast of IMF indicates that a rebound is expected in 2021 in developing Asia². Trade may pick up pace when we find that the world is coming back to growth path and *vice versa*. An encouraging sign is that India's exports grew in September 2020 after contracting for six consecutive months, mainly driven by growth in outbound shipment of engineering, petroleum, pharmaceuticals and readymade garments.

The Coronavirus did not spare any country or region. Figures 1, 2 and 3 show seasonally adjusted year-on-year growth rate of monthly merchandise export and import by regions and selected countries. Figure 1 depicts the fall of exports and imports across all the regions. Similar trend of fall in ASEAN's exports and imports to their partner countries (Figure 2) and India's exports to and imports from ASEAN countries (Figure 3) tell us that both developing Asia and advanced economies have weakened tremendously in trade due to the pandemic and also exposed to the slowing regional integration and inter-dependence with the global economy. These figures also show that trade was already slowing down in 2019 before the pandemic started happening due to trade tensions and declining economic growth³.

In this context, this chapter analyses the trends of ASEAN and India trade relations amidst the pandemic. Besides, ten-year completion of ASEAN-India FTA (AIFTA) has called for reviewing AIFTA and to explore new opportunities.

Given that ASEAN and India are important driving forces of the emerging global order, this chapter presents the policy recommendations and a way forward to tap the potential opportunities to trade and enhance the regional integration in the Indo-Pacific.

(%) Exports 30.0 **Imports** 30.0 20.0 20.0 (%) 10.0 10.0 0.0 United States (%) United States World World Advanced Economies 0.0 Advanced Economies Emerging and Developing Economies
Emerging and Developing Asia
European Union
ASEAN Emerging and Developing Economic Emerging and Developing Asia -10.0 European Union ASEAN -10.0 South Asia -20.0 South Asia Central Asia Central Asia Africa Africa Latin America Latin America Jan 2018

May 2018-Pull 2018 at 2018 2018 2018

Jul 2018 3 2018

Nov 2018

Jan 2019 -20.0 -30.0 Indo-Pacific May 2018 july 2018 July 2018 Mar 2019 May 2019 Sep 2019 Nov 2019 Sep 2017 Sep 2018
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Figure 1: Year-on-Year Growth Rate of Regional Trade

Source: Direction of Trade Statistics, IMF Database.

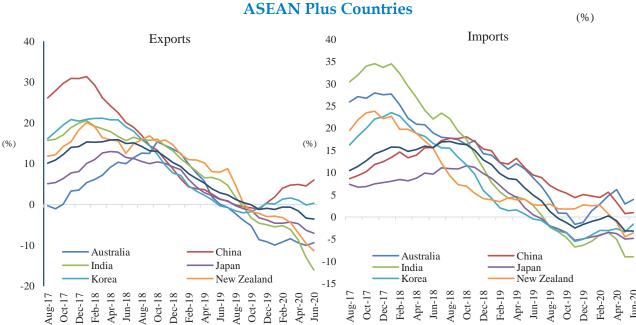


Figure 2: Year-on-Year Growth Rate of ASEAN's Exports to and Imports from

Source: Direction of Trade Statistics, IMF Database.

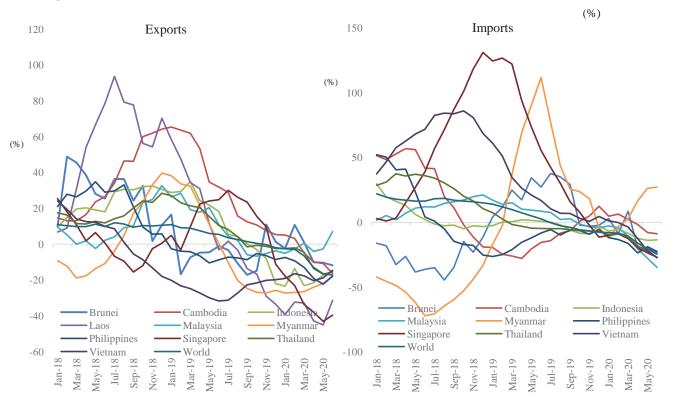


Figure 3: Year-on-Year Growth Rate of India's Exports to and Imports from ASEAN

Source: Direction of Trade Statistics, IMF.

Rest of the chapter is arranged as follows: Section 2 presents the trends of ASEAN-India trade. Section 3 discusses the trade liberalisation pattern under ASEAN-India FTA. Removal of NTMs and its impact is explained in the Section 4. Section 5 showcases overlapping FTA partners between India and ASEAN. The emerging concept of Indo-Pacific and its trade pattern is then presented in Section 6. Recommendations for strengthening ASEAN-India economic relations are discussed in Section 7. Finally, the conclusions are drawn in the last section.

2. ASEAN-India Trade in Goods: Emerging Trends

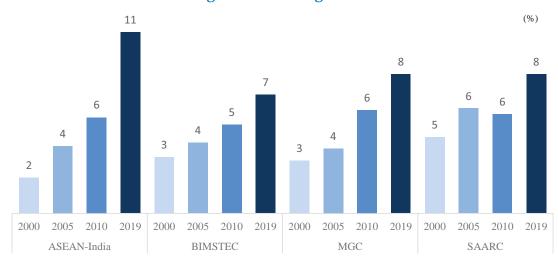
ASEAN has become India's one of the largest trading partners in recent years. In terms of intra-regional trade, ASEAN-India trade has significantly increased from US\$ 8.99 billion in 2000 to US\$ 91.20 billion in 2019, compared to other regional blocks in the region (see Table 1). The rise of intra-regional trade volume from US\$ 53.40 billion in 2010 to US\$ 91.20 billion in 2019 was influenced by the ASEAN-India FTA in goods and other bilateral agreements signed. The intra-regional trade between ASEAN and India holds the share of about 11 per cent in ASEAN and India's total export to the world. In case of other regional groupings, the share of BIMSTEC, MGC and SAARC was close to 7 to 8 per cent in 2019, which is almost three times lower than that of ASEAN-India intra-regional trade (see Figure 4).

Table 1: Intra-regional Trade Value

Year	ASEAN-India	BIMSTEC	MGC	SAARC		
	(US\$ Billion)					
2000	8.99	3.92	3.95	2.45		
2005	22.90	9.65	9.63	8.34		
2010	53.40	23.67	31.30	16.07		
2019	91.20	45.80	73.63	33.57		

Source: Authors calculations based on WITS Database.

Figure 4: Intra-regional Trade



Source: Authors' calculations based on WITS Database.

India's export to ASEAN has grown at a rate of 5 per cent between 2010 and 2019. Most of India's exports to ASEAN countries have been directed to Singapore, Malaysia, Indonesia, Thailand, and Vietnam. However, in terms of annualised growth rate, India's export has grown significantly with CLMV countries and Brunei in the range of 10 to 15 per cent between the years 2010 and 2019. India's import from ASEAN has been growing slightly faster than the country's export to ASEAN. In 2019, India's import from ASEAN was US\$ 56.28, whereas the export to ASEAN was amounted to US\$ 34.66 billion (Table 2).

Table 2: India's Export to and Import from ASEAN

		Export (US\$ billion)			Import (US\$ billion)			
Country 2010		2019	Annualized Growth Rate (%)	2010	2019	Annualized Growth Rate (%)		
Brunei	0.02	0.05	10.8	0.21	0.54	11.2		
Cambodia	0.06	0.20	14.2	0.01	0.04	21.6		
Indonesia	4.57	4.62	0.1	9.72	14.89	4.9		
Lao PDR	0.01	0.03	14.6	0.02	0.00	-20.0		
Malaysia	3.55	6.41	6.8	6.00	10.32	6.2		

Table 2 continued...

Myanmar	0.27	0.95	14.8	1.12	0.54	-7.8
The Philippines	0.80	1.62	8.1	0.40	0.55	3.7
Singapore	9.09	10.86	2.0	7.27	14.83	8.2
Thailand	2.14	4.30	8.0	3.95	7.04	6.6
Vietnam	2.49	5.61	9.5	1.00	7.53	25.2
ASEAN	23.02	34.66	4.7	29.68	56.28	7.4

Source: DOTS, IMF.

In the pre-Covid-19 period, the growth rate of India's exports to and imports from ASEAN came out negative for most of the ASEAN countries between 2018 and 2019 due to trade tensions and declining economic growth⁴ (see Table 3). However, the fall of India's trade between 2018 and 2019 was much lower for some of the major trading partners in ASEAN such as Singapore, Thailand, Malaysia, Indonesia and The Philippines. In the Covid-19 period, India's exports to both ASEAN and ASEAN plus countries have witnessed positive growth. For instance, year-on-year growth rate of India's exports to ASEAN and ASEAN plus between June-2019 and June-2020 is found to be greater than 20 per cent for most of the countries. On the other hand, India's imports from both ASEAN and ASEAN plus countries have recorded negative growth for most of the countries between June-2019 and June-2020. Table 3 clearly shows that the Covid-19 has severely affected India's trade with the ASEAN and ASEAN plus countries. It is expected that once the world pass-through the current pandemic, there is further scope of trade expansion between ASEAN and India.

Table 3: India's Trade with ASEAN, ASEAN+6 Countries and World

		Export (US\$ Billion)				Import (US\$ Billion)					
Country		2019	Growth Rate (2018- 2019), %	June- 2019	June- 2020	Growth Rate (June 2019-June 2020), %	2019	Growth Rate (2018- 2019), %	June 2019	June 2020	Growth Rate (June 2019-June 2020), %
	Brunei	0.057	-15.2	0.002	0.003	36.6	0.58	34.4	0.05	0.03	-38.8
	Cambodia	0.20	14.3	0.017	0.011	-34.6	0.05	-3.9	0.00	0.004	0.0
	Indonesia	4.52	-5.6	0.286	0.286	0.0	15.54	-3.0	1.11	0.73	-34.3
	Lao PDR	0.03	-21.8	0.002	0.005	164.9	0.00	-84.9	0.00	0.00	-27.3
ASEAN	Malaysia	6.26	-3.9	0.337	0.589	75.0	10.41	0.0	0.88	0.33	-62.9
4SE	Myanmar	0.96	-22.2	0.081	0.073	-10.3	0.51	13.2	0.02	0.02	-12.0
7	The Philippines	1.63	-6.6	0.118	0.146	23.8	0.56	-9.7	0.04	0.03	-39.7
	Singapore	10.79	3.5	0.694	0.919	32.5	14.90	4.0	1.31	0.65	-50.3
	Thailand	4.33	-0.9	0.325	0.296	-8.9	7.04	-8.2	0.65	0.28	-56.1
	Vietnam	5.51	-17.9	0.335	0.478	42.7	7.45	3.3	0.72	0.44	-39.3
	Australia	2.96	-21.0	0.217	0.386	78.0	10.57	-25.2	0.97	0.47	-51.8
9 sn	China	17.27	5.3	1.181	2.103	78.1	68.34	-7.3	5.91	3.32	-43.7
Pl	Japan	4.82	1.6	0.365	0.382	4.7	12.75	1.7	1.01	0.64	-36.5
ASEAN Plus	Korea	4.65	-3.1	0.352	0.406	15.3	16.11	-1.5	1.46	0.64	-56.3
SE	New Zealand	0.38	1.3	0.031	0.047	53.2	0.56	-11.9	0.04	0.02	-58.8
Ā	World	324.86	0.5	25	22	-12.4	479.89	-5.7	40.33	21.11	-47.6

Source: DOTS, IMF.

The components of India's export to ASEAN are remained almost similar for the last one decade. India's major exports to ASEAN were mineral products (21.1 per cent), chemical products (13.8 per cent), base metals (13 per cent), machinery and electrical (11.2 per cent), transport equipment (10.6 per cent) and live animals (8.4 per cent) in 2019-20 (see Figure 5). Similarly, the trends of India's commodity-wise import from ASEAN are almost similar to that of India's exports to ASEAN. However, India's export to ASEAN is more diverse than India's import from ASEAN at commodity level. For instance, mineral products (25.8 per cent), chemical products (21.4 per cent), base metals (9.6 per cent), machinery & electrical (9.4 per cent) and transport equipment (9.1 per cent) together have covered about 80 per cent of India's import from ASEAN in 2019 (see Figure 5).

26 India's Exports ■ India's Imports 21 21 13 119 1 1 Vegetable Products Rubber & Raw hide & skins Machinery & Electrical Transport Equipment Live Animals James & Jewellery Stone and Cement Textile Chemical Base Metals nstruments Products Plastic

Figure 5: Sector-wise Share of India's Exports to and Imports from ASEAN, 2019-20

Note: Refer Appendix 1 for disaggregated trends for the years 2010-11 and 2019-20.

Source: Export-Import Databank, Department of Commerce, India.

2.1 Forecast of ASEAN-India Trade

Based on the Gravity modelling framework, we have projected the ASEAN-India trade for the years 2021 and 2025 (see Figure 6). The detailed estimated models are given in Appendix 2. The forecast in 2021 is based on the IMF's new GDP series (IMF, 2020). In case of the year 2025, we assume the growth rate of GDP at 7 per cent for India, and, for the ASEAN countries, it ranges between 5 to 7 per cent based on past five-year growth rate of GDP. Trade forecast indicates that there would be fall in ASEAN-India trade in the year 2021 due to the pandemic, which is likely to be declined to US\$ 84.1 billion from US\$ 90.1 billion in 2019. However, being the Covid-19 a temporary phenomenon, we, therefore, expect a sharp rise in ASEAN-India trade along with rebound of ASEAN economies and India from the current global crisis. Accordingly, this forecast indicates that ASEAN-India trade may reach US\$ 116.1 billion by 2025. Therefore, the Covid-19 could delay in achieving the trade target of US\$ 200 billion by 2022. Reviewing the AIFTA and its fully and effective utilisation would perhaps help to realise the targets and promoting sustainable and inclusive economic growth for both ASEAN and India.

140 **Forecast** Exports **■** Imports ■ Total 116.1 120 90.9 84.1 80 69 56.3 52.7 51.4 47 34.7 32.7 40 29.7 23.0 20 0 2010 2019 2021 2025

Figure 6: Trade Projection based on Gravity Model: India's Exports to and Imports from ASEAN for 2021 and 2025

Note: The forecast for the year 2021 is based on the IMF forecasted GDP growth rate. For the year 2025, we assume the growth rate of GDP for India is at 7 per cent and for the ASEAN countries it ranges between 5 to 7 per cent based on past five years of GDP. *Source*: Authors' own

3. Trade Liberalisation under the ASEAN-India FTA

The implementation of the AIFTA has provided a stepping-stone to broader liberalisation, and it is evident that trade has increased significantly between ASEAN and India over time in pre-Covid-19 phase. The AIFTA came into effect on 1 January 2010. The complete preferential market access to eliminate tariff under the AIFTA has covered tariff schedule under the Normal Track –1 by 2013 and Normal Track-2 by 2016 for the respective member countries, except the Philippines and CLMV countries, for which the schedule of liberalisation has been extended till 2019 (see Appendix 3). Both ASEAN and India have agreed to progressively eliminate tariffs on 70 to 80 per cent of the tariff lines, accounting for about 75 per cent of the trade by covering about 70 to 80 per cent of the total products (see Figure 7). About 70 per cent of the tariff lines are covered under both Normal Track 1 and Normal Track 2 (see Table 4). The other tariff lines have been covered in the agreement for the partial preferential market access under the exclusion list, sensitive track and highly sensitive list which are excluded from the scope of preferential market access under the AIFTA (see Table 4).

No. of Tariff Lines Tariff Lines (%) **ASEAN Imports (%)** NT1 (Dec 2013) 7450 64.70 53.70 NT2 (Dec 2016) 1098 9.50 5.40 Special Products (HSL) 40 0.30 18.20 Sensitive Track 15.20 1595 13.80 Exclusion 1338 11.60 7.50 Elimination 74.20 59.10 8548 Total 11521

Table 4: India's Tariff Scheduling under the ASEAN-India FTA

Source: Authors' own based on AIFTA.

Brunei
Cambodia
Indonesia
Lao PDR
Malaysia
Myanmar
Thailand
Vietnam
India

Brunei
80.1

77.5

77.5

78.1

73.4

100

75.6

Figure 7: Tariff Commitments under the ASEAN-India FTA

Source: Authors' own based on AIFTA.

Table 5 shows that the number of products at HS 8-digit level traded in post-FTA between ASEAN and India has grown significantly high over 100 per cent for the CLMV countries. In fact, India has exported higher number of products to the ASEAN countries, compared to India's import from ASEAN. For instance, India's exports have added about 600 to 1300 number of products to the ASEAN countries such as CLMV countries, whereas, India's imports from ASEAN have added mostly from Singapore (1541) and Vietnam (655), respectively (Figure 8). For instance, out of major commodities⁵ at HS 6-digit level, India's export to ASEAN has added 11 new products, whereas India's import from ASEAN has added 7 new products in 2019-2020, compared to 2010-2011 (see Appendix 4). This shows that the ASEAN-India FTA has significantly facilitated the trade, both in terms of value and volume.

Table 5: Number of Products Traded between ASEAN and India

	India's Export		Growth Rate	India's	Import	Growth Rate
Country	2010-11	2019-20	between 2010-11 and 2019-20 (%)	2010-11	2019-20	between 2010-11 and 2019-20 (%)
Brunei	334	816	144.31	11	46	318.18
Cambodia	533	1133	112.57	70	262	274.29
Indonesia	3022	3688	22.04	2221	2219	-0.09
Lao PDR	121	305	152.07	7	21	200.00
Malaysia	4235	4706	11.12	3119	2775	-11.03
Myanmar	1122	2413	115.06	159	295	85.53
The Philippines	2277	3244	42.47	910	791	-13.08
Singapore	4405	4562	3.56	2768	4309	55.67
Thailand	3581	4242	18.46	3546	3231	-8.88
Vietnam	2485	3519	41.61	1306	1961	50.15
ASEAN	2212	2863	29.45	1412	1591	12.70

Note: Data calculated at HS 8 digit product level.

Source: Export-Import Databank, Department of Commerce, India.

■ India's Exports ■ India's Imports 1541 1291 1034 967 666 661 655 600 482 471 184 157 136 -2 -119 -344 -315 Malaysia Indonesia Lao PDR Myanmar The Philippines

Figure 8: Number of Products at HS 8-digit level Added in ASEAN-India Trade between 2010-11 and 2019-20

Note: Data calculated at HS 8-digit product level.

Source: Export-Import Databank, Department of Commerce, India.

In terms of top export and import items between ASEAN and India at HS 2-digit level, Table 6 shows that there is a shift in the components of India's export to ASEAN in post-FTA phase. For instance, barring mineral products, other products like meat and edible meal products (7.4 per cent), machinery items (7.0 per cent) and organic chemicals (5.9 per cent) are elevated to the segment of top commodity exports to ASEAN in post-FTA (see Table 6). For instance, about 72 per cent of India's export to ASEAN at HS 6-digit level captures these products. Particularly, India's exports to ASEAN of 54 commodities at HS 6-digit level have grown more than 10 per cent CAGR between the years 2010-11 and 2019-20 (see Appendix 5).

Table 6: India's Top Export Items to ASEAN (Pre- and Post- FTA)*

Top Commodity Exports in Pre-FTA (2009)	Top Commodity Exports in Post-FTA (2019)
Mineral fuels, mineral oils and products of their distillations; etc (17.6 per cent)	Mineral fuels, mineral oils and products of their distillations; etc (26.2 per cent)
Ships, boats and floating structure (13 per cent)	Meat and edible meal products (7.4 per cent)
Electrical machinery and equipment and parts thereof; sound recorders, TVs (8.3 per cent)	Machinery, mechanical appliances, nuclear reactors, boilers, thereof (7.0 per cent)
Natural or cultured pearls, precious or semi- precious stones, precious metals (6.4 per cent)	Organic chemicals (5.9 per cent)
Machinery, mechanical appliances, nuclear reactors, boilers, thereof (5.2 per cent)	Fish and other aquaculture products (4.4 per cent)
Organic chemicals (4.4 per cent)	Motor vehicles other than railway or tramway goods (4.2 per cent)
Food processing products (4.3 per cent)	Natural or cultured pearls, precious or semi- precious stones, precious metals (3.9 per cent)
Iron and Steel (3.3 per cent)	Iron and Steel (3.9 per cent)

Table 6 continued...

Table 6 continued...

Meat and edible meat products (2.8 per cent)	Electrical machinery and equipment and parts thereof; sound recorders, TVs (3.0 per cent)
Motor vehicles other than railway or tramway goods (1.8 per cent)	Aluminium, and articles thereof (2.9 per cent)
Pharmaceutical products (1.8 per cent)	Cotton (2.8 per cent)

Notes: Product items based on HS 2-digit level; *Based on share of India's exports to ASEAN. *Source:* Trademap database.

Table 7 shows the scenario of India's top commodities import at HS 2-digt level from ASEAN between pre- and post- FTA phases. For instance, barring few items such as organic chemicals (5.8 per cent) and chemical products (2.3 per cent), rest other commodities are maintaining as top imports from ASEAN. For instance, about 69 per cent of India's imports from ASEAN at HS 6-digit level belong to these sectors, where about 56 commodities⁷ at HS 6-digit level have grown more than 10 per cent CAGR between the years 2010-11 and 2019-20 (see Appendix 6).

Table 7: India's Top Import Items from ASEAN (Pre- and Post- FTA)*

Top Commodity Imports in Pre-FTA (2009)	Top Commodity Imports in Post-FTA (2019)
Mineral fuels, mineral oils and products of their distillations; etc (24.9 per cent)	Mineral fuels, mineral oils and products of their distillations; etc (20.7 per cent)
Animal or vegetable fats; prepared edible fats etc (15.4 per cent)	Electrical machinery and equipment and parts thereof; sound recorders, TVs (15.0 per cent)
Electrical machinery and equipment and parts thereof; sound recorders, TVs (11.5 per cent)	Animal or vegetable fats; prepared edible fats etc (10 per cent)
Machinery, mechanical appliances, nuclear reactors, boilers, thereof (10 per cent)	Machinery, mechanical appliances, nuclear reactors, boilers, thereof (9.0 per cent)
Ores, Slag and ash (3.5 per cent)	Organic chemicals (5.8 per cent)
Wood and articles of wood, wood charcoal (3.3 per cent)	Plastic and articles thereof (4.4 per cent)
Plastic and articles thereof (2.8 per cent)	Iron and Steel (2.9 per cent)
Ships, boats and floating structures (2.4 per cent)	Copper and articles thereof (2.9 per cent)
Natural or cultured pearls, precious or semi- precious stones, precious metals (1.7 per cent)	Rubber and articles thereof (2.6 per cent)
Optical, photographic, medical and surgical etc (1.5per cent)	Ships, boats and floating structures (2.5 per cent)
Rubber and articles thereof (1.5 per cent)	Chemical products (2.3 per cent)

Note: Product items based on HS 2-digit level; * Based on share of India's imports from ASEAN. *Source:* Trademap database.

Overall, between ASEAN and India, mineral products such as petroleum products are most traded items, where India has been importing crude petroleum from some of the ASEAN countries for refining

the petroleum and exports of petroleum products back to ASEAN countries. Similarly, India's active participation in value chain such as in automobile, pharmaceuticals and machineries has helped to retain these products as India's top exports to ASEAN. On the other hand, India's imports of electrical products and vegetable oil have grown significantly in post-FTA.

The foregoing analysis indicates that the bilateral trade relations between India and ASEAN economies have seen significant expansion. Signing of AIFTA has expanded the trade potential and scope of increasing India's exports to ASEAN countries considering the inherent advantages of the Indian industry in certain sectors.

3.1 Anti-Dumping Initiations between ASEAN and India

Countries have been taking shelter of anti-dumping actions to restrict unfair trade. Table 8 presents anti-dumping initiations between ASEAN and India for the period 1995 to 2019. Till 2019, India initiated about 184 anti-dumping cases against ASEAN. Only Indonesia initiated maximum of about 15 anti-dumping cases against India's exports, followed by Thailand (2) and Malaysia (1), respectively, whereas, India initiated maximum anti-dumping cases against Thailand (53), Indonesia (42), Malaysia (36) and Singapore (29), respectively. In October 2019, India has recommended imposing countervailing duty on imports of continuous cast copper wire rods, flat-rolled product of steel, plated or coated with aluminium and zinc to four ASEAN countries, namely Indonesia, Malaysia, Thailand and Vietnam. The duty, varying between 3.5 per cent and 10.3 per cent, has been imposed for five years as the imports were causing harm to the domestic industry.

Table 8: Anti-dumping Initiations: Reporting Member vs. Exporting Country*

Exporter	India	Indonesia	Malaysia	The Philippines	Thailand	Vietnam	Total
India		15	1		2		18
Indonesia	42		14	2	5	2	65
Malaysia	41	13		2	2	3	61
The Philippines	3	1	2	2			8
Singapore	29	5	2				36
Thailand	54	10	10	2		2	78
Vietnam	15	4	6		5		30
Total	184	48	35	8	14	7	

Note: *For the period: 1 January 1995 - 30 December 2019.

Source: Statistics on Anti-dumping, WTO.

4. Removal of Non-Tariff Measures (NTMs)

Both ASEAN and India have used NTMs as a tool to restrict market access, in addition to other traditional trade policy measures such as tariff, for some of the products which are partly not covered under the FTA negotiations, to regulate imports. ASEAN and India have FTA in goods between them since 2010 that in turn has led to reduction in tariffs for more than 80 per cent of the products at HS 6-digit level. With the rise in trade, trade policies are transiting from the traditional trade areas such as tariff and quota barriers to NTMs to restrict market access and also to control the quality/safety of products. In this context, the average number of NTMs, particularly SPS and TBS imposed by ASEAN and India, has increased significantly over the years (see Figure 9).

SPS Imposed by India and ASEAN TBT Imposed by India and ASEAN Number of Products at HS 6 Digit Level Number of Products at HS 6 Digit Level 2000 0 2015-2010 2010 2015 2000 2005 2005 1995 1995 **ASEAN** India **ASEAN** India

Figure 9: Average Number of SPS and TBT Imposed by ASEAN on India and India on ASEAN at HS 6-digit level

Source: AIC (2019).

We investigate the correlation between tariffs and NTMs to assess whether ASEAN and India use tariffs and NTMs as a complementary or substitutive trade policy tools to restrict the market access between them. For some products, countries use restrictive trade policies such as high tariff as well as high NTMs more frequently to protect their domestic market from the foreign competition. Both NTMs and tariffs may tend to work towards the same direction when the products are protected by both NTMs and high tariffs. While a large number of NTMs may result from the nature of the products traded, when these are accompanied by a high tariff, it may indicate the intent to use NTMs complementing tariffs in order to further insulate domestic industries from foreign competition⁸ (refer Appendix 7).

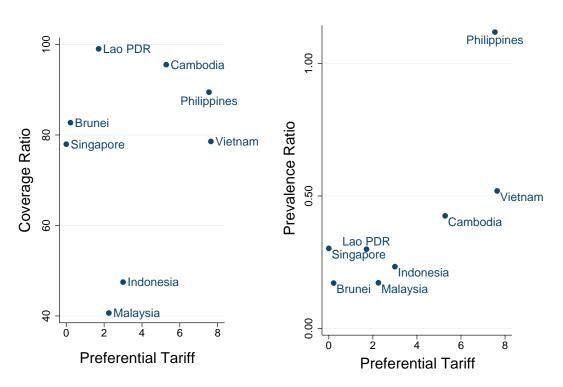
To measure the incidence of NTMs between ASEAN and India, we use Coverage Ratio and Prevalence Ratio. The Coverage Ratio (CR) describes percentage share of trade value affected by NTMs for the importing country on total trade value, and therefore, it provides a measure of the impact of NTMs on overall exports. Prevalence Ratio (PR) indicates the average number of types of NTMs imposed at each product level at HS 6-digit level.

The correlation between NTMs and tariffs across countries is illustrated in Figure 10, where NTMs are defined by CR and PR. Figure 10 shows that ASEAN countries such as Vietnam, the Philippines and Cambodia have imposed higher tariff close to 8 per cent and also imposed NTMs to almost 80 per cent of the products traded at HS 6-digit level. The average preferential tariff imposed by Lao PDR against India is about 2 per cent, whereas it has imposed NTMs close to 100 per cent on India's export. In the case of Malaysia and Indonesia, both tariff and NTMs coverage on India's export is low, whereas, Singapore and Brunie have imposed lower tariff but higher NTMs, covering about 80 per cent of India's export to

ASEAN. In terms of correlation between prevalance ratio (i.e., average number of types of NTMs) and preferential tariff, except the Philippines and Vietnam, all other ASEAN countries have imposed fewer NTMs (types) on India's exports. The Philippines has imposed higher tariff and more than one type of NTMs on India's export, followed by Vietnam, which has imposed close to 8 per cent of tariff and 0.50 average number of types of NTMs. In what follows ASEAN countries such as Vietnam, the Philippines and Cambodia have shown complemnetary tariff and NTMs, whereas, Brunei and Singapore have substituted tariff with NTMs on imports from India.

In case of India imposing NTMs on imports from ASEAN, the correlation between coverage ratio and tariff in Figure 10 shows that except Vietnam, more than 85 per cent of ASEAN's exports are affected by India's NTMs with relatively less impact on India's tariff against ASEAN. Similalry, the average number of types of NTMs imposed by India on single product is less than 0.60 against most of the ASEAN countries. India has also imposed less than 6 per cent average tariff against most of the ASEAN countries. Figure 11 depicts that India has followed substitution effect of NTMs with tariff on imports from ASEAN. Overall, ASEAN countries such as Vietnam, the Philippines and Cambodia show complemnetary effect between tariff and NTMs, whereas, Brunei and Singapore substitute tariff with NTMs against India's exports to ASEAN. India follows substitution effect of NTMs with tariff, and imposes on ASEAN's export.

Figure 10: Correlation between Coverage Ratio and Preferential Tariff: (ASEAN Imposing NTMs and Tariff against India)



Source: AIC (2019).

0.9 Brunei Cambodi a Indonesia Myanmar Myanmar Thailand Lao PDR 0.80 Malaysia 90 Prevalence Ratio Coverage Ratio Singapore 8 0.60 2 Lao PDR ThailandCambodia 0.50 Vietnam Vietnam 9 Brunei Philippines 2 0 6 **Preferential Tariff** Preferential Tariff

Figure 11: Correlation between Coverage Ratio and Preferential Tariff: (India Imposing NTMs against ASEAN)

Source: AIC (2019).

In addition to traditional tariff liberalisation measures, both ASEAN and India use NTMs as a tool to restrict market access and to protect their domestic market from the international competition. Despite AIFTA, several products at HS 6-digit level are still under exclusion list, sensitive trade and highly sensitive list. Therefore, NTMs and tariffs may tend to work towards the same direction when the products are protected by both NTMs and high tariffs. Although a large number of NTMs may result from the nature of the product traded, when these are accompanied by a high tariff, it may indicate the intent to use NTMs complementing tariffs in order to further insulate domestic industries from foreign competition.⁹

5. Overlapping FTAs a Major Concern

Both ASEAN and India as trade blocs are overlapping with multiple countries and multiple regions. Overlapping FTAs reduce the scale effect (economic) and damage the spirit of the trade bloc(s). The RCEP is a regional comprehensive economic partnership agreement among the 15 members of the East Asia Summit (EAS) that includes the 10 ASEAN countries and its FTA partners, namely, China, Japan, Republic of Korea, Australia, and New Zealand (see Box 1 for more details).

ASEAN as a trade bloc has adopted a pro-active stance towards free trade and regional economic integration, having concluded a number of FTAs and CEPAs with the ASEAN Dialogue Partners (DPs) including the China-ASEAN FTA (CAFTA), ASEAN-India FTA (AIFTA), ASEAN – Japan Comprehensive Economic Partnership (AJCEP) and ASEAN-Korea FTA (see Figure 12). Besides, ASEAN's regional

economic integration goals are not limited to intra-regional integration but also open for external partners to promote trade, investments and other trade facilitation measures. Particularly, ASEAN is central to the RCEP process. At the same time, four of the ASEAN countries such as Brunei, Malaysia, Singapore and Vietnam were part of the Trans-Pacific Partnership (TPP). With the exit of the USA from TPP, the member countries have concluded the comprehensive partnership for TPP, which is also known as the Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP). India has already come out from RCEP and is also not the member of CPTPP. In the ASEAN Plus Three Foreign Ministers' Meeting held on 9-12 September 2020, countries have reaffirmed their commitment to the signing of the RCEP agreement in 2020 and also endorsed that RCEP remains open for India, in addition to upholding an open, inclusive, and rules-based multilateral trading system.¹⁰

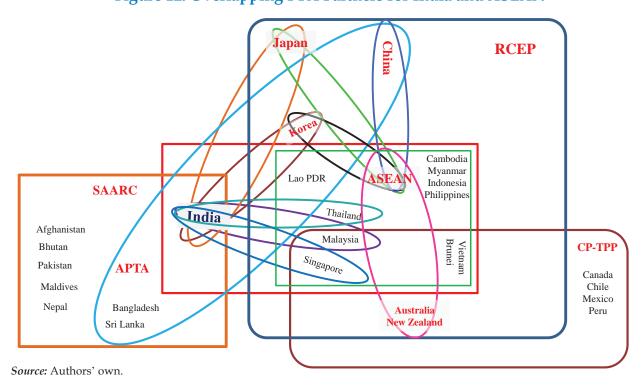


Figure 12: Overlapping FTA Partners for India and ASEAN

China has both bilateral and multilateral trade agreements with almost all the countries, where India also has active trade agreements with most of the countries both at bilateral and multilateral levels. For instance, India has bilateral CEPAs/CECAs and multilateral trade agreements with ASEAN and some of the ASEAN member states such as India-Thailand EHS, India-Singapore CEPA, India-Malaysia CEPA. In addition, India and Indonesia have been negotiating a CECA to cover economic cooperation, while trading in goods, services, and investments. With respect to ASEAN plus countries, India has bilateral agreements such as India-Japan CEPA and India-South Korea CEPA. To further generate new trade opportunities, India may consider a bilateral FTA with Vietnam given that Vietnam has signed several FTAs with partners across the world (Figure 13). Although it is subject to further analysis, apparently India-Vietnam FTA may enhance Indian exports globally, ceteris paribus. India has also engaged with multilateral agreements ASEAN, ASEAN Plus and South Asian countries under the Asia-Pacific Trade Agreement (APTA). This shows that both India and China have covered all the neighbouring regions and having mutual interest to strengthen trade relations with ASEAN and neighbouring countries.

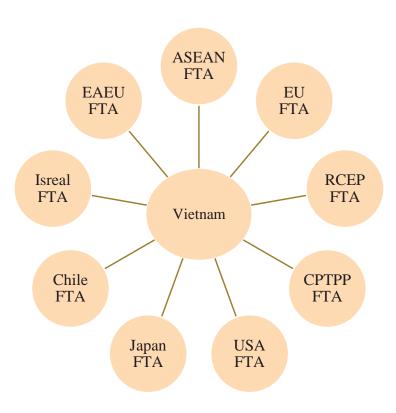


Figure 13: Vietnam's FTA Partners

Source: Authors' own.

Overall, ASEAN and India have signed and implemented several FTAs in the pre-Covid-19 period. However, the pandemic has brought economic challenges that has changed the trade dynamics and also opened up new avenues for future opportunities. In terms of FTA in pre-Covid-19, the trade challenges were mostly related to traditional goods and services, ROO, trade facilitation, etc. But, in the Covid-19 period, trade composition has been fast changing towards improving the quality of life on trade related to pharmaceutical, health services, e-commerce, digital products and services, etc., Therefore, reviewing ASEAN-India FTA will address the challenges and may convert it into a comprehensive package with trade in goods, services, trade facilitation, etc. In the 17th AEM-India Consultation Meeting on 29 August 2020, it is ensured that ASEAN-India Joint Committee would be initiated for the actual review to upgrade the AITIGA to be more user-friendly, simple, and trade facilitative for businesses and traders.¹²

6. Emerging Indo-Pacific and Trade Opportunities

The emerging 'Indo-Pacific', which has been endorsed by several countries, has substantial potential to generate trade and investment. The Indo-Pacific has been gaining new geopolitical construct over the last few years. The general perspective of the countries about Indo-Pacific is to ensure safe and secure maritime space through an inclusive and multilateral approach among like-minded countries while ascertaining the ASEAN centrality and to support the international order and regional stability. ASEAN centrality and India's economic and strategic partnership with Southeast Asian countries is one of the important aspects of Indo-Pacific. The share of ASEAN countries in intra-regional trade among Indo-Pacific countries has witnessed more than 80 per cent (about US\$ 1.11 trillion) in 2019, followed by ASEAN Plus countries held

Box 1: Regional Comprehensive Economic Partnership

The Regional Comprehensive Economic Partnership (RCEP) was introduced at the 19th ASEAN Summit and negotiations were initiated during the 21st ASEAN Summit held in Cambodia, between the 10 ASEAN Member States and ASEAN's free trade agreement (FTA) partner's, viz. Australia, China, India, Japan, Korea and New Zealand. RCEP negotiation was officially launched on 20 November 2012 during the 7th East Asia Summit. The Agreement covers more than 3.6 billion, i.e., 47 per cent of the world's population, having a total gross domestic product (GDP) of around US\$ 28 trillion, nearly a third of global GDP and accounts for about 27 per cent of global trade, as on 2019. RCEP is intended to be comprehensive and cover a large number of subjects like goods, services, investment, economic and technical cooperation, intellectual property, competition, dispute settlement, e-commerce, small and medium enterprises and others. It aims to strengthen economic linkages and enhance trade and investment related activities, minimizing development gap among the parties (see Table 9).

Table 9: Chapters of RCEP

Trade in Goods	Trade in Services, including Financial Services, Telecommunication Services, and Professional Services	Small and Medium Enterprises	
Rules of Origin, including Product Specific Rules	Movement of Natural Persons	Economic and Technical Cooperation	
Customs Procedures and Trade Facilitation	Investment	Government Procurement	
Sanitary and Phytosanitary Measures	Intellectual Property	General Provisions and Exceptions	
Standards, Technical Regulations and Conformity Assessment Procedures	Electronic Commerce	Institutional Provisions	
Trade Remedies	Competition	Dispute Settlement and Final Provision	

At the 35th ASEAN Summit in Bangkok in 2019, India decided to step back from joining RCEP due to several major concerns that are necessary to safeguard India's manufacturers from China's import and agro-based sectors, particularly dairy based products from Australia and New Zealand. India has also been experiencing trade deficit with most of the ASEAN and ASEAN plus countries, of which China constitutes 60 of the total trade deficits. India wanted specific Rules of Origin to be included to prevent the abuse of pact by non-partner. E-commerce and trade remedies were among other key areas of concern. India has been strengthening its manufacturing sector and taking necessary steps to complement production capabilities by laying out a robust network of infrastructure in terms of transport, logistics support, communication, etc.

Source: Authors' own based on secondary sources.

about 71.4 per cent (US\$ 2.93 trillion) in 2019 (see Table 10). The emerging Indo-Pacific has the potential to facilitate regional comprehensive economic arrangement through a rules-based international system. On average, about 60 per cent of intra-regional trade among Indo-Pacific are within ASEAN and ASEAN plus countries, indicating strong interdependency in trade in the Indo-Pacific.

Table 10: Profile of Indo-Pacific: 2019

	Land	Total	GDP	Country-	Country-wise	Share of Country-
	area (sq.	Population	(current	wise	Exports to	wise Export
Country	km)	_	Price)	Exports to	Total Indo-	to Total Indo-
				World	Pacific	Pacific, (%)
	(M	illion)		(US\$ billio	n)	(6) / (5)
(1)	(2)	(3)	(4)	(5)	(6)	(7)
Brunei	0.0	0.4	13.5	7.3	7.1	97.4
Cambodia	0.2	16.5	27.1	16.2	12.2	75.7
Indonesia	1.8	270.6	1119.2	167.3	139.2	83.2
Lao PDR	0.2	7.2	18.2	5.9	5.6	94.6
Malaysia	0.3	31.9	364.7	238.1	188.7	79.3
Myanmar	0.7	54.0	76.1	18.1	14.8	81.9
The Philippines	0.3	108.1	376.8	70.9	52.9	74.6
Singapore	0.0	5.7	372.1	390.7	281.7	72.1
Thailand	0.5	69.6	543.6	245.4	193.7	79.0
Vietnam	0.3	96.5	261.9	259.4	207.4	80.0
ASEAN	4.3	660.6	3173.1	1419.1	1103.2	81.8
China	9.4	1397.7	14342.9	2498.5	1561.4	62.5
Japan	0.4	126.3	5081.8	705.6	530.7	75.2
South Korea	0.1	51.7	1642.4	542.6	406.7	74.9
Australia	7.7	25.4	1392.7	272.6	229.3	84.1
New Zealand	0.0	0.9	5.5	0.9	0.6	68.2
India	3.0	1366.4	2875.1	324.9	207.1	63.7
ASEAN Plus	20.5	2968.4	25340.4	4345.1	2935.7	71.4
Africa	4.7	244.1	556.2	111.7	61.0	67.9
Latin and North America	23.6	612.6	25309.5	2819.4	2123.4	73.5
Indo-Pacific*	74.2	5239.6	60195.2	9999.3	6813.7	69.7

Notes: * Indo-Pacific countries include ASEAN: Brunei Darussalam, Cambodia, Lao PDR, Myanmar, Malaysia, Indonesia, Singapore, Thailand, Vietnam, the Philippines; South Asia: India, Sri Lanka, Pakistan, Bangladesh, Maldives; Latin America: Colombia, Chile, Ecuador, Peru; North America: Canada, Mexico, United States; North-East Asia: China, Japan, South Korea, Russian Federation; Pacific: Australia, New Zealand, Papua New Guinea, Fiji; West Asia: Iran, Islamic Rep., United Arab Emirates, Yemen, Rep., Oman; Africa: Kenya, Somalia, Tanzania, Madagascar, Mozambique, South Africa, Mauritius, Comoros, Seychelles; European Union: France

Source: De and Kumarasamy (2020) based on World Development Indicators, the World Bank

The study by Rahman *et al.* (2020) find the scope for potential strength of economic integration across the region. Rahman *et al.* (2020) investigate the potential economic effect of Indo-Pacific regional economic cooperation and compares with the extended CPTPP. Using the Computable General Equilibrium (CGE) modelling, authors have shown that the quadrilateral alliance between the US, Japan, Australia, and India along with South and Southeast Asia would lead to substantial economic gain. The CGE simulation in case of reductions of tariff and improved trade facilitation indicate that the Indo-Pacific group may generate over US\$ 1.12 trillion welfare gain. Improvements in infrastructure and connectivity, leading to reduced trade-transportation costs, are a necessary step in order to realise the trade potential of the Indo-Pacific.

In fact, the Indo-Pacific could become a powerful bloc if the South and Southeast Asia could be linked through stronger connectivity, with special focus being placed upon developing maritime linkages and buttressed by improved trade facilitation and other networks that would reduce trade costs (see Box 2). Given India and ASEAN's common interest in the Vision/Outlook towards Indo-Pacific, Indo-Pacific economic cooperation would be the steppingstone for ASEAN and India to build a strategic partnership within and with other sub-regional organisations.

Box 2: Potential Economic Effect of Indo-Pacific Regional Economic Cooperation

Rahman *et al.* (2020) have investigated the potential economic effect of Indo-Pacific regional economic cooperation and compares with the extended CPTPP. Using the Computable General Equilibrium (CGE) model they showed that the quadrilateral alliance between the United States, Japan, Australia, and India along with South and Southeast Asia would lead to substantial economic gain. To reduce the transaction cost, which is one of the major trade barriers in the region, they suggest that well improved trade facilitation in South and East Asian could explore the untapped potential in the Indo-Pacific trade, besides, improving infrastructure and connectivity in the Indo-Pacific.

The CGE results illustrate that the quadrilateral alliance between the United States, Japan, Australia, and India shows a positive economic gain. However, if South and Southeast Asia join in the Indo-Pacific, the economic benefit would be enormous. As a large part of Indo-Pacific trade has remained unrealised, the findings of this study also indicate that improved trade facilitation could bring huge gain to this region. The trade transaction cost is one of the major trading barriers prohibiting the growth of Indo Pacific intra-regional trade. The study reinforces that improvement in infrastructure and connectivity leading to reduce trade transportation costs should be a necessary step in order to realise the Indo-Pacific trade potential. The economic gain under extended CPTPP is also enormous amongst the region. If Korea, China, and India join in the CPTPP, the economic gain of these countries would be enormously high. The Indo-Pacific could become a powerful regional block if the South and Southeast Asia could be linked through the connectivity, maritime link, improved trade facilitation and other networks that would reduce trade costs. If the vision of the economic corridor gains momentum, it will need to be enhanced by building greater physical infrastructure, more regulatory trade architecture as well as human and digital connectivity. However, the results from CGE study may be very sensitive to the assumptions and data used. Almost all CGE exercises include a sensitivity analysis to obtain a range of results based on different assumptions and the modelling process. The sectoral or country specific study on Indo-Pacific regional economic cooperation would be further research.

Source: Rahman et al. (2020)

7. Recommendations

ASEAN and India have signed and implemented several FTAs in the pre-Covid-19 period. The pandemic has brought economic challenges that has changed the trade dynamics and also explored the opportunities. In terms of FTA in pre-Covid-19, the challenges were mostly traditional goods and services, ROO, trade facilitation, etc. But in the Covid period, trade composition is fast changing from traditional goods to trade in 'quality of life' such as pharmaceutical, health services, e-commerce, digital products and services, etc. This section presents some major policy recommendations. Here, we also resent the recommendations drawing upon the webinar on 'One Decade of ASEAN-India FTA in Goods: Achievements and Way Forward', organised by AIC at RIS on 29 June 2020 (see Box 3).

- Bilateral FTAs with Australia and New Zealand, Vietnam and Indonesia may generate new trade
 opportunities, subject to studies and feasibilities. ASEAN and India may recast ASEAN-India FTA
 in goods, services and investment in view of the Covid-19. Both ASEAN and India may initiate B2B
 Business Facilitation through industry associations and chambers of commerce (e.g. FICCI-AIBC,
 CII, ASSOCHAM, ICC, EEPC India, FIEO, etc) to promote trade and investment between ASEAN
 and India.
- ASEAN and India should work together to strengthen and support multilateralism. Both ASEAN
 and India should also consider new norms while reviewing the ASEAN-India FTA by considering
 the situation of post Covid-19, and also consider restructuring the policies of e-commerce, data and
 data privacy, etc. Besides, non-tariff barriers must be dealt with and removed to ease the trade flow
 from both ASEAN and India.
- ASEAN and India should work together to support agriculture and manufacturing sectors to be more
 competitive and make it export oriented to address the declining trade due to the ongoing pandemic.
- India needs to lean on its own traditional strengths and those acquired in the modern era on the base
 of the information technology sector to prepare for the decades till 2050. This would lead to increase
 the investments in new areas, which in turn promote bilateral trade between ASEAN and India.
- Supporting review of the AIFTA in goods agreements by making user-friendly, simple and conducive
 business environment for the traders would help to review from the Covid-19 shocks for the region.
 Further, the early ratification of the FTA on services and investment would help improve India's
 overall balance of trade with ASEAN.
- In view of the emerging Indo-Pacific, it is the right moment for both ASEAN and India to work together to unlock the potential opportunities in order to enhance the trade with the Indo-Pacific region.

8. Concluding Remarks

India has taken steps towards economic integration, particularly with Southeast and East Asian countries. Trade between ASEAN and India has grown to US\$ 91.20 billion in 2019 from US\$ 54 billion in 2010 through AIFTA, which has set free about 76.4 per cent of coverage of goods. In addition to AIFTA, both ASEAN and India have been engaging with multiple bilateral and multilateral trade agreements both within and across the ASEAN plus countries. Over time ASEAN countries have gained relatively higher market access in India, whereas, India has experienced trade deficit with most of the ASEAN countries. In the post-FTA period, volume of trade in goods became asymmetric in favour of ASEAN, while India's exports have not witnessed a significant rise. Both India and ASEAN have substantially high untapped trade potential, which has remained unrealised due to barriers to trade and structural differences of the economies. The gap between actual and potential trade may widen due to pandemic-led recession. While

India could be emerging as the alternative market for ASEAN, particularly in the post-Covid-19 period and vice-versa, both would need to upgrade its manufacturing capabilities and build regional production networks as these constitute an integral component of intra-Southeast Asian trade. Finally, given the unfolding Indo-Pacific order, both ASEAN and India have to accelerate the pace of their economic reform processes in order to participate in and benefit from their trade creation possibilities. Besides, to strengthen trade relations, ASEAN and India should address the issues related to sensitive lists, non-tariff measures, and trade facilitation measures, among others. A review of ASEAN-India FTA in goods may, therefore, lead to generate more trade, generate jobs and reduce poverty.

Box 3: Major Recommendations from the Webinar on One Decade of ASEAN-India FTA in Goods: Achievements and Way Forward 29 June 2020, AIC at RIS, New Delhi

- ASEAN and India should consider including services and investment, intellectual property rights (IPRs) while reviewing the ASEAN-India FTA (AIFTA) in *quid pro quo* to mutually beneficial from AIFTA negotiation.
- ASEAN and India should work together for strong integration in the region by strengthening connectivity and establish the supply chain networking between ASEAN and India.
- The review of AIFTA should consider strengthening the parts and components trade across the borders.
- India must reform the domestic policy to push manufacturing competitiveness, promoting global
 and regional value chain to benefit from tariff liberalisation. The review of AIFTA should target
 firms, particularly MSMEs to make it simple and business-friendly and relevant to the current
 global practice
- India should evaluate the ten years of AIFTA and explore the reasons for the lack of exports of potential products to ASEAN countries.
- The review of AIFTA should maintain consistency in terms of having a single sensitive list and rules of origin between ASEAN and India to promote trade.
- The review AIFTA should consider mutual recognition agreements (MRAs), IPR, liberalising labour law and other reforms to attract export oriented FDI.
- ASEAN and India should continue to work together in the new areas of cooperation under the Indo-Pacific.
- India should offer special incentives or concessions to Indian exporters to export to ASEAN countries.
- Indian government should actively engage stakeholder meeting with exporters and business chamber to motivate and build trust among the firms to promote export to ASEAN.
- India's Ministry of External Affairs (MEA) should dedicate trade experts in each mission in ASEAN countries to untapped the trade potential and facilitate the trade promotion activities.
- The review of AIFTA should consider the present and future prospective demand for the products between ASEAN and India.

Source: Refer, Appendix 8.

Endnotes

- 1. Refer, WTO (2020)
- 2. Refer, IMF (2020)
- 3. Refer, WTO (2020)
- 4. Refer, WTO (2020)
- 5. Based on top 100 exporting and importing commodity respectively.
- 6. Among the top 100 exporting commodities, HS-84 (nuclear reactors, boilers, machineries, and mechanical appliances), HS-29 (organic chemicals), HS-85 (Electrical machinery and equipment and parts thereof; sound recorders and reproducers, television image and sound recorders and reproducers, and parts and accessories of such articles), HS-39 (Plastics and Articles thereof) and HS-72 (Iron and Steel) are the product category grown 10 per cent CAGR at 6 digit level between 2010-2011 and 2019-2020.
- Among the top 100 importing commodities, HS-85 (Electrical machinery and equipment and parts thereof; sound recorders and reproducers, television image and sound recorders and reproducers, and parts and accessories of such articles), HS-84 (nuclear reactors, boilers, machineries, and mechanical appliances), HS-39 (plastics and articles thereof), HS-44 (Wood and Articles of Wood; Wood Charcoal), HS-72 (Iron and Steel) and HS-38 (Miscellaneous Chemical Products) are the product category grown more than 10 per cent CAGR at 6 digit level between 2010-2011 and 2019-2020.
- 8. Refer, Eyal (2017).
- Refer, WTO (2014).
- 10. Refer, for example, ASEAN Secretariat (2020a).
- 11. Refer, Jha (2020)
- 12. Refer, ASEAN Secretariat (2020b).
- 13. Refer, De and Kumarasamy (2020).

References

- AIC. 2019. Non-Tariff Measures (NTMs): Evidence from ASEAN-India Trade. ASEAN-India Centre at RIS, New Delhi, 2020.
- ASEAN Secretariat. 2020a. Media Release on the 53rd ASEAN Foreign Ministers' Meeting (AMM) and Related Meetings were convened virtually from 9-12 September 2020. Available at: https://asean.org/storage/2020/10/The-ASEAN-Magazine-Issue-5-September-2020.pdf
- 2020b. Media Statement on the 17th AEM-India Consultations 29 August 2020, Video Conference Meeting. Available at: https://asean.org/storage/2020/08/ASEAN-Media-Release-17th-AEM-India_FIN.pdf
- 2020c. Chairman's Statement of the 21st ASEAN Plus Three Foreign Ministers' Meeting held on 9-12 September 2020. Available at: https://asean.org/storage/2020/09/Final-Chairmans-Statement-of-21st-ASEAN-Plus-Three-Foreign-Ministers-Me....pdf
- De, P. and Kumarasamy, D. 2020. *Emerging Perspectives of Indo-Pacific*. AIC Commentary, No.9, September 2020. Available at: https://cutt.ly/aiccommentarysept2020
- Eyal, R. 2017. Tariffs and Non-Tariff Measures: Substitutes or Complements. A Cross-Country Analysis. Bank i Kredyt, Narodowy Bank Polski, 48(1): 45-72.
- IMF. 2020. World Economic Outlook 2020. International Monetary Fund, October 2020.
- Jha, K. 2020. India, Indonesia negotiating economic cooperation agreement. Sunday Guardian Live. Available at: https://www.sundayguardianlive.com/news/india-indonesia-negotiating-economic-cooperation-agreement
- Rahman, M. M., Kim, C. and De, P. 2020. Indo-Pacific cooperation: what do trade simulations indicate?, ?. Economic Structures 9, 45 (2020)
- WTO. 2020. Trade shows signs of rebound from Covid-19, recovery still uncertain, Press WTO Release No. 862. Available at: https://www.wto.org/english/news_e/pres20_e/pr862_e.htm

Appendix Table 1: Commodity-wise India's Exports to ASEAN

	Exports Value (US\$ Million)		Share in Total Exports to ASEAN (%)		Annualized Growth Rate (%)	
	2010-11	2019-20	2010-11	2019-20	(2010-11-2019-20)	
Minerals Products	8.56	6.23	33.4	21.1	-3.5	
Chemical Products	2.43	4.08	9.5	13.8	5.9	
Base Metals	1.80	3.83	7.0	13.0	8.8	
Machinery & Electrical	2.00	3.30	7.8	11.2	5.7	
Transport Equipment	3.30	3.11	12.9	10.6	-0.7	
Live Animals	1.06	2.49	4.1	8.4	9.9	
Vegetable Products	1.40	1.32	5.5	4.5	-0.7	
James & Jewellery	0.94	1.23	3.7	4.2	3.0	
Textile	1.12	1.16	4.4	3.9	0.3	
Rubber & Plastic	0.50	0.69	1.9	2.4	3.8	
Processed Food	1.26	0.69	4.9	2.3	-6.6	
Instruments	0.27	0.40	1.0	1.4	4.6	
Stone and Cement	0.06	0.35	0.2	1.2	20.8	
Paper	0.09	0.17	0.4	0.6	6.6	
Raw hide & skins	0.12	0.16	0.5	0.5	2.9	
Miscellaneous goods	0.05	0.10	0.2	0.3	9.1	
Footwear	0.04	0.06	0.1	0.2	5.8	

Source: Export-Import Databank, Department of Commerce, India.

Appendix Table 2: Commodity-wise India's Imports from ASEAN

	Imports Value (US\$ Million)		Share in Total Imports from ASEAN (%)		Annualised Growth Rate (%)	
	2010-11	2019-20	2010-11	2019-20	(2010-11-2019-20)	
Minerals Products	5.93	13.40	19.4	25.8	9.5	
Chemical Products	8.39	11.08	27.4	21.4	3.1	
Base Metals	2.95	5.00	9.6	9.6	6.0	
Machinery & Electrical	4.77	4.88	15.6	9.4	0.3	
Transport Equipment	1.65	4.74	5.4	9.1	12.4	
Live Animals	1.88	3.35	6.1	6.5	6.6	
Vegetable Products	1.07	2.71	3.5	5.2	10.9	
James & Jewellery	0.44	1.24	1.4	2.4	12.1	
Textile	0.78	0.96	2.5	1.8	2.3	
Rubber & Plastic	0.32	0.95	1.1	1.8	12.7	
Processed Food	0.37	0.92	1.2	1.8	10.5	
Instruments	0.95	0.59	3.1	1.1	-5.2	
Stone and Cement	0.40	0.56	1.3	1.1	3.8	
Paper	0.21	0.55	0.7	1.1	11.0	
Raw hide & skins	0.11	0.31	0.4	0.6	12.3	
Miscellaneous goods	0.14	0.26	0.5	0.5	6.7	
Footwear	0.03	0.21	0.1	0.4	23.4	

Source: Export-Import Databank, Department of Commerce, India.

Estimated Gravity Model

To estimate the determinants of India's trade with ASEAN, we have used least square dummy variable (LSDV) model based on augmented gravity model framework as given in equation (1) using cross-section data for the year 2019.

```
\ln X_{ij} = \alpha + \beta_1 \ln Y_i + \beta_2 \ln Y_j + \beta_3 D_{ij} + \beta_4 common\_lang_{ij} + \beta_5 contig_{ij} + \beta_6 colony_{ij} + \beta_7 common\_currency_{ij} + \beta_8 fta\_wto_{ij} + \beta_9 Trade\ Costs_{ij} + u_{ij}  (1)
```

where,

i is the exporting country

j is the importing country

 X_{ii} is export of country i to country j

 Y_i is GDP of the country i

 Y_i is GDP of the country j

 D_{ii} is distance between country i and j

contig stands as dummy for common border (1 if the two countries share a common border and 0 otherwise)

common_lang is a dummy for common language (1 if both countries have a common language, 0 otherwise

colony is dummy for colony (1 if both countries had a colonial relationship and 0 otherwise

comcur is dummy for common currency (1 if both the countries are sharing common currency and 0 otherwise

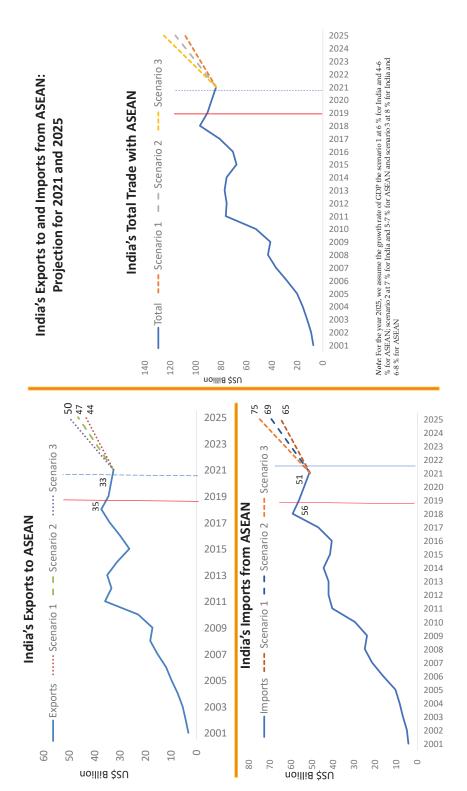
fta_wto stands as dummy for member for free trade agreement (1 if both the countries are members of FTA and 0 otherwise

Trade Costs is the entry cost of the reporter and partner country.

Our analysis covers maximum possible geographical coverage of world bilateral trade flows covering about 150 countries. In addition, the set of other explanatory variables that may influence the level of trade often includes dummy variables such as common language, common border, colony, common currency, FTA. The Gravity model is commonly used for assessing the effect of FTA / PTA on trade flows. The FTA dummy is used to capture the trade creation and trade diversion effects of an existing FTA or PTA in the Gravity model. The Gravity data such as distance, colonial, common currency, free trade agreements, and others are collected from CEPII database. In addition, GDP, GDP per capita, population, and other variables are available in the World Development Indicators (WDI) of the World Bank. The aggregate level bilateral trade data is available in DOTS, IMF; and more disaggregate level bilateral data are available in UNCTAD Database and WITS Database.

Based on Gravity modelling framework, we then projected the ASEAN-India trade for the years 2021 and 2025 (see Appendix Figure 1). The forecast in 2021 is based on the IMF's forecasted GDP growth rate (IMF, 2020). In case of the year 2025, we assume the growth rate of GDP for India is at 7 per cent for India, and, for the ASEAN countries, it ranges between 5 to 7 per cent based on past five-year growth rate of GDP.

Appendix Figure 1: Trends of India's Exports to and Imports from ASEAN



Source: Authors' own.

Appendix Table 3: ASEAN-India Tariff Reduction Framework

Category	Brunei, Indonesia, Malaysia, Thailand, Singapore and India	India and The Philippines	Cambodia, Laos, Myanmar, Vietnam and India				
	Most Favoured Nation (MFN) tariff rates to be reduced by						
Normal Track 1	0% by 2013	0% by 2018	India: 0% by 2013 CLMV: 0% by 2018				
Normal Track 2	0% by 2016	0% by 2019	India: 0% by 2016 CLMV: 0% by 2021				
Sensitive Track	No more than 5% by 2016	No more than 5% by 2019	India: No more than 5% by 2016				
Highly Sensitive Track	Reduction to 25% or 50% by 31 st December 2019 for Indonesia, Malaysia and Thailand	Reduction to 25% or 50% by 31st December 2022 for the Philippines	Reduction to 25% or 50% by 31st December 2024 for Cambodia and Vietnam				
Special Products	Reduction to 37.5% for crude palm oil, 50% for pepper, and 45% for the rest by 31st December 2019	Reduction to 37.5% for crude palm oil, 50% for pepper, and 45% for the rest by 31st December 2019	Reduction to 37.5% for crude palm oil, 50% for pepper, and 45% for the rest by 31st December 2019				
Exclusion List	Products subject to annual tariff review with a view to improve market access	Products subject to annual tariff review with a view to improve market access	Products subject to annual tariff review with a view to improve market access				

Source: Ministry of Commerce and Industry, Government of India.

Appendix Table 4: India's Top 20 New Export Commodities to ASEAN in 2019-2020 Relative to 2010-11

(US\$ Million)

HS Code	Commodity	2019-2020
271012	Light Oils and Preparations:	1396.72
120242	Ground-Nut, Not Roasted or Otherwise Cooked, Whether or Not Shelled Or Broken-In Shelled Whether Or Not Broken	519.31
90421	Fruits of The Genus Capsicum or Of the Genus Pimenta: Dried, Neither Crushed nor Ground:	269.01
30617	Other Shrimps and Prawns: Frozen	202.96
030743	Cuttle Fish and Squid Frozen	177.16
690721	Of A Water Absorption Coefficient by Weight Not Exceeding 0.5%	104.43
170114	Other Cane Sugar:	97.08
870193	Other Tractors, Of an Engine Power Exceeding 37 Kw but Not Exceeding 75 Kw	68.85
260300	Copper Ores and Concentrates	54.72
030359	Other Fish Include Indian Mackerels, Crevalles, Silver Pomfrets, Scads, Capelin, Kawakawa Frozen	45.46
901420	Instruments and Appliances for Aeronautical or Space Navigation (Other Than Compasses)	41.67
871410	Of Motorcycles (Including Mopeds)	37.26
382499	Chemical products and preparations of the chemical or allied industries, incl. those consisting of mixtures of natural products, n.e.s.	35.52
030389	Frozen fish, n.e.s.	21.96
030633	Live Fresh or Chilled Crabs	18.13
090931	Seeds of Cumin: Neither Crushed nor Ground	17.32
401180	Of A Kind Used on Construction, Mining or Industrial Handling Vehicles and Machines	17.01
090422	Fruits of The Genus Capsicum- Crushed or Ground	16.94
690723	Of A Water Absorption Coefficient by Weight Exceeding 10%	16.48
030752	Octopus Frozen	16.27

Source: Authors' own based on Export Import Data Bank, Department of Commerce, India.

Appendix Table 5: India's Top 20 New Import Commodities from ASEAN in 2019-2020 Relative to 2010-11

(US\$ Million)

HS Code	Commodity	2019-2020
271012	Light Oils and Preparations:	556.42
841112	Turbo-Jets of A Thrust>25 Kn	484.8
720260	Ferro-Nickel	220.04
390140	Ethylene-Alpha-Olefin Copolymers, Having A Specific Gravity of Less Than 0.94	199.63
382499	Chemical products and preparations of the chemical or allied industries, incl. those consisting of mixtures of natural products, n.e.s.	161.59
850760	Lithium-Ion	158.37
071360	Edible Vegetables and Certain Roots and Tubers Dried Leguminous Vegetables, Shelled, Whether or Not Skinned or Split. Pigeon Peas (Cajanus Cajan)	96.5
310551	Containing Nitrates and Phosphates	59.64
852852	Other Monitors Capable of Directly Connecting to And Designed for Use with An Automatic Data Processing Machine of Heading 8471	58.02
090710	Cloves (Whole Fruit, Cloves and Stems) Neither Crushed nor Ground	41.23
870192	Other Tractors, Of an Engine Power Exceeding 18 Kw but Not Exceeding 37 Kw	36.74
871410	Of Motorcycles (Including Mopeds):	36.19
090961	Seeds of Anise, Badian, Caraway or Fennel; Juniper Berries Neither Crushed nor Ground	35.59
090821	Mace Neither Crushed nor Ground	24.51
381239	Anti-oxidising preparations and other compound stabilisers for rubber or plastics (excl. mixtures of oligomers of 2,2,4-trimethyl-1,2-dihydroquinoline "TMQ")	23.74
870340	Other Vehicles, With Both Spark-Ignition Internal Combustion Reciprocating Piston Engine and Electric Motor as Motors for Propulsion, Other Than Those Capable of Being Charged by Plugging to External Source of Electric Power	22.01
870193	Other Tractors, Of an Engine Power Exceeding 37 Kw but Not Exceeding 75 Kw	20.89
880240	Aeroplanes and Other Aircraft, of an Unladen Weight Exceeding 15000 Kg	20.87
293190	Other Organo-Inorganic Compounds Include Organo Arsenic Compounds	20.14
852862	Projectors: Capable of Directly Connecting to And Designed for Use with an Automatic Data Processing Machine of Heading 8471	17.91

Source: Authors' own based on Export Import Data Bank, Department of Commerce, India.

Appendix 5

Appendix Table 6: India's Major Export Commodities to ASEAN at HS 6-digit Level based on Higher CAGR between 2019-2020 to 2010-11 with Greater than 10 per cent

HS Code	Commodity	2019- 2020	2010- 2011	CAGR (2010-2011 - 2019-20
		(US\$ N	Tillion)	(%)
841112	Turbojets of a Thrust > 25 Kn	304.94	2.84	68.13
840820	Compression-Ignition Internal Combustion Piston Engines (Diesel or Semi-Diesel)	194.81	2.68	61.00
020629	Other Edible Offal of Bovine Animals, Frozen	159.18	4.45	48.80
390720	Other Polyethers	50.7	1.82	44.73
720719	Semi-Finished Products of Iron or Non-Alloy Steel - Other	186.76	7.12	43.76
030499	Frozen fish meat n.e.s. (excluding fillets)	42.49	1.7	42.99
890510	Dredgers	332.96	15.22	40.89
390110	Polyethylene Having A Specific Gravity of Less Than 0.94	22.39	1.09	39.91
520812	Plain Weave, Weighing More Than 100 G/M2	24.63	1.22	39.64
760120	Aluminium Alloys	25.8	1.28	39.62
281820	Aluminium Oxide Other Than Artificial Corundum	76.79	4.25	37.93
290930	Aromatic Ethers and Their Halogenated, Sulphonated, Nitrated or Nitrosated Derivatives	75.38	4.2	37.83
780199	Other Unrefined Lead and Lead Alloys	23.63	1.44	36.46
852580	Television Cameras, Digital Cameras and Video Camera Recorders:	17.51	1.19	34.82
870422	Motor Vehicles for The Transport of Goods - G.V.W. Exceeding 5 Tones but Not Exceeding 20 Tonnes	18.22	1.24	34.80
292529	Other:	14.05	1.08	32.99
100630	Semi-Milled or Wholly Milled Rice, Whether or Not Polished or Glazed:	122.39	9.78	32.41
293499	Other Heterocyclic Compounds	41.54	3.37	32.19
120991	Vegetable Seeds Used for Sowing	12.93	1.06	32.04
293359	Heterocyclic Compounds Containing A Pyrimidine Ring (Hydrogenated or Not) Or A Piperazine Ring in The Structure, Others	50.8	4.21	31.88

Note: The selection of compound annual growth rate (CAGR) is based on two stage analysis. 1. Calculate CAGR between 2010-11 and 2019-20. There are 263 commodities at HS 6-digit level that are greater than 10 per cent of CAGR, out of which, we trim down the list by selecting the value of more than US\$ 1 million in 2010-11. 2. Then from the selected list of commodities, we sorted the top 20 list of commodities from highest to the lowest based on CAGR.

Source: Authors' own based on Export Import Data Bank, Department of Commerce, India.

Appendix 6

Appendix Table 7: India's Major Import Commodities from ASEAN at HS 6-digit Level based on Higher CAGR between 2019-2020 to 2010-11 with Greater than 10 per cent

HS Code	Commodity	2019-2020	2010-2011	CAGR (2010-2011 - 2019-20
		`	Million)	(%)
721914	For Of a thickness of less than 3 mm	150.83	1.96	62.02
740819	Other wire of refined copper	747.46	10.01	61.48
400510	Compounded Rubber, Unvulcanized, Compounded with Carbon Black Or Silica	97.22	1.32	61.24
291030	Epichlorohydrin [Exemption Duty Ref by SNo(203) in Ntfn 50-Customs/2017 dated 30.06.2017]	73.14	1.15	58.63
390490	other polymers of vinyl chloride or of other halogenated olefins in primary forms	96.61	1.57	58.05
901580	other instruments and appliances:	52.46	1.1	53.64
640299	other footwear of 6402	53.01	1.29	51.11
841191	parts of turbo-jets/turbo propellers	65.62	1.7	50.07
520100	cotton, not carded or combed	60.22	1.61	49.54
390410	poly (vinyl chloride), not mixed with other	81.59	2.25	49.03
700510	Non-wired glass, having an absorbent, reflecting or non-reflecting layer	98.82	2.74	48.94
722090	Flat-rolled products of stainless steel, of a width of less than 600 mm - Other	66.34	2.06	47.08
293040	Methionine	58.35	1.84	46.83
711311	Of silver, whether or not plated or clad with other precious metal	35.52	1.13	46.68
440839	Other of tropical wood	54.26	1.73	46.65
380891	Insecticides	33.07	1.08	46.26
852691	Other radio navigational aid apparatus	60.39	2.07	45.47
480257	Other, weighing 40 g/m2 or more but not more than 150 g/m2	96.99	3.36	45.30
381700	Mixed alkylbenzenes and mixed alkylnaphthalenes, other than those of heading 2707 or 2902	68.79	2.45	44.85
440890	Veneer Sheets and Sheets for Plywood, Etc. Whether or Not Planed, Etc., Not Over 6 Mm (. 236 In.) Thick, of Nonconiferous Wood, Others	55.23	2.09	43.88

Note: The selection of compound annual growth rate (CAGR) is based on two stage analysis. 1. Calculate CAGR between 2010-11 and 2019-20. There are 356 commodities at HS 6-digit level that are greater than 10 per cent of CAGR, out of which, we trim down the list by selecting the value of more than US\$ 1 million in 2010-11. 2. Then from the selected list of commodities, we sorted the top 20 list of commodities from highest to the lowest based on CAGR.

Source: Authors' own based on Export Import Data Bank, Department of Commerce, India.

Appendix 7

Incidence of NTMs: Coverage Ratio and Prevalence Ratio

Coverage Ratio measures the percentage of trade subject to NTMs for the importing country. It shows the importance of NTMs on overall imports. The coverage ratio (Cj) for the importing country j is given by:

$$C_j = \left[\frac{\sum D_i V_i}{\sum V_i} \right]. 100$$

where V_i is the value of imports in product i and D is defined as above. However, frequency index and coverage ratio do not take into account the possibility of more than one type of NTM being applied to the same product. In practice, a large number of products have more than one regulatory measure applied to them. To measure prevalence of NTMs, prevalence ratio approach is employed.

Prevalence Ratio indicates the average number of NTMs affecting the imported product. It accounts whether more than one NTM is applied to the same product (which is not captured by frequency index and coverage ratios). The prevalence ratio (P_i) is given by:

$$P_j = \left[\frac{\sum N_i M_i}{\sum M_i} \right]$$

where Ni is the number of NTMs and Mi is as above.

Appendix 8







Webinar One Decade of ASEAN-India FTA in Goods: Achievements and Way Forward 29 June 2020

KEY RECOMMENDATIONS

he ASEAN-India Centre (AIC) at RIS jointly with ASEAN Studies Centre (ASC) at Chulalongkorn University, Bangkok and Asian Confluence, Shillong organized the Webinar on "One Decade of ASEAN-India FTA in Goods: Achievements and Way Forward" on 29 June 2020. Welcome Address was given by Dr Prabir De, Head, AIC at RIS. Amb. (Dr) Mohan Kumar, Chairman, RIS delivered the Opening Address and Chaired the Webinar. Dr Prabir De read out the Keynote Address of Mr Srinivas Gotru, Joint Secretary, MEA. Special Address was given by Prof. Suthipand Chirathivat, Chairman, ASC, Chulalongkorn University, Bangkok and Dato' Romesh Kodamal, Co-chair, ASEAN-India Business Council (AIBC), Kuala Lumpur. About 80 participants attended the webinar discussion and took part in the Q&A session. The webinar session was also telecasted live in Facebook.

Dr. Prabir De, Head, AIC at RIS and Dr Piti Srisangnam, Chulalongkorn University, Bangkok each made a lead presentation. The distinguished Panelists of the webinar session are Dr. Rajan Ratna, UNESCAP SSWA, New Delhi; Prof. Amita Batra, JNU, New Delhi; Mr. Pranav Kumar, CII, New Delhi; Prof. Rupa Chanda, IIMB, Bengaluru; Dr. Masudur Rahman, University of Waikato, Hamilton; Dr. Surendar Nanda, EEPC India, New Delhi, who participated in stimulating discussion and shared constructive ideas and way forward on reviewing FTA to strengthen trade and investment relation between ASEAN and India. Mr Sabyasachi Dutta, Director, Asian Confluence extended the Vote of Thanks. The major recommendations of the webinar discussion are as follows:

- ASEAN countries have started much early to develop skills and productivity and well-integrated in
 the global and regional value chain, whereas, India is in the initial process of value chain integration.
 There is a need for synergy among manufacturing, services sector and investment to strengthen
 the regional value chain. In this regard, ASEAN and India should consider including services and
 investment, intellectual property rights (IPRs) while reviewing the ASEAN-India FTA in quid pro
 quo to mutually beneficial from AIFTA negotiation.
- In the post-pandemic, there would be a threat of anti-multilateralism, which may disrupt the supply chain, logistics and connectivity among ASEAN and India. Both ASEAN and India should work together for strong integration in the region by strengthening connectivity and establish the supply chain networking between ASEAN and India.
- ASEAN and India have the potential to further integrate value chain linkages. ASEAN countries like Malaysia, Singapore, Thailand and Vietnam have two-way value chain linkages with India in the

- parts and components of automobiles, electricals and garments sectors. The review of AIFTA should consider strengthening the parts and components trade across the borders.
- ASEAN FTA with neighbouring countries like China, Japan and Korea have benefited both ASEAN and ASEAN plus countries due to their comprehensive deeper agreement which has covered tariff liberalisation of up to 90 per cent. Whereas, despite AIFTA, for last one-decade India has experienced a trade deficit with ASEAN due to lack of market access. Therefore, India has not much benefited from AIFTA and also experienced a low utilization of FTA. India must reform the domestic policy to push manufacturing competitiveness, promoting global and regional value chain to benefit from tariff liberalization. The review of AIFTA should target firms, particularly MSMEs to make it simple and business-friendly and relevant to the current global practice to improve the utilization of FTA in both ASEAN and India.
- India majorly exports chemicals, jewelleries, precious or semi-precious stone, electronic items, textile
 etc. and the pattern of India's exports to ASEAN are not diversified over the period. Whereas,
 ASEAN countries export to India are well diversified and gaining the trade balance. India should
 evaluate the ten years of AIFTA and explore the reasons for the lack of exports of potential products
 to ASEAN countries.
- India has to maintain a single sensitive list for all the ASEAN countries, whereas, each ASEAN countries have a separate sensitive list. Most of the ASEAN countries are exporting to India through 'other category' under the exclusion list in the existing AIFTA. Whereas, Indian exporters have to face a different list of sensitive and exclusion list for each ASEAN countries in addition to the NTMs. Similarly, there is a lack of coherence in the single rules of origin policy among the ASEAN countries causes lack of reciprocity that are affecting the Indian exporters. The review of AIFTA should maintain consistency in terms of having a single sensitive list and rules of origin between ASEAN and India to promote trade.
- Vietnam has well integrated with global markets like Japan, South Korea, China and the USA and attract export oriented FDI from across the world. Most of the MNCs investment in India are into domestic market access, rather than export oriented FDI. While reviewing AIFTA, India should consider mutual recognition agreements (MRAs), IPR, liberalising labour law and other reforms to attract export oriented FDI.
- ASEAN and India should continue to work together in the new areas of cooperation under the Indo-Pacific.
- India should offer special incentives or concessions to Indian exporters to export to ASEAN countries.
 Indian government should actively engage stakeholder meeting with exporters and business chamber to motivate and build trust among the firms to promote export to ASEAN.
- While reviewing the AIFTA, India must look into the ASEAN FTA with Australia, New Zealand, Japan, China and South Korea, where except India, other ASEAN plus countries are agreeing to sign regional comprehensive economic partnership (RCEP) and would be subsumed within RCEP. The review of AIFTA negotiation has to consider the experience of ASEAN-India trade and likely future trade with ASEAN, given the ASEAN plus partner countries' engagement with RCEP.
- Non-tariff measures (NTMs) are wiping out the trade benefits between ASEAN and India. Therefore, streamlining NTMs between ASEAN and India by addressing the issues of standard and technical regulations (S&T), mutual recognition agreements (MRAs), Rules of Origin (ROOs), anti-dumping duties and procedural obstacles related to NTMs would promote trade. Besides, regulatory convergence, paperless trade and simplification of trade procedures are to be considered in the reviewing process for better market access.
- India's Ministry of External Affairs (MEA) should dedicate trade experts in each mission in ASEAN
 countries to untapped the trade potential and facilitate the trade promotion activities.

- In terms of FTA negotiation, different areas are negotiated by different negotiating bodies and there is a lack of synergy among the bodies. The review of AIFTA negotiation should address this issue and bring the synergy across the board to mutually benefit from the negotiation process.
- There would be new potential trade avenues in the post-Covid-19 scenarios in the sectors like health (medical) products, climate-smart goods and services, pharmaceuticals, technology products and services, eco-friendly automobiles, digitally traded services, etc. For instance, the health industry would have huge opportunities during the post-Covid. Promoting collaboration in research and development, clinical trial, boosting investment in the pharmaceutical sector. Therefore, the review of AIFTA should consider the present and future prospective demand for the products between ASEAN and India.
- In terms of ASEAN and India trade in services, India majorly exports IT-enabled services, tourism, and businesses management consultancy and so on. On the other transportation, financial services, construction services, travel has two-way trade scope between ASEAN and India. Besides, Automotive industry, IT embedded services in goods trade, robotics are the other potential areas, which can be considered in the review of services and investment agreement along with AIFTA. Both ASEAN and India should address behind the border issues such as lack of MRAs of institutional certificates, lack of market knowledge of service sector opportunities. For instance, ASEAN and India should support Mode 4 commitments to facilitate visa, particularly for the business category. Both government bodies and business chambers play a key role in formulating policy to promote trade in services and facilitate investment in the services sector.

India-ASEAN Trade in Services: Prospects and Challenges

1. Introduction

India is among the world's top 10 exporters and importers of commercial services, thus occupying eighth rank in exports and tenth rank in imports in 2017 (Government of India, 2019). Given the growing importance of services in India's domestic economy as well as in international trade, India has keen interests in various services, and therefore, services are becoming an important part of India's effort to economically integrate with ASEAN, though the initial focus in such integration was only on goods. The ASEAN-India Trade in Goods Agreement (AITIGA) entered into force on 1 January 2010, but the ASEAN-India Trade in Services Agreement (AITISA) was signed in 2014 and became effective in 2015 for seven ASEAN countries, namely, Brunei Darussalam, Lao PDR, Malaysia, Myanmar, Singapore, Thailand, and Vietnam, as well as for India, who have notified their ratification of the Agreement in 2015.¹The agreement was ratified by all parties in 2018.² Apart from the ASEAN-India Trade in Services Agreement that India has signed with ASEAN India has also signed bilateral agreements with two of the ASEAN members, namely, the India-Singapore Comprehensive Economic Cooperation Agreement (CECA) in 2005 and the India-Malaysia CECA in 2011.

This chapter aims at analysing India's services trade with the ASEAN region and how India's services trade interests are taken into consideration by ASEAN countries in the ASEAN-India Services Trade Agreement and the services trade FTAs signed between India and two of ASEAN members, namely, Singapore and Malaysia. It also discusses the opportunities and challenges in services trade between India and ASEAN in the current environment of global pandemic.

This chapter is structured as follows. Section 2 illustrates the trends in services trade for India and ASEAN to highlight their existing relationship in services trade. Section 3 discusses the ASEAN-India Trade in Services Agreement and analyses textual obligations and commitments by each country in this Agreement. Section 4 analyses the services commitments in the India-Singapore and India-Malaysia bilateral FTAs. Section 5 discusses how mutual recognition of qualification issues were addressed between India and ASEAN in these agreements. Section 6 analyses two important ASEAN FTAs, namely, with Australia and New Zealand (AANZFTA) and with China (ACFTA) to make a comparative assessment of ASEAN-India services FTA. Section 7 presents opportunities and challenges for enhancing services trade between the two regions amidst the Covid-19 outbreak. Section 8 concludes the chapter with policy suggestions.

2. Trends in India-ASEAN Trade in Services

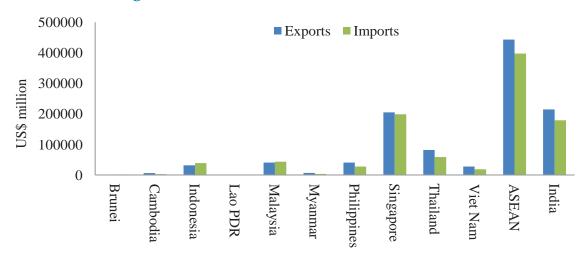
While India is considered as a significant player in global services trade, the same does not hold true for most of the ASEAN countries. Table 1 provides services trade data for ASEAN countries and India for year 2019. It could be observed from Table 1 and Figure 1 that except Singapore and Thailand, no other ASEAN country is a significant exporter of services with all the remaining ASEAN members having less than one per cent share in global services exports individually. On the other hand, India has a share of 3.49 per cent in global services exports. All ASEAN countries except Brunei Darussalam, Indonesia, and Malaysia have surplus in services trade in 2019, though the surplus is not much except for the Philippines and Thailand. India also has a surplus of around US\$ 35.18 billion in its services trade in 2019.

Table 1: Trade in Services for ASEAN and India, 2019

Country	Exports	Share in World Exports	Imports	Share in World Imports	Trade Surplus/ Deficit
	(US\$ million)	(%)	(US\$ million)	(%)	(US\$ million)
Brunei	617.8	0.01	1811.6	0.03	-1193.8
Cambodia	6253.8	0.10	3203.6	0.05	3050.2
Indonesia	31603.3	0.51	39386.8	0.68	-7783.6
Lao PDR	1109.2	0.02	1281.2	0.02	-172.0
Malaysia	40883.1	0.67	43500.7	0.75	-2617.6
Myanmar	7085.1	0.12	3529.2	0.06	3555.9
The Philippines	40991.3	0.67	27928.1	0.48	13063.1
Singapore	204813.7	3.33	199049.8	3.42	5763.9
Thailand	82010.4	1.33	58764.8	1.01	23245.6
Vietnam	27599.9	0.45	18770.4	0.32	8829.5
ASEAN	442967.4	7.21	397226.0	6.82	45741.4
India	214364.5	3.49	179178.4	3.08	35186.1

Source: UNCTAD Statistics.

Figure 1: Trade in Services for ASEAN and India, 2019



Source: Author's calculations based on UNCTAD Statistics.

Tables 2 and 3 present bilateral services trade between India and ASEAN countries. The statistics are based on OECD TiVA database available for the latest year 2015. India exported US\$ 17 billion worth of services to ASEAN and imported US\$ 13 billion worth of services from ASEAN countries in 2015. Singapore, Indonesia, Malaysia and Thailand are the main trading partners for India both for exports and imports. India's exports to ASEAN countries mainly concentrated in IT and information services, finance and insurance, other business services and transport services, whereas for imports, important services are finance and insurance and transport services.

Table 2: India's Services Exports to ASEAN Countries, 2015

(US\$ Million)

Sector	Total services	Transport	IT and information	Finance and insurance	Other business	Arts, entertainment, recreation and other	Telecom	Education
Brunei	38.4	7.2	20.3	0.5	4.0	0.2	0.6	0.1
Cambodia	117.1	37.8	55.6	2.5	2.8	0.7	3.6	0.5
Indonesia	2189.5	446.5	866	87.6	345.1	16.2	66.8	7.7
Malaysia	2189.6	419.4	1148.5	32.4	148.7	15.4	63.2	6.3
The Philippines	888.8	185.7	256.8	34.4	93.1	19.3	20.7	11.8
Singapore	8878.4	1480.2	2432.1	1723	1903.8	43.9	155.5	26.5
Thailand	1805.7	881.0	46.8	87.1	331.9	14.5	22.7	7.7
Vietnam	880.5	308.3	102.5	141.9	23.5	8.5	6.6	6.6

Source: OECD TiVA Database.

Table 3: India's Services Imports from ASEAN Countries, 2015

(US\$ Million)

Sector	Total services	Transport	IT and information	Finance and insurance	Other business	Arts, entertainment, recreation and other	Telecom	Education
Brunei	36.4	15.3	1.2	0.7	7.3	0.4	0.4	0.1
Cambodia	8.3	4.8	0	0.1	0.9	0.1	0.2	0.1
Indonesia	2759.9	492.1	20.4	42.5	333.3	11.2	34.6	3.0
Malaysia	1457.8	290.7	70.1	48.3	222.2	16.1	24.3	4.4
The Philippines	548.1	122.3	20.5	146.9	157.7	6.0	6.5	0.7
Singapore	6461.0	1764.1	273.6	1324.2	751.1	32.4	25.3	8.9
Thailand	1658.6	310.4	1.5	62.2	240.9	38.6	30.7	0
Vietnam	260.5	78.9	7.0	51.2	10.8	1.8	3.8	0.8

Source: OECD TiVA Database.

The exports and imports trends are also reflected in India's competitiveness relative to ASEAN countries in various services. Revealed comparative advantage (RCA) indices³ for India and ASEAN countries, as shown in Table 4, indicate that India is more competitive than ASEAN countries, excepting the Philippines, in the computer and information services and the other business services (e.g., management, consulting and professional services) sectors. In contrast, India is not competitive in transport and travel services, which are the sectors where most ASEAN countries are found to be competitive.

Table 4: Revealed Comparative Advantage in Overall and Individual Services, 2019 (India and ASEAN Countries)

Country	All Services	Transport services	Travel services	Other services	Computer services	Other business services
Brunei	0.39	3.78	1.11	0.14	n/a	0.13
Cambodia	1.27	0.66	3.25	0.17	0.01	0.09
Indonesia	0.58	0.89	1.96	0.61	0.12	1.04
Lao PDR	0.85	0.56	3.50	0.08	n/a	n/a
Malaysia	0.73	0.66	2.09	0.54	n/a	0.73
Myanmar	1.22	0.44	2.35	0.43	n/a	0.48
The Philippines	1.78	0.35	0.67	1.25	2.10	2.19
Singapore	1.26	1.59	0.49	1.03	0.82	1.14
Thailand	1.03	0.49	2.94	0.36	n/a	0.73
Vietnam	0.27	1.17	2.74	0.23	n/a	n/a
ASEAN	0.96	1.07	1.41	0.78	0.66	1.05
India	1.57	0.54	0.57	1.40	3.98	1.51

Source: Author's calculation based on UNCATD Statistics.

Thus, the RCA indices reveal that there is a complementarity across various services between India and ASEAN countries. The only country with which there is overlapping or competing interest in India's two main export segments, namely, computer and information and business and professional services, is the Philippines.

3. ASEAN-India Trade in Services Agreement

The ASEAN-India Trade in Services Agreement (AITISA) is the first comprehensive agreement that India has entered into with ASEAN countries as a block. This agreement is also a part of the Look East-Act East policy of the Government of India in order to increase its engagement with the ASEAN countries. This Agreement provides business certainty to service providers from both India and ASEAN countries and is expected to strengthen the business and commercial relations between ASEAN and India. The AITISA with the ASEAN contains features of a modern and comprehensive agreement on services and is in line with the other bilateral agreements that India has signed so far. A brief annex on Movement of Natural Persons (one of the key areas of interest for India) has been included in the Agreement. This annex defines categories of natural persons like Business Visitors, Intra Corporate Transferees (Managers, Executives and Specialists) and Contractual Service Suppliers (Gupta, 2019).

Table 5: Services Coverage in ASEAN-India Trade in Services Agreement

Services Sector	India - Indonesia	India - The Philippines	India -Others*	Brunei	Cambodia	Indonesia	Lao PDR	Malaysia	Myanmar	The Philippines	Singapore	Thailand	Vietnam
Business Services	√	\checkmark	√	$\sqrt{}$				√					$\sqrt{}$
Communication Services	√	√	√	√	√	√	√	**	√	×	√	$\sqrt{}$	√
Construction and Related Engineering Services	V	×	√	×	√	√	√	√	√	×	√	$\sqrt{}$	√
Distribution Services	×	×	×	×	√	×	×	×	×	×	√	√	√
Educational Services	×	×	×	√	√	√		√	√	×	√	×	$\sqrt{}$
Environmental Services	×	×	×	×	√	×	√	×	×	√	√	×	√
Financial Services	√	√	√	√	√	√	V	×	×	√	√		√
Health Related and Social Services	√	√	√	√	√	×	×	×	×	×	1	√	1
Tourism and Travel Related Services	√	√	√	√	√	√	√	√	√	1	√	V	V
Recreational Cultural and Sporting Services	×	×	×	×	√	×	×	×	1	×	√	√	√
Transport Services	√	×	√	V	√	1	×	√	√	1	1	1	$\sqrt{}$
Other Services Not Included Elsewhere	×	×	×	×	×	√	×	×	×	×	√	×	×

Notes: *Others include other ASEAN Members; **Telecommunication sector is excluded for Malaysia for ASEAN-India FTA as Malaysia has reclassified its communication sector on the basis of provisioning of NFP, NSP and Application service provider. **Source:** Author's compilation.

In addition to the conventional General Agreement on Trade in Services (GATS) based Articles, it also contains comprehensive review clauses. Both India and ASEAN countries have taken GATS plus commitments in various services and modes of supply. Each ASEAN country has tabled individual schedule of commitments, which are equally applicable for India and other ASEAN countries. India, on the other hand, has tabled three schedules of commitments - one for the Philippines, one for Indonesia and one for the remaining eight ASEAN countries. Tables 5 and 6 highlight the services coverage and the number of sub-sectors committed within each sector, respectively, in AITISA.

Table 6: Scope of Coverage: Number of Sectors Committed within Each Sector in ASEAN-India Trade in Services Agreement

Services Sector	India - Indonesia	India - The Philippines	India -Others*	Brunei	Cambodia	Indonesia	Lao PDR	Malaysia	Myanmar	The Philippines	Singapore	Thailand	Vietnam
Business Services	14	6	16	8	24	13	8	15	14	1	34	18	27
Communication Services	14	14	14	10	16	9	9	**	9	0	10	1	19
Construction and Related Engineering Services	1	0	1	0	5	4	5	5	1	0	5	2	5
Distribution Services	0	0	0	0	5	0	0	0	0	0	4	1	4
Educational Services	0	0	0	1	3	3	4	1	5	0	2	0	4
Environmental Services	0	0	0	0	4	0	4	0	0	1	2	0	3
Financial Services	15	15	15	5	16	10	4	0	0	11	16	0	16
Health Related and Social Services	1	1	1	1	1	0	0	0	0	0	2	1	1
Tourism and Travel Related Services	2	2	2	1	3	2	2	3	1	3	3	2	2
Recreational Cultural and Sporting Services	0	0	0	0	1	0	0	0	1	0	4	2	2
Transport Services	1	0	1	4	11	3	0	4	6	15	8	4	15
Other Services Not Included Elsewhere	0	0	0	0	0	3	0	0	0	0	1	0	0
Total	48	38	50	30	89	47	36	28	37	31	91	31	98

Notes: *Others include other ASEAN Members; **Telecommunication sector is excluded for Malaysia for ASEAN-India FTA as Malaysia has reclassified its communication sector on the basis of provisioning of NFP, NSP and Application service provider. **Source:** Author's compilation.

Table 7: Number of Subsectors Committed under GATS and ASEAN-India FTA

Country	GATS	ASEAN-India FTA
Brunei	21	30
Cambodia	89	89
Indonesia	44	47
Lao PDR	72	36
Malaysia*	66	28
Myanmar	5	37
The Philippines	45	31
Singapore	59	91
Thailand	71	31
Vietnam	98	98
India**	36	50

Notes: *Telecommunication sector is excluded for Malaysia for ASEAN-India FTA as Malaysia has reclassified its communication sector on the basis of provisioning of NFP, NSP and Application service provider. ** India's commitment to all ASEAN members except Indonesia and the Philippines in the FTA.

Source: Author's compilation.

The number of subsectors committed by ASEAN countries and India in this Agreement shows an improvement over the commitments made by most of these countries under the GATS of the World Trade Organization (WTO). Table 7 provides a comparative assessment of subsectors committed under the GATS and in this FTA by the respective countries.

Apart from analysing width (coverage) of commitments in the AITISA, it is also important to analyse the depth of these commitments. The depth of commitments is analysed in this chapter using the Hoekman methodology. Hoekman method (1995) assigns the value of 1 when a subsector is fully liberaliszed; 0.5 when partially liberalized; and 0 when it is 'unbound' (no commitment to liberalize) for each mode and by aspect (market access of national treatment). The final index value is a simple average aggregation of all values. The higher the Hoekman Index, the more liberal the country's service trade commitments are in the FTA. Table 8 presents the Hoekman Index for ASEAN members and India in the services agreement between the two.

Table 8: Hoekman Index for ASEAN Members and India

Country	Market Access (% of Openness)	National Treatment (% of Openness)
Brunei	9.84	11.21
Cambodia	43.71	47.90
Indonesia	18.71	17.42
Lao PDR	16.69	15.40
Malaysia	21.69	22.10
The Philippines	12.98	14.76
Myanmar	13.71	13.55
Singapore	45.67	41.59
Thailand	11.69	11.37
Vietnam	40.16	44.60
India	15.81	15.24

Source: Author's compilation.

It could be observed from the Hoekman Index values for market access and national treatment commitments in Table 8 that this Agreement does not provide in-depth commitments by various members indicating lack of ambitions in this Agreement as against many other new age agreements of contemporary times.

It also important to note that though there are some improvements in the number of subsectors committed by ASEAN members in this agreement as compared to the GATS, not much improvement is visible in two key areas of interests for India, namely, computer-related services and Mode 4 (temporary movement of natural persons). Table 9 provides the commitments taken by various ASEAN countries for various sub-sectors of computer related services (CRS) in the AITISA.

Table 9 shows that barring Indonesia, the Philippines, Singapore and Thailand, all other ASEAN countries had taken commitments in various sub-sectors of computer related services. While Singapore and Thailand had taken four out of five CRS sub-sectors, Indonesia had committed only two of these sub-sectors. The Philippines had not taken any commitments in computer-related services in this agreement. India had committed all five sub-sectors in its separate offers to Indonesia and the Philippines and combined offer to all other ASEAN countries.

Table 9: Computer Related Services Commitments in AITISA

Sub-Sector	Consultancy services related to the installation of computer hardware (CPC 841)	Software implementation services (CPC 842)	Data Processing services (CPC 843)	Data base services (CPC 844)	Other (CPC 845+849)
Brunei	✓	✓	✓	✓	✓
Cambodia	✓	✓	✓	✓	✓
Indonesia	✓	✓	×	×	×
Lao PDR	✓	✓	✓	✓	✓
Malaysia	✓	✓	✓	✓	✓
Myanmar	✓	✓	✓	✓	✓
The Philippines	×	×	×	×	×
Singapore	✓	✓	✓	✓	×
Thailand	✓	✓	✓	✓	×
Vietnam	✓	✓	✓	✓	✓
India to Indonesia	✓	✓	✓	✓	✓
India to The Philippines	✓	✓	✓	✓	✓
India to other ASEAN Members	✓	✓	✓	✓	✓

Source: Author's compilation.

Another important area of offensive interests for India is commitments in Mode 4 of services supply (temporary movement of natural persons). ASEAN countries had undertaken only modest commitments in Mode 4 in this agreement. Brunei and Singapore had committed only Intra-Corporate Transferee categories (ICT). Cambodia, Indonesia, Myanmar, the Philippines, and Thailand had committed only Business Visitor (BV) and Intra-Corporate Transferee categories. Lao PDR and Vietnam had committed Contract Services Suppliers (CSS) category also apart from BV and ICT. On the other hand, India had committed BV, ICT, CSS and IP (Independent Professionals) to all ASEAN members except the Philippines to which it had committed only BV and ICT categories.

Thus, the commitments by ASEAN countries in these two key areas of offensive interests to India are modest only. Therefore, it could be said that the AITISA is not an ambitious Agreement from the perspective of catering to India's offensive interests in services trade.

4. Bilateral Free Trade Agreements of India with Singapore and Malaysia

India has signed comprehensive agreement bilaterally with two of the ASEAN countries, namely, Singapore and Malaysia. The India-Singapore CECA was signed and implemented in 2005. Two reviews of the India-Singapore CECA have already been completed and the third review is in progress. The India-Malaysia CECA was signed and implemented in 2011.

The services sector coverage in these comprehensive agreements follows the GATS positive list approach. The coverage for these agreements is given in Tables 10, 11 and 12. Table 10 reveals that while Singapore and Malaysia had committed six and nine sectors, respectively under the GATS, they committed 12 and 11 sectors, respectively in their FTAs with India. It is also evident from Tables 11 and 12 that India has also significantly increased the coverage of its services commitments under these FTAs as compared to its GATS commitments. While it has committed only 36 subsectors under the GATS, it has committed 67 subsectors in the India-Singapore CECA and 84 subsectors in India-Malaysia CECA. Singapore and Malaysia have also increased coverage of their services commitments under these FTAs with India receiving commitments in larger number of sub-sectors from Singapore as compared to Malaysia in the respective CECAs. However, India has increased its sectoral coverage by more than its partners under these FTAs as it had committed far fewer sectors under the GATS.

Table 10: Services Coverage in India's FTAs with Singapore and Malaysia

Service Sector/		GATS			Malaysia ECA	India-Singapore CECA		
Agreement	India	Malaysia	Singapore	India	Malaysia	India	Singapore	
Business Services		$\sqrt{}$	√	√	√	√	$\sqrt{}$	
Communication Services	√	√	√	√	√	√	√	
Construction and Related Engineering Services	√	V	-	√	√	√	√	
Distribution Services	-	-	-	√	√	√	√	
Educational Services	-	-	-	√	√		√	
Environmental Services	-	-	-	√	√		√	
Financial Services	√	√	√			√	√	
Health Related and Social Services	√	√		√	√	√	√	
Tourism and Travel Related Services	√	√	√	√	√	√	V	
Recreational Cultural and Sporting Services	-	√	√	√	√	√	√	
Transport Services	-	√	√	√	√	√	√	
Other Services Not Included Elsewhere	-	√	-	-	√	-	√	

Source: Author's compilation.

Table 11: Total Sectors Committed by India and Malaysia in GATS and CECA

6 1	Total Sectors Committed				
Country	GATS	CECA			
Malaysia	63	133			
India	36	84			

Source: Author's calculation.

Table 12: Total Sectors Committed by India and Singapore in GATS and CECA

6 1	Total S	Total Sectors Committed			
Country	GATS	CECA			
Singapore	69 (incl. financial services)	72 (excl. financial services)			
India	36	67			

Source: Author's calculation.

Most of the commitments by Singapore and Malaysia in their FTAs with India are in business services, communication services, and transport services. Singapore has a higher number of subsectors committed in construction and related engineering services and distribution services. There are a few interesting sectors committed by FTA partner countries in these FTAs though these are unlikely to be served by Indian service providers. For instance, Singapore has committed in Funeral and Crematorium services in the India-Singapore CECA as the 12th service sector, though it was not committed by Singapore under the GATS. Similarly, Malaysia has committed in Child day-care services including day-care services for the handicapped in India-Malaysia CECA.

5. Recognition of Qualifications and Related Issues⁴

An important issue affecting services trade is the recognition of qualifications. Modernage FTAs generally have provisions pertaining to mutual recognition agreements (MRAs) between the parties to the agreement. However, most of these FTAs have soft obligations on signing of MRAs. FTAs between India and ASEAN countries are also not an exception to it.

The AITISA has allowed that the partner countries shall encourage their respective professional bodies or professional regulatory authorities, in any regulated services sector of mutual interest to negotiate and conclude within 12 months or a reasonable timeframe to be mutually agreed between the professional bodies of both countries, any arrangement for mutual recognition of education, or experience obtained, requirements met, or licenses or certifications granted in that service sector, with a view to the achievement of early outcomes. However, it has further provided that any delay or failure by these professional bodies to reach and conclude agreement on the details of such agreements or arrangements shall not be regarded as a breach of a country's obligations and shall not be subject to the Dispute Settlement Mechanism.

India-Singapore and India-Malaysia Agreements have specified the services sector for mutual recognition of qualification. These FTAs have provided that the countries shall ensure that their respective professional bodies in the service sectors of accounting and auditing, architecture, medical (doctors), dental and nursing negotiate and conclude, within 12 months of the date of entry into force of the agreement, any such agreements or arrangements providing for mutual recognition of the education or experience obtained. For those regulated services not covered in these agreements, a request may be made by either of the countries after the entry into force of the agreement and the requested country shall encourage

its relevant professional, standard-setting or self-regulatory body in that service sector to enter into negotiations, within a reasonable period of time from the date of the request being received in writing, to negotiate agreements or arrangements providing for mutual recognition of education, or experience obtained, requirements met, or licenses or certifications granted in that service sector, with a view to the achievement of early outcomes.

Table 13 provides the coverage of services sectors from a mutual recognition perspective and the prescribed time limits to negotiate such MRAs under these comprehensive agreements.

Table 13: Coverage of Services Sectors from Mutual Recognition Perspective in India's Free Trade Agreements with Singapore and Malaysia

Agreement	Services Considered for MRA	Prescribed Time Limit to Sign MRA
India-Singapore CECA	Accounting and Auditing, Architecture, Medical (Doctors), Dental and Nursing	Within twelve months of the date of entry into force of the Agreement
India-Malaysia CECA	Accounting and Auditing, Architecture, Medical (Doctors), Dental and Nursing	Within twelve months or a reasonable period of time from the date of entry into force of the Agreement

Source: Author's compilation.

Both the Agreements have mentioned that if a country recognises, by agreement or arrangement, the education or experience obtained, requirements met or licenses or certifications granted in the third country, adequate opportunity to negotiate its accession to such an agreement or arrangement or to negotiate comparable ones with it should also be provided to the FTA partner country. If a country accords recognition autonomously, it shall afford adequate opportunity for the other country to demonstrate that the education or experience obtained, requirements met or licenses or certifications granted in that country should also be recognised. It must, however, be noted that such recognition is not subject to the dispute settlement mechanism as agreements specifically mentioned that the countries shall not be responsible in any way for the settlement of disputes arising out of or under the agreements or arrangements for mutual recognition concluded by their respective professional, standard-setting or self-regulatory bodies.

It could be noted that MRAs form an important area of cooperation on trade in services within ASEAN. At present, ASEAN has concluded MRAs in seven professional services. These include MRA on Engineering Services (2005); MRA on Nursing Services (2006); MRA on Architectural Services and Framework Arrangement for the Mutual Recognition of Surveying Qualifications (2007); MRA on Medical Practitioners (2009); MRA on Dental Practitioners (2009); and MRA on Accountancy Services (2014). ASEAN member states are actively implementing these MRAs within the region (ASEAN, 2019). On the other hand, the signing of MRAs in various professional services with India has not yet been very fruitful. The first MRA by India with any of its FTA partners was signed with Singapore for Nursing services during the 2nd Review of India-Singapore CECA in 2018. Singapore has agreed to recognise seven nursing institutions of India in the MRA (Government of India, 2018). In the remaining four areas listed in India-Singapore CECA, viz., architecture accountancy and auditing dentistry and medical (doctors), there has not been much progress.

6. Analysis of ASEAN FTAs for Assessing Potential Offerings by ASEAN to India

The discussion in the previous sections reveals that the AISTA though provides for economic integration in services between the two regions, it is not an ambitious Agreement. On the contrary, ASEAN has signed free trade agreements with other countries providing significant market access in various services. This section analyses two important agreements of ASEAN, namely, with China and Australia and New Zealand, to assess the potential offerings that could be made by ASEAN to India whenever the review of this agreement is undertaken.

The ASEAN-Australia-New Zealand Free Trade Area (AANZFTA) came into force on 1 January 2010. It is considered as the most comprehensive trade agreement that ASEAN has ever negotiated. An analysis of legal texts and commitments under AANZFTA reveals that the number of subsectors committed under ANAZFTA is much higher than ASEAN-India FTA. Moreover, even in area of India's key interest (movement of natural persons), ANAZFTA provides significantly better provisions than AIFTA. Whereas ASEAN FTA with India only pertains to business visitors, contract service suppliers and intra-corporate transferee, the AANZFTA facilitates the movement of natural persons engaged in trade and investment and sets out the obligations and commitments on the temporary movement of natural persons including business visitors, installers and servicers, executives of businesses, headquartered in a party, establishing a branch or subsidiary, or other commercial presence in another party, intra-corporate transferees; and contractual service suppliers. It also specifies the process for application of temporary entry and stay, and obligations on transparency. Another significant element under the AANZFTA is the provision protecting investments of service suppliers via Mode 3 or commercial presence. Through a linkage provision, the protection elements under the chapter on investment will also apply to Mode 3 investments.⁵

The ASEAN-China Agreement on Trade in Services was signed in January 2007 and entered into effect in July of the same year. Two important aspects differentiate this agreement from the ASEAN-India services agreement. First, whereas the qualification recognition provision in the AITISA has clearly mentioned that dispute settlement mechanism will not apply, the ASEAN-China agreement did not mention about non-applicability of dispute settlement mechanism. Second, the ASEAN-China agreement had an inbuilt mechanism for improvement of services commitments. The first package of specific commitments of each country is to be annexed to this Agreement at the time of signing and the second package of specific commitments is to be concluded within a year from the date of entry into force of this agreement, with the aim of substantially improving on the first package of specific commitments.

It is also to be noted that both India and ASEAN were part of the Regional Comprehensive Economic Partnership (RCEP) negotiations. India withdrew from the negotiations in November 2019, but ASEAN is continuing with other RCEP countries to finalise this Agreement. The guiding principles for negotiating RCEP agreements stated that liberalisation commitments should build on the RCEP participating countries' commitments under the GATS and the ASEAN+1 FTAs. All sectors and modes of supply will be subject to negotiations (ASEAN, 2012). It also included value added elements in the offer such as Ratchet (automatic binding of any autonomous liberalisation in the future) and MFN (provide the same preferential treatment as in any other future FTA.

7. Enhancing Services Trade between ASEAN and India amidst Covid-19: Opportunities and Challenges⁶

The most adverse impact of the global pandemic Covid-19 seems to be on the services sector as sectors such as tourism, travel, transport, logistics, etc. coming to an almost complete halt with lockdown and travel restrictions across the world. Services sector has been a growth driver for the Indian economy and generated surplus in India's current account that helped in offsetting deficit in goods account. Therefore, it is important to assess how India could enhance services trade with ASEAN countries amidst this pandemic. A close look at India's services strengths suggests that there are indeed opportunities which India is well positioned to realize, though not without associated challenges.

The pandemic has spurred demand for online delivery of services and use of online facilities for official and entertainment purposes. This provides avenues for enhancing and diversifying India's services exports through Mode 1, given India's global standing in IT-BPO services and the predominance of Mode 1 in its services exports. However, Mode 1 exports will face challenges from data protection regulations being framed in some of the ASEAN countries. Since the EU GDPR is considered by many of countries as a benchmark for their data privacy frameworks, India needs to align its data privacy laws with the GDPR to benchmark with global practices.

Mode 4 will face serious challenges and will be the most adversely affected by Covid-19 as countries adopt stricter visa regulations and labour market conditions for foreign nationals. In the near term, as the current travel ban is likely to continue for several months, it will adversely affect the movement of Indian professionals to deliver services to the ASEAN. To the extent that Mode 4 complements Mode 3, prospects for the latter may also be adversely affected.

However, the opportunities will also be there to enhance Mode 4 exports of health services as there will be greater demand for healthcare professionals including doctors, nurses and paramedical staff in ASEAN countries due to the pandemic.

With the global slowdown and changing sentiment towards China, foreign investors may look to relocate their investments to other countries. ASEAN countries such as Vietnam, Malaysia and Thailand may become their first choice for such relocation. This could be another area of opportunity for India for the movement of its skilled professionals. Given the population and availability of skilled manpower in these countries, they may require foreign talent if significant investment gets relocated from China to these countries in coming years.

8. Way Forward and Policy Recommendations

India started its integration with ASEAN in services with signing of India-Singapore CECA in 2005, followed by India-Malaysia CECA in 2011. The process continued by signing services agreement with all ASEAN countries in 2015, though it was ratified by all Parties in 2018.

Given its skilled human resources and buoyant services sector, India has competitive advantage in services as compared to the ASEAN. The services FTAs signed by India with ASEAN countries have provided opportunities for Indian services providers to integrate with ASEAN and expand their footprints in this region. However, Indian services providers do not seem to benefit much from preferential market access given by ASEAN countries in their FTAs with India given the fact that the US and the EU continue to have a large share of India's services exports, particularly in IT services. The low share of ASEAN countries in India's services exports is partly a reflection of low ambitions in the existing agreements, regulatory and cultural barriers prevalent in these countries and partly the result of discriminatory standards applied by these countries for Indian service providers.

In a post-Covid-19 world, the sensitivities towards globalisation and international trade are likely to increase at global level, and India and ASEAN will not remain untouched from such sensitivities playing out. In particular, Mode 4 related sensitivities are likely to increase, which is already the most restrictive and sensitive mode in the AITISA. Therefore, given Mode 4's importance in India's services trade, India needs to include Mode 4 safeguard provisions whenever the review of this FTA takes place in future. India may also consider alternative approaches, such as negotiating bilateral labour agreements either with individual ASEAN countries or ASEAN as a bloc allowing the movement of natural persons in specific sectors or activities, for predetermined durations and with dedicated return mechanisms.

Nonetheless, the pandemic will also create new opportunities for enhancing services trade between India and ASEAN, which India could leverage with suitable proactive steps, such as focusing on Mode 1 based services exports and address issues of data protection, liability, and infrastructure.

Endnotes

- 1. http://www.mfa.gov.bn/site/home.aspx
- 2. Refer, ASEAN (2019a).
- a. RCA is a measure of competitiveness which is calculated as the ratio of the share of a good or service exports in a country's overall goods or services exports to the share of the world's good or service exports in the world's overall goods or services exports. An RCA value greater than 1 indicates competitiveness in a sector and a value less than 1 indicates lack of competitiveness in a sector.
- 4. Based on Gupta (2019)
- 5. Based on https://aanzfta.asean.org/aanzfta-sector-portals/trade-in-services-sector
- 6. Based on Chanda and Gupta (2020)

References

- ASEAN. 2007. ASEAN-China Free Trade Agreement. Legal Text and Offers. Available at: https://asean.org/?static_post=asean-china-free-trade-area-2 (accessed on August 07, 2020)
- —— 2010. ASEAN-Australia-New Zealand Free Trade Agreement (AANZFTA). Legal Text and Offers. Available at: https://aanzfta.asean.org/aanzfta-sector-portals/trade-in-services-sector (accessed on August 07, 2020)
- —— 2012. Guiding Principles and Objectives for Negotiating the Regional Comprehensive Economic Partnership. Available at: https://asean.org > uploads > 2012/05 > RCEP-Guiding-Principles-public-copy (accessed on September 25, 2019)
- —— 2019a. The Sixteenth AEM-India Consultation. Joint Media Statement. 10 September 2019, Bangkok, Thailand. Available at https://asean.org/storage/2019/09/AEM-India-16-JMS-FINAL.pdf
- —— 2019b. Trade in Services in ASEAN. Available at: https://asean.org/asean-economic-community/sectoral-bodies-under-the-purview-of-aem/services/ (accessed on July 20, 2020)
- Chanda, R. and Gupta, P. 2020. Needed: A fresh look at the services sector. *Business Standard*, June 18, 2020. Available at: https://www.business-standard.com/article/opinion/needed-a-fresh-look-at-the-services-sector-120061801970_1.html.
- Government of India. 2018. India Signs Mutual Recognition Agreement (MRA) in Nursing with Singapore. Press Information Bureau, Government of India, June 01. Available at https://pib.gov.in/newsite/PrintRelease.aspx?relid=179700 (accessed on October 08, 2019)
- —— 2019. Economic Survey 2019. Available at: https://www.indiabudget.gov.in/economicsurvey/, (accessed on July 22, 2019)

- Gupta, P. 2019. India's Economic Integration in Services with ASEAN: From Bilateral FTAs to RCEP. *Journal of Asian Economic Integration*, Vol. 1(2), pp 207–223.
- Hoekman, B. 1995. Assessing the General Agreement on Trade in Services. World Bank Discussion Paper No.307, Washington D.C.: World Bank.
- MoCI, India 2005. India-Singapore Comprehensive Economic Co-operation Agreement. Legal Text and Services Offers. Ministry of Commerce and Industry, Government of India. Available at: https://commerce.gov.in/InnerContent.aspx?Type=InternationalTrademenu&Id=32, (accessed on October 07, 2019)
- —— 2011. India-Malaysia Comprehensive Economic Co-operation Agreement Legal Text and Services Offers. Ministry of Commerce and Industry, Government of India. Available at https://commerce.gov.in/ InnerContent.aspx?Type=InternationalTrademenu&Id=32, (accessed on October 07, 2019)
- —— 2015 ASEAN-India Trade in Services Agreement. Legal Text and Offers. Ministry of Commerce and Industry, Government of India. Available at: https://commerce.gov.in/InnerContent.aspx?Type=InternationalTrade menu&Id=32 (accessed on October 07, 2019)
- OECD TiVA Database 2020. Available at: https://www.oecd.org/sti/ind/measuring-trade-in-value-added.htm. (accessed on August 10, 2020)
- UNCTAD Statistics 2020. Available at: https://unctad.org/en/Pages/statistics.aspx (accessed on August 10, 2020)
- MFA, Brunei. The ASEAN-India Free trade Agreement. Available at: http://www.mfa.gov.bn/Pages/The-ASEAN-%E2%80%93-India-Free-Trade-Agreement.aspx

ASEAN-India Investment Relations: Challenges and Opportunities

1. Introduction

Foreign Direct Investment (FDI) is considered as an important source for achieving faster economic growth¹. FDI can also have a positive impact on the host country's development. Favourable policies for attracting FDI and enhancing the linkages between MNCs and domestic firms are very vital for the recipient countries. FDI can be a source of valuable technology and know-how while fostering linkages with domestic firms through backward and forward linkages. The Asia-Pacific region is the largest destination and source of foreign direct investment (FDI) globally.² ASEAN and India have introduced several important policy reforms over the last few decades to attract FDI and gained investors' confidence. Today, ASEAN countries and India are some of the major recipients of FDI.

Globally, the flow of FDI has been slowed down due to the Covid-19. For instance, UNCTAD (2020) reported that the forecast for global FDI flows would decrease by upto 40 per cent (i.e., US\$ 1 trillion) in 2020 from US\$ 1.54 trillion in 2019. FDI flow is further forecast to decrease by 5 to 10 per cent in 2021 and show the recovery slowly from 2022 onwards. The impact of Covid-19 is more severe in the developing Asia due to supply chain disruptions, where most of the FDI are in value chain intensive industries. Therefore, the FDI flows to developing Asia may likely to fall by 30 to 45 per cent in 2020. In the case of India and Southeast Asian countries, due to Covid-19, FDI flows would be little lower, and may decline by 5 per cent in 2020. However, FDI flows will pick up the momentum once the pandemic subsides along with restoration of investors' confidence.

In view of the above, this chapter analyses the trends in investment, investment barriers and policy measures to explore the investment opportunities between ASEAN and India. The chapter also looks into emerging investment opportunities amidst Covid-19 outbreak and also potentials of FDI and GVCs in ASEAN and India, given that multinational firms play a significant role in bringing international resources, technology sharing and production networking across countries, which could generate enormous benefits to MSMEs in the region. Besides, the chapter also presents some important policy recommendations to promote investment flows between ASEAN and India.

The rest of the chapter is arranged as follows. Section 2 presents the trends in FDI flows between ASEAN and India. Section 3 presents potential sectors to invest between ASEAN and India, whereas Section 4 discusses the value chain linkages and investment opportunities between them. Section 5 discusses the policy measures to liberalise investment regime in ASEAN and India. Section 6 presents the measures to

remove the investment barriers and business environment. The regional investment policy framework is discussed in Section 7. Section 8 calls for policy implications to strengthen the investment relations between ASEAN and India. Finally, Section 9 presents the concluding remarks.

2. Trends of FDI Flows between ASEAN and India

Emerging countries in Asia have received attention from international investors because of their high rates of economic growth, sound macroeconomic environment, promising market, and participation in the global value chains.³ As a result, FDI inflows between 2000 and 2019 have increased substantially in the Southeast Asian countries such as Singapore (US\$ 105.47 billion), Indonesia (US\$ 24.58 billion), Malaysia (US\$ 8.57 billion), the Philippines (US\$ 7.65 billion), Vietnam (US\$ 15.5 billion), and so on (Table 1). China has been an attractive destination of FDI. In 2019, China has attracted FDI of about US\$ 155.8 billion, highest recipient in the world. Apart from China, India has also attracted significant FDI inflows of about US\$ 50.61 billion in 2019, contributing about 2 per cent to GDP. With further development of the capital markets along with liberalisation of the capital market-related investment laws, FDI flows have become substantial in India. Some of the LDCs have also attracted relatively higher FDI inflows, which have contributed about 4 per cent and above to their respective GDPs. Some of these countries are Cambodia (13.7 per cent), Lao PDR (7.4 per cent) and Vietnam (6.3 per cent) (Figure 1). In the case of FDI outflows from ASEAN and ASEAN plus countries, Japan (US\$ 248.68 billion), China (US\$ 97.7 billion), South Korea (US\$ 35.53 billion) and Singapore (US\$ 33.28 billion) are the major countries, which have been investing in abroad, where most of their investments flow into Southeast Asia and India.⁴

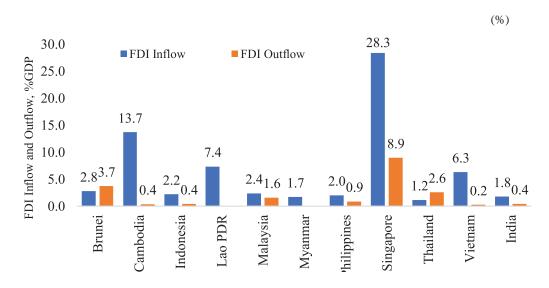


Figure 1: Share of FDI Flows in GDP, 2019

Note: For details refer to the notes of Table 1.

Source: World Development Indicators (WDI), the World Bank

Table 1:	Trends	of FDI	Flows in	ASEAN	and ASEAN	Plus Countries	i

Country		FDI Inflow		FDI Outflow					
		2010	2019	2010	2019				
		(US\$ Billion)							
	Brunei	0.55	0.37	0.55	0.55*				
	Cambodia	0.12	3.71	-0.02	0.10				
	Indonesia	-4.55	24.58	0.00	4.44				
7	Lao PDR	0.03	1.31*	0.01	0.00*				
ASEAN	Malaysia	3.79	8.57*	2.03	5.71*				
\SE	Myanmar	0.25	1.29*	0.09	-				
1	The Philippines	1.49	7.65	-0.63	3.31				
	Singapore	15.52	105.47	6.85	33.28				
	Thailand	3.37	6.32	-0.02	14.02				
	Vietnam	1.30	15.5*	1.45	0.59*				
	Australia	14.89	38.61	4.10	7.74				
+	China	42.10	155.82	4.61	97.70				
	India	3.58	50.61	0.51	12.10				
ASEAN	Japan	10.69	37.18	45.03	248.68				
\ \d	Korea	11.51	10.57	4.84	35.53				
	New Zealand	-1.51	3.95	-4.14	-1.65				

Note: * For the year 2018.

Source: World Development Indicators (WDI), the World Bank.

India's both inward and outward FDI stock with ASEAN has been growing steadily. India's cumulative FDI flows from ASEAN has increased from US\$ 1.53 billion in 2010 to US\$ 70.67 billion in 2019, grew at about 47 per cent between 2010 and 2019. In other words, in terms of India's FDI flows from the world, about one-fourth of India's FDI came from ASEAN in 2019 (see Table 2 and Figure 2). India's outward FDI to ASEAN countries has also increased considerably from US\$ 12.52 billion in 2010 to US\$ 60.5 billion in 2019, which holds about 23 per cent of India's FDI outward stock to the world. In case of India's FDI flows with sub-regional groups like MGC and BIMSTEC, the share of FDI flows was less than one per cent in 2019, whereas with respect to SAARC region, India's FDI flows to SAARC was higher than FDI inflows from SAARC to India (see Figure 2).

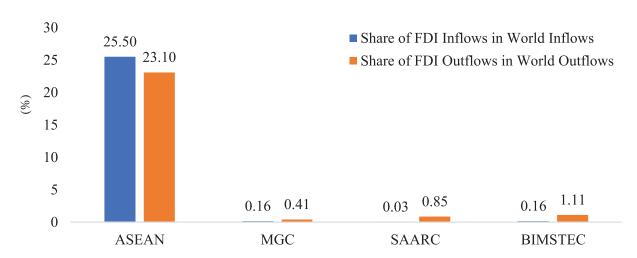
Table 2: India's FDI Stock with Regional Group

Group	FDI Inflow		Annualised Growth	FDI Outflow		Annualised Growth
Gloup	2010	2019	2010-2019	2010	2019	2010-2019
	(US\$ billion)		(%)	(US\$ b	(%)	
ASEAN	1.531	70.669	47	12.521	60.497	17
MGC	0.013	0.431	42	0.074	0.952	29
SAARC	0.002	0.082	47	0.408	2.291	19
BIMSTEC	0.014	0.448	41	0.459	2.840	20

Sources: FIPB, Department of Commerce, MoCI and Reserve Bank of India (RBI).

Figure 2: Share of India's FDI Inflows and Outflows to Regional Groups in Total FDI Inflows and Outflows

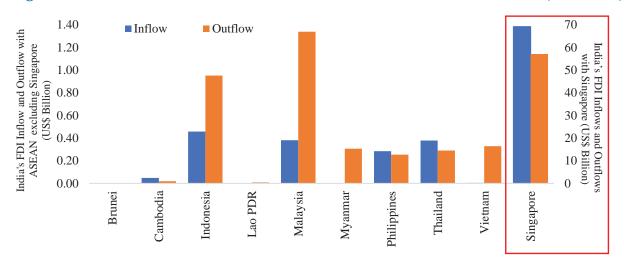
(%)



Sources: FIPB, Department of Commerce, MoCI and Reserve Bank of India (RBI).

India's FDI inflows and outflows in ASEAN are mainly with Singapore, followed by Indonesia, Thailand, the Philippines and Malaysia. India's outward FDI to Singapore is about US\$ 57 billion, whereas inward FDI from Singapore is about US\$ 69 billion for the period 2010 and 2019 (see Figure 3). This shows that among ASEAN countries, about 95 per cent of India's FDI inflows and FDI outflows are with Singapore, followed by only about 5 per cent of the FDI flows are clustered among Malaysia, Thailand, Vietnam and Indonesia (see Figure 4). The trends of India's inward and outward stock with all the ASEAN countries and Indo-Pacific show a steady rise in the movement, suggesting potential investment opportunities between ASEAN and India (see Figure 4)

Figure 3: India's FDI Inward and Outward Stock with ASEAN Countries (2010-2019)



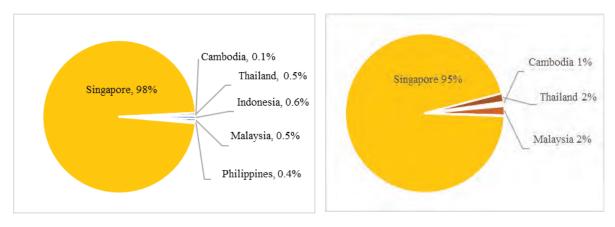
Note: The detailed trends of FDI inward and outward stocks between ASEAN and India are given in Appendix 1. *Sources:* FIPB, Department of Commerce, MoCI and Reserve Bank of India (RBI).

(%)

Figure 4: Share of India's FDI Inward and Outward with ASEAN Countries (2010-2019)

(a) Share of FDI Inflows (2010-2019)

(b) Share of FDI Outflows (2010 - 2019)



Source: FIPB, Department of Commerce, MoCI and Reserve Bank of India (RBI).

Trends of Sectoral Investment Relations between ASEAN and India

India's FDI flows with ASEAN countries have similar sectors such as construction, education, electricity, gas and water, finance, health and social services, hotels and restaurants, business activities, transport, storage and communications, machinery and equipment, chemical products, etc. Cambodia and Lao PDR receive FDI in agriculture and hunting, mining and quarrying, textiles, clothing and leathers, food and beverages sectors (Figure 5).

More and more firms from ASEAN countries are now investing in India, compared to firms from India investing in ASEAN countries. About 12,000 Singaporean firms have invested in India between 2008 and 2019, followed by about 200 to 700 firms from Malaysia, Thailand and Indonesia, which have invested in India between 2008 and 2019 (Figure 6). On the other hand, about 300 Indian firms have invested in Indonesia, Malaysia, Thailand and Singapore, followed by about 100 Indian firms have invested in Vietnam, the Philippines and Myanmar. Except for Cambodia and Brunei, Indian firms have invested in remaining ASEAN countries, whereas, only a few ASEAN countries have invested in India, and majorly from Singapore, Malaysia, Thailand.

3. Potential Sectors of Investment between ASEAN and India

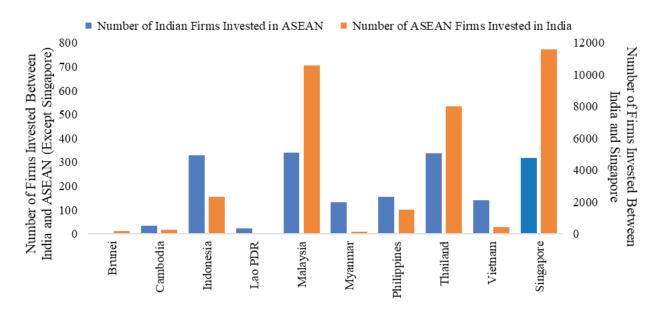
The pandemic has heavily affected almost all the countries, including India and ASEAN, with IMF predicting a negative growth rate of just -2.8 per cent for ASEAN and -10.5 per cent for India for the year 2020. Pandemic has also given new investment opportunities that have been emerging across several sectors. For instance, since the outbreak of the virus the demand for healthcare, online education, telecommunication, e-commerce, telemedicine, among others, have been growing. This has given new avenues for potential investment opportunities between ASEAN and India along with other existing sectors.

(%) 17.1 Agriculture and Mining 2.1 19.8 Manufacturing 29.1 20.9 Finance, Insurance and Business Services 16.9 8.7 Wholesale, Retail, Restaurants and Hotel 11.7 Construction 3.6 1.6 Community, Social and Personal Services 7.9 0.9 Electricity, Gas and Water 15.1 Transport, Storage and Communication Services 13.5 0.8 Miscellaneous Ouflow ■ Inflow

Figure 5: Sector-wise Share of India's FDI with ASEAN (2008-2019)

Sources: FIPB, Department of Commerce, MoCI and Reserve Bank of India (RBI).

Figure 6: Indian Firms Invested via Joint Venture and Wholly-owned Subsidiary in ASEAN (2008-2019)



Sources: FIPB, Department of Commerce, MoCI and Reserve Bank of India (RBI).

Investment in Digital Economy

The pandemic has boosted the digital technologies across various sectors and effectively accommodated remote workers and facilitated daily services. Lockdown has caused sharp increases in the adoption of digital services in tele-medicine, online conferencing software platforms and services, online education and e-commerce across the world.

With over 400 million internet users in the ASEAN region and 743.19 million internet users in India offer a unique opportunity for firms to invest in ITeS industries.⁵ To encourage wider use of digital tools by businesses and citizens, ASEAN and India are digitalising their processes, which offer huge investment opportunities for both ASEAN and India. Indian firms have already invested in Information Technology-enabled Services (ITeS) industries in ASEAN countries such as Singapore, Malaysia and Thailand.⁶ Similarly, firms from ASEAN countries like Singapore, Malaysia and the Philippines have also invested in telecommunication and information services providing industries in India.⁷ India has huge investment opportunities in the ITeS such as e-commerce, Business Process Outsourcing (BPO), financial services, consultancies, media and entertainment services and telecommunications. ASEAN also has potential to invest in the ITeS such as e-commerce, media and entertainment services. Both ASEAN and India should, therefore, strengthen the digital platform through encouraging public and private investment in digital connectivity. This would further increase the scope of new investment opportunities in ASEAN and India in high value-added professional services, financial services, artificial intelligence, etc.

Investment in Education Sector

With several million students engaging in online classes in both ASEAN and India, there is huge investment potential to develop the IT infrastructure in the countries where the digital penetration is very low, such as the CLMV countries. In fact, under the ASEAN Working Plan on Education 2016-2020, ASEAN has been strengthening the educational sector through digital learning initiatives and new educational technologies. There are opportunities for Indian firms to invest in the educational section in the ASEAN region, particularly in the CLMV countries for development of the IT-based infrastructure. Indian firms have already invested in the education sector in ASEAN countries such as Singapore, Malaysia and Thailand.⁸ On the other hand, firms from ASEAN countries, mostly from Singapore have invested in India in the education sector.⁹ This shows that there is huge potential for foreign firms from rest of the ASEAN countries to invest in the education sector in India.

Investment in Healthcare

To address the adverse impact of the pandemic, ASEAN and India have adopted policy measures to boost investment in the medical equipment and personal protective equipment (PPE) and to encourage domestic manufacturers to expand the production. Besides, the integration of information and communication technology into healthcare has been also accelerated during the Covid-19 period. The use of healthcare apps, for instance, could transform the way hospitals and doctors store records and sharing patient data. Indonesia-based healthcare app 'Alodokter' recorded more than 30 million active users since March 2020. ASEAN countries are gradually committing to universal healthcare systems, which may increase awareness among the consumers becoming more health-conscious in addition to demanding and spending more on health services. India's pharmaceutical industry has a strong hold in the global market. However, the major ingredients for producing drugs (APIs) are imported from China. This will open the investment opportunities between ASEAN and India to increase collaboration with multinational life science companies to produce the ingredients within ASEAN and India.

There will be potential investment opportunities in the post-pandemic phase in the healthcare sector in the fields of tele-medicine, biotechnology, pharmaceuticals, and diagnostic medicine, medical devices among others. Indian firms may focus on CLMV countries to invest in the healthcare. Indian healthcare

industry has already invested in ASEAN. ASEAN countries could also be tapped for investment in the healthcare sector in India in post-pandemic.¹¹

Investment in Food Processing Industry

Agriculture makes up a significant part of the economy in both ASEAN and India. Strengthening and expanding the agricultural sector in these countries, especially through higher productivity, could increase its economic value-added while enhancing food security. Given that the demand for packaged food is rising globally, both ASEAN and India should take advantage of the agricultural base and promote business opportunities in the food processing sector. ASEAN and India must engage in upstream and downstream parts of the value chain of the food processing.¹²

4. Investment to Strengthen Regional Value Chains between ASEAN and India

ASEAN countries actively participate in GVCs. Southeast Asian countries like Vietnam, Malaysia, Thailand, and Indonesia have achieved remarkable progress in GVCs. About 40 to 50 per cent of value-added embodied in terms of forward and backward linkages in the gross exports in ASEAN countries is at par with other developed countries such as Japan, Australia, Singapore, etc.¹³ Southeast Asia has also witnessed significant intra-regional investment, accounted for 26 per cent of the total FDI inflows in the ASEAN in 2018.¹⁴ Companies in the ASEAN region have invested approximately US\$ 21 billion, which has led to the surge of fragmentation in production and tasks between nations within ASEAN. Indian firms have a strong presence in the automobile sector in ASEAN countries.¹⁵

The pandemic has disrupted the GVCs across the world. The ongoing US-China trade tension disrupted the GVCs, even much before the Covid-19 outbreak. Several multinationals are reported to relocate their operations in other Asian countries including ASEAN and India. Japan has already put an effort to relocate and reverse the impact of Covid-19 by proposing to invest US\$ 1.5–2.5 billion in India. Similarly, Japan, South Korea, and Taiwan are actively increasing their presence in Southeast Asia. For instance, Japan has issued a US\$ 220 million subsidy programme to encourage domestic manufacturers to transfer their production bases to Southeast Asia.

The pandemic has the potential to alter the trade and investment paradigm, which leads the way to recreate new sustainable supply chain in ASEAN and India. India has been relaxing several laws and regulations under its 'Make in India for the World' initiative to attract investments and strengthen the regional value chains. India is expected to increase the production of semiconductors and electronics locally and tend to relocate or import substitution from China. For example, Taiwan-based Foxconn, major supplier of Apple mobile phones, has heavily invested in India under 'Make in India' initiative to exploit the potential Indian market for fast-growing demand of mobile phones. Several ASEAN firms could also invest in India in the sectors like food processing, automobile, electrical and electronic components, fishing, shipbuilding, etc.¹⁷ Besides, ASEAN countries have huge investment potential in automotive, electronics, chemicals, wholesale and retail operation services, finance and banking services, advertising and marketing consulting companies, engineering and infrastructure sectors.

To further strengthen the value chain and investment linkages, ASEAN and India should design appropriate policies and incentives for the MNCs to encourage local-affiliate production, local sourcing of parts and components, and transfer of technology to local manufacturers so that maximum spill over benefits can be realised. MSMEs play a strong role in forward or backward linkages with foreign or domestic firms to produce parts and components. Unlike large enterprises, MSMEs face huge challenges in improving productivity due to lack of financial resources and needed human skills. Therefore, both

ASEAN and India should give special focus to enhance the entrepreneurship, provide financial access, and support forums for MSMEs to explore business relationships. In addition, an integrated customs between India and ASEAN will strengthen the supply chains across the region.

5. Policy Measures to Liberalise Investment Regime in ASEAN and India

ASEAN and India have initiated multiple investment policy measures to tackle the devastating economic and social effects of the pandemic. Figure 7 shows the number of investment policy measures taken by both ASEAN and India. Countries like India (81), Vietnam (31), Myanmar (29), Indonesia (29), Thailand (12) and the Philippines (9) have introduced a higher number of policy measures, which are aimed mostly to liberalise FDI policies by providing tax incentives, subsidies and extending the sectors for plausible investments across primary, services and manufacturing sectors (see Figure 7 and Table 3). In particular, since January 2020, India (5), Vietnam (3), Indonesia (1) and Lao PDR (1) have come out with several investment policy measures in response to the Covid-19 and to protect critical domestic industries in the crisis times. India has liberalised FDI upto 100 per cent in almost all the sectors. Barring few, the country has liberalised upto 49 per cent in the sectors including defence, insurance, banking, and pension. India also offers investment incentives such as 200 per cent deduction on in-house R&D facility, goods imported for R&D purpose receive incentives and investment allowance at the rate of 15 per cent to manufacturing companies that invest more than US\$ 14 million in plant and machinery of electronics. To further simplify the existing procedures for seeking clearance of FDI proposals, Foreign Investment Promotion Board (FIPB) was abolished, and individual departments of the Government have been empowered to clear FDI proposals in consultation with the Department of Industrial Policy and Promotion (DIPP). To make India an attractive investment destination, India has signed Double Taxation Avoidance Agreements (DTTA)¹⁸ with 88 countries, out of which 86 are in force. India has DTAAs with all the ASEAN countries except Cambodia (Table 4).

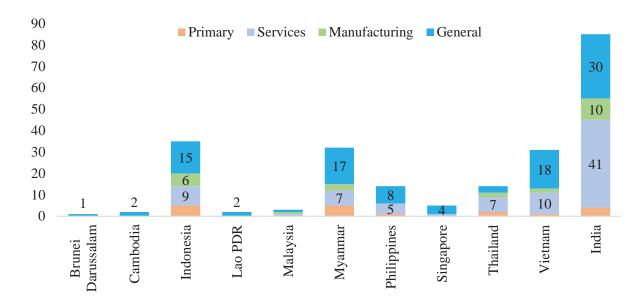


Figure 7: Number of Investment Policy Measures Taken by ASEAN and India

Source: UNCTAD Investment Policy Monitor.

Table 3: FDI Policy in ASEAN and India

			of FDI in Ind	Policies ia	Type of FDI Policies in ASEAN		
	Sector	Entry and Establishment	Treatment and Operation	Promotion and Facilitation	Entry and Establishment	Treatment and Operation	Promotion and Facilitation
ıry	Mining and quarrying	3	1		5	4	1
Primary	Agriculture, forestry and fishing	1			4	1	2
	Financial and insurance activities	14			14	1	2
	Construction	1	1		3	1	
	Wholesale and retail trade, Publishing, Audio Visual and broadcasting activities	10	4		3		1
s	Transportation and storage, Telecommunications, Computer programming, consultancy and related activities, Other professional, scientific and technical activities, Education, Human health activities, Other service activities	5	1		8		4
Services	Wholesale and retail trade, financial and insurance activities	3			1		1
Se	Electricity, gas, steam and air conditioning supply, Water supply, sewerage, waste management and remediation activities, Transportation and storage, Telecommunications, Education, Human health activities, Real estate activities, Wholesale and retail trade	1			1	1	1
	Other service activities include Real estate, Public administration and defence; compulsory social security, Legal and accounting activities	2			3	1	
Manufacturing	Food products, beverages and tobacco products, coke and refined petroleum products, chemicals and chemical products, computer, electronic and optical products, and electrical equipment, machinery and equipment, transport equipment, basic metals, computer and Other manufacturing,	3	1		6	4	6
Mai	Rubber and plastics products, and other non-metallic mineral products, Other manufacturing				1		
	Basic pharmaceutical products and pharmaceutical preparations	3	1		1		1
	General	23	5	4	35	19	37

Source: UNCTAD Investment Policy Monitor.

Similarly, some of the ASEAN countries have continued their efforts to facilitate FDI by simplifying processes and using information communications technology to reduce red tape. For example, the Indonesian Investment Coordination Board (IICB) has simplified the process for obtaining investment licences and made the procedures to obtain tax privileges easier. Singapore has introduced "online single submission" to complete registration more easily for the investors. Similarly, the Philippines has launched a business data bank to renew permits in a shorter time for the investors. Thailand has issued a regulation exempting certain business activities from the requirement for obtaining a foreign business licence.

Table 4: Double Taxation Avoidance Agreement between India and ASEAN

Country	Date of Implementation (in force)		
India-Brunei	30th January 2020		
India-Indonesia	5th February 2016		
India-Malaysia	26th December 2012		
India-Myanmar	1st April 2010		
India-The Philippines	21st March 1994		
India-Singapore	27th May 1994		
India-Singapore	1st October 2019		
India-Thailand	13th October 2015		
India-Vietnam	2nd February 1995		

Source: Income Tax Department, Government of India.

Besides, globally there is also an attempt to improve the investment facilitation. India has also proposed an "Agreement on Trade Facilitation in Services" in WTO. As FDI is a mode of the delivery of a service, such an agreement could become a stepping-stone for multilateral efforts towards investment facilitation.²² Besides, the Asia-Pacific Trade Agreement (APTA) members have started negotiations in 2018 to promote and facilitate FDI among the member countries, based on the implementation of the Framework Agreement on Promotion, Protection and Liberalisation of Investment.²³

ASEAN and India must aim to simplify and streamline the investment regimes and processes. Both ASEAN and India shall encourage and foster institutional cooperation and coordination through a single-window system of facilitating investment promotion. This would create an attractive investment environment, avoid delay in the investment process at different levels of government and lower the cost of doing business, especially for MSMEs. Besides, countries should also regulate and monitor the FDI in the specific sector to safeguard the domestic investor and prevention of exploitation of the environment, particularly in the developing countries.

6. Removing the Barriers to Investment and Business Environment

ASEAN and India have been trying to improve their regulatory regime for investors to start a business at par with developed countries. ASEAN and India have shown significant progress in improving the overall rank of *Ease of Doing Business*²⁴ (Figure 8). South Korea has been maintaining its EDB rank since 2015, whereas, China has significantly improved its rank from 90th in 2015 to 31st in 2020. Among the Southeast Asian countries, Indonesia, Brunei and Vietnam have improved their global ranks, compared to the previous year. On the other hand, Brunei and Indonesia have significantly improved their EDB ranks to 66th and 73rd position in 2020, respectively. India's rank has moved up to 63rd in 2020 from 77th in

2019. In terms of Starting a Business, some of the Southeast Asian countries have ranked 80th and above. India has taken several regulatory measures to make it easier to do business in India, particularly by reducing the number of procedures and time taken to start a business. In India, early approval of electricity connection for a business and other reform measures has created a business-friendly environment for both domestic and foreign enterprises.

■ EDB: Overall (2015) ■ EDB: Overall (2020) ● EDB: Starting a Business (2020) 200 180 160 140 120 100 80 60 40 20 0 Brunei Darussalam India Singapore Malaysia Vietnam Indonesia Philippines. Cambodia Lao PDR Myanmar Thailand

Figure 8: Ease of Doing Business Rank of ASEAN and India

Source: World Development Indicators, The World Bank.

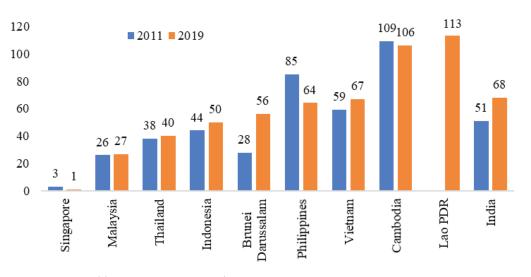


Figure 9: Global Competitiveness Index Ranking of ASEAN and India

Source: World Economic Forum Database.

With the initiative like 'Make in India for the World', India is committed to improve the business environment. It goes without saying that regional investment cooperation in ASEAN and India pave the way for further improvement the transparency and predictability of investment rules, regulations and procedures that would be conducive to attract FDI. For instance, though there is wide variation in the ranking across ASEAN and India, countries have gradually improved their index in 2020, compared to 2011. India has improved the Global Competitiveness Index (GCI)²⁵ consecutively in a row to reach 68 in 2020 from 51 in 2011 (Figure 9).

The overall improvement in market efficiency, business sophistication, innovation, monetary and fiscal policy measures has made India's position attractive in GCI. Similarly, Cambodia has moved up in GCI to 106 in 2019 from 109 in 2010, followed by the Philippines, which has moved up to 64 positions in 2019 from 85 positions in 2010. This shows both ASEAN and India's investment policies towards creating a conducive business environment to attract global investment.

7. Regional Investment Policy Framework

Bilateral Investment Treaties (BITs) are likely to make an indirect contribution to sustainable development by promoting FDI. A successful BIT would eliminate market access restrictions and given a better opportunity to invest in and penetrate markets in the host country. Besides, BITs also aim to remove high barriers in the host country, allowing foreign country companies to invest and expand both in a host and home country. Several studies find a positive effect of BITs on FDI.²⁶ The major features of BIT are applicability (i.e. BITs apply to existing and future investments till the date on which India entered into the BIT), fair and equitable treatment and full protection and security, national treatment and most-favoured nation treatment, expropriation, dispute settlement mechanisms, both between states and between an investor and a state. Many BIT partners approach these treaties with the dual purpose of protecting their outward investments in and attracting inward investment from, their co-signatories.

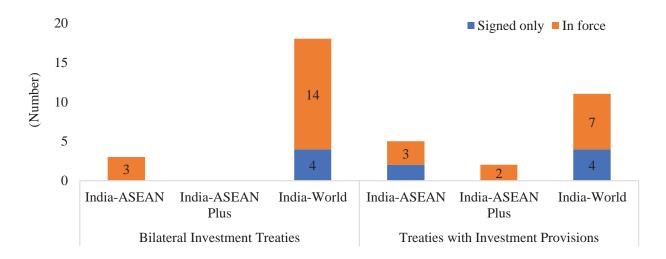


Figure 10: India's BITs and TIPs with ASEAN (till January 2020)

Source: UNCTAD Investment Policy Hub

Figure 10 shows that out of 14 India's BITs with the world, about three BITs are with ASEAN countries (Brunei Darussalam, Myanmar and the Philippines), whereas, in case of TIPs, about half of India's TIPs are with ASEAN countries. Overall, except Cambodia and Singapore, India has both BITs and TIPs with ASEAN countries. Next to China, India has signed BITs and TIPs with both ASEAN and ASEAN plus countries (see Table 5). In fact, out of total BITs and TIPs with the world, most of the BITs are signed between Southeast Asia, South Asia and East Asian countries, compared to other sub-regions (Figure 11).²⁷ There is a scope of convergence in investment agreements among ASEAN and ASEAN plus countries. ASEAN and ASEAN plus countries should aim for a regional investment policy framework to facilitate regional coordination and exploit economies of scale in improving investment frameworks and policies across the region, similar to ACIA (see Box 1). It may also provide a mechanism for knowledge-sharing and policy dialogue around good practices, and coordinate with other international bodies such as G20 or the EU in dealing with regional and global investment challenges.

Box 1: ASEAN Comprehensive Investment Agreement (ACIA)

To boost investment in ASEAN, member states have concluded two investment agreements: one for investment protection and the other for investment liberalisations. The ASEAN Investment Guarantee Agreement (IGA), introduced in 1987, covers protection against expropriation, guaranteeing repatriation of capitals and profits. It provides for arbitration as dispute settlement mechanism between investors and states. The IGA was subsequently amended in 1996 to include more modern provisions, i.e. simplification of investment procedures and approval process, transparency and predictability, as well as provisions on accession of new members. In 1998, the Framework Agreement on the ASEAN Investment Area (AIA) was signed with the objective of facilitation, promotion and liberalisation. ASEAN allows the free flow of investments. The AIA agreement was amended in 2001. The most significant initiative of the AIA was the introduction of the concept of "ASEAN investor" and the preferential treatment afforded to ASEAN investors for a fixed period of time. The AIA did not provide for arbitration. However, it has included Temporary Exclusion List and Sensitive List.

The ASEAN Comprehensive Investment Agreement (ACIA) was signed in February 2009 and amended in 2014. The objective of ACIA is to create a free and open investment regime in ASEAN, through the followings: (1) enhanced protection for investors of all member states and their investments, (2) facilitation and cooperation to create favourable conditions for investment, (3) joint promotion of the region as an integrated investment area, and (4) progressive liberalisation. The ACIA has made improvement of transparency and predictability of investment rules, regulations and procedures conducive to increased investment among member states. It has also included comprehensive provisions on Investor-State Dispute Settlement (ISDS). ACIC has reservation list for five sectors, namely, manufacturing, agriculture, fishery, forestry, mining and quarrying, and services incidental to those five sectors.

Source: Authors' own based on various secondary sources.

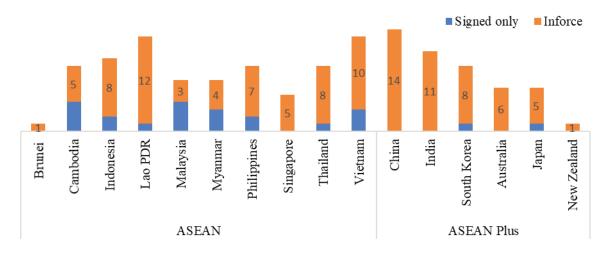
Table 5: Bilateral and Multilateral Investment Agreement among ASEAN and ASEAN Plus Countries

			ASEAN										ASEA	AN P	lus		
	Country	Brunei	Cambodia	Indonesia	Lao PDR	Malaysia	Myanmar	The Philippines	Singapore	Thailand	Vietnam	India	Australia	China	Japan	New Zealand	South Korea
	Brunei											**					
	Cambodia			*	**	*		*	**	**	*			**	**		
	Indonesia		*		**	*			**	**	**	**	**	**			**
	Lao PDR		**	**		**	**	*	**	**	**	**	**	**	**		**
[A]	Malaysia		*	*	**						*	**		**			*
ASEAN	Myanmar				**			**		*	*	**		**	*		
	The Philippines		*		*		**			**	**	**	**	**			**
	Singapore		**	**	**						**			**			
	Thailand		**	**	**		*	**			**	**		**			**
	Vietnam		*	**	**	*	*	**	**	**		**	**	**	**		**
	India	**		**	**	**	**	**		**	**		**	**			**
lus	Australia			**	**			**			**	**		**			
	China		**	**	**	**	**	**	**	**	**	**	**		**	**	**
ASEAN Plus	Japan		**		**		*				**			**			**
AS	New Zealand													**			
	South Korea			**	**	*		**		**	**	**		**	**		

Notes: * In force; ** Signed only.

Source: UNCTAD Investment Policy Hub.

Figure 11: Bilateral and Multilateral Investment Agreement among ASEAN and ASEAN Plus Countries



Source: UNCTAD Investment Policy Hub.

Both ASEAN and India have multiple international investment agreements, which show overlapping or duplicated commitments for countries that are party to various international investment agreements. ASEAN-India Trade in Services and Investment Agreement (AITSIA) was signed in November 2014, which would help to promote investment relations between ASEAN and India (see Box 2). Besides, investment agreement would help to lessen the investment costs in terms of differences in the investment regimes and other geographical costs factors, improve legal regimes and mechanisms to enhance investor protection, coordinate effective regimes for tax incentives for investment and facilitate long-term investments in infrastructure development. This would benefit the CLMV countries in the region to access technology and know-how while fostering multinational enterprises (MNEs) with local firms through backward and forward linkages within the region for active participation in global and regional value chains.

Box 2: ASEAN-India Trade in Services and Investment Agreement

The ASEAN-India Trade in Services and Investment Agreement (AITISA) was signed in November 2014 at the sidelines of the 25th ASEAN Summit in Nay Pyi Taw, Myanmar, under the Framework Agreement on Comprehensive Economic Cooperation between ASEAN and India, which was signed in October 2003. The agreement entered into force on 1st July 2015 for six ASEAN Member States, namely Brunei Darussalam, Malaysia, Myanmar, Singapore, Thailand, and Vietnam, as well as India. The agreement has also entered into force for Lao PDR and the Philippines on 15 September 2015 and 6 December 2016, respectively. India has one Schedule of Commitments (SOC) with 8 ASEAN Member States and a separate SOC for Indonesia and the Philippines. AITISA was notified to the WTO on 20th August 2015 under GATS Article V:7(a).

The Agreement is composed of four parts and 34 Articles. Under the Agreement, the ASEAN Member States and India have agreed to open their respective markets by progressively reducing and eliminating duties on 76.4 per cent coverage of good. The agreement contains provisions on transparency, domestic regulations, recognition, market access, national treatment, and dispute settlement. The agreement is similar in structure to GATS and the GATS Annexes on movement of natural persons supplying services, air transport services, financial services and telecommunication also apply. In addition, GATS like positive list approach has been adopted which provides compensatory adjustments in case of withdrawal or modification of commitments. CLMV countries enjoy special and differential treatment and flexibility under the agreement. ASEAN and India have also signed ASEAN-India Investment Agreement (AIIA) and entered into force with seven ASEAN member states excluding Cambodia, Indonesia and Lao PDR. The Investment Agreement stipulates protection of investment to ensure fair and equitable treatment for investors, non-discriminatory treatment in expropriation or nationalisation as well as fair compensation.

Source: Authors' own based on secondary sources.

8. Policy Implications

Undoubtedly, there is high potential of FDI flows between India and ASEAN. The presence of Indian investment in ASEAN and ASEAN investment in India is more visible in the sectors like automobile, oil and natural gas extractions, health care, ITeS, telecommunication, logistics, food processing, financial services, educational sectors, media, etc. India's both inward and outward FDI with ASEAN are actively engaged through Joint Ventures (JV) and wholly-owned subsidiaries (WoS) routes across all the sectors such as agriculture and allied, energy (oil and gas exploration), automobiles, textiles, telecommunication, construction and infrastructure development, education, information technology, etc. With recent initiative such as 'Make in India for the world' as part of *Aatmanirbhar Bharat Abhiyan*, India is committed to attract foreign investment and provide a business-friendly environment. Both ASEAN and India

have also committed to improve the ease of doing business. Besides opportunities in strengthening investment relations, ASEAN and India should offer further scope to enhance FDI flows. Some specific policy recommendations are suggested as follows:

Initiate Business Facilitation Measures

There is an untapped opportunity for cross-border business collaboration. The pandemic has opened an avenue of new investment opportunities in the sectors like e-learning, e-commerce, tele-medicine, healthcare, food processing, and other ITeS. There are opportunities for business collaboration between ASEAN and India, for which emphasis should be given to Start-ups, which are having local business partners for business development and local sourcing. The governments and industry associations have to coordinate each other to promote investment, competitiveness and knowledge-sharing in the emerging areas as ASEAN-India business facilitation measures.

Create Opportunities for Regional Investment Promotion

ASEAN Economic Community (AEC) aims to facilitate intra-regional trade and investment flows and drive towards deeper levels of integration. AEC provides a harmonised custom system to enhance the potential of integrated supply chains across the region. Regional value chains in ASEAN countries offer opportunities for Indian investors to invest in manufacturing, R&D, sales and services across the region. Economic integration between India and ASEAN would help to increase the intra-regional FDI flows as well as overall FDI flows to and from the region.

Skill Development

India may consider to promote an integrated framework for skill enhancement in a diverse set of sectors, particularly to the CLMV countries, in which they are facing shortages in skilled manpower. This would also ensure the specific need of high-skilled workforce for a competitive export sector, particularly meeting the challenges to upgrade the technology, increase in productivity and move up with the other emerging developing countries. There is a special need to support capacity building programmes, technical trainings, language proficiency to develop a skilled workforce that can cater to the requirements of foreign investors to meet the business needs.

Promote Micro, Small and Medium Enterprises (MSMEs)

MSMEs significantly contribute to the industrial and economic growth of developing countries. In view of the increasing role of global and regional value chains and production restructuring in Asian countries amidst Covid-19, MSMEs play a strong role in forward and backward linkages with foreign or domestic firms for the production of parts and components. MSMEs engage in vertical linkages, directly or indirectly with foreign companies, to produce goods and trade. Unlike large enterprises, MSMEs face huge challenges in improving productivity due to lack of financial resources and human skills. ASEAN and India should enhance the entrepreneurship, provide financial access, and support B2B forums for MSMEs to explore business relationships.

Atmanirbhar Bharat (Self-Reliant India)

Indian Prime Minister has shared the vision of 'Atmanirbhar Bharat' or the 'Self-Reliant India' Mission, which aims towards cutting down import dependence by focussing on substitution while improving safety compliance and quality goods to gain global market share. The Atmanirbhar Bharat does not signify any exclusionary or isolationist strategies, but involves the creation of a helping hand to the whole world. It offers investment opportunities to ASEAN. The Mission focuses on the importance of promoting "local" products. The Mission is also expected to complement 'Make in India' initiative, which intends to encourage manufacturing in India. The Mission will be carried out in two phases, on phase

1 to consider sectors like medical textiles, electronics, plastics and toys, where local manufacturing and exports can be promoted. In phase 2, it will consider products like gems and jewellery, pharma and steel, etc. Atmanirbhar Bharat focuses on five pillars: economy, infrastructure, system, vibrant demography, and demand, respectively.

9. Concluding Remarks

India's steady rise in FDI inflows and outflows with ASEAN and other countries in the region highlights potential investment opportunities in the country. To further strengthen the investment linkages, ASEAN and India may come up with cooperative and collaborative mechanisms in the digital economy and pharmaceutical sectors to gain from comparative efficiency in the new export areas, such as education, tele-medicine, healthcare, medical tourism, entertainment, etc. Besides, the pandemic has potentially altered the trade and investment paradigm by disrupting supply chains and trade. India and ASEAN have the potential to take advantage of the new value chain opportunities by making way for a new sustainable supply chain in the region. ASEAN and India should cooperate towards designing appropriate policies, simplifying investment regimes and streamlining investment processes to further strengthen the value chain and investment linkages. Both ASEAN and India can attract FDI in the new export areas if we show the potential and comparative advantage with the rest of the world.

Endnotes

- 1. Refer, for example, Agrawal and Kumarasamy (2017), Kumarasamy (2010), Bhat and Kumarasamy (2006).
- 2. Refer, for example, UNESCAP (2019)
- 3. Refer, for example, UN (2018).
- 4. Refer, for example, Kumarasamy and De (2019).
- 5. Daly et al. (2020).
- 6. Refer, Appendix 4 for major sector wise Indian firms invested in ASEAN countries.
- 7. Refer, Appendix 5 for major sector wise Indian firms received investment from the ASEAN countries.
- 8. To name a few, Amity Global Varsity Pvt. Ltd.; Annapoorani Educational and Medical Services Pvt Ltd; Beacon Higher Education Services Pvt Ltd; Indian Public School Private Limited; Manipal Global Education Services Private Limited; Manipal Universal Learning Pvt. Ltd. etc.,
- Such as Pearson (Singapore) Pte Ltd, Educomp Higher Initiatives Pte Ltd, Educomp Higher Initiatives Pte Ltd, Ebix E-Learning Ventures Pte Ltd, Rec India (Bvi) Ltd, Apollo Global Singapore Holdings Pte Ltd.
- 10. Refer, AHK (2020).
- For instance, Manipal Health Enterprises Pvt Ltd; Manipal Acunova Ltd; Kaya Limited; Universal Medicare Private Ltd; Vasan Health Care Private Limited; Jubilant Life Sciences Ltd; Western Hospitals Corporation Private Limited; Hoe Wellness Pvt Ltd; Apollo Hospitals, Aurobindo Pharma Ltd.; Medichem Life Sciences Private Limited; Health vista India Private Limited etc. have invested in Singapore, Malaysia, Indonesia and Thailand. Similarly, foreign firms such as Fortis Global Healthcare Infrastructure, Imperius Healthcare Investments Pte Ltd, Tpg Asia Vi Sf Pte Ltd, Northern Tk Venture Pte. Ltd., Asian Development Bank, Infrahealth Pte Ltd, Aetna Global Benefits (Singapore) Pte Lt, Conven Investment Holdings Pte. Ltd, Lathe Investment Pvt Ltd, from Singapore, Malaysia and The Philippines have invested in India.
- Indian firms have already invested in Singapore, Malaysia, Cambodia, The Philippines, Myanmar (Amira Foods (India) Ltd.; Bikanerwala Foods Private Ltd.; Food Fats & Fertilisers Ltd.; Green Khmer Agro Private Ltd.; Madhav Biscuits Private Limited; Quilon Foods Pvt. Ltd; Rei Agro Limited; Tata Coffee Ltd; Uttara Foods & Feeds Pvt. Ltd.; Vibha Agrotech Ltd..
- 13. Refer, for example, Kumarasamy and De (2020)

- 14. Refer, for example, ASEAN Secretariat (2017).
- 15. Such as Thailand, Indonesia, Singapore (Bajaj Auto Ltd.; Craftsman Automation P Ltd.; IFB Automotive Pvt Ltd.; IFB Industries Limited; Masibus Automation And Instrumentation (P) Ltd.; Tata Motors Ltd.; TVS Motor Company Ltd.
- 16. Refer, Singh (2020).
- 17. Refer, FICCI (2019).
- 18. DTAA helps the taxpayers to avoid being taxed twice for the same income when a tax-payer resides in one country and earns income in another. Such relief is provided by exempting income earned abroad from tax in the resident country or providing credit to the extent taxes have already been paid abroad. DTAAs also provide for concessional rates of tax in some cases.
- 19. Refer, for example, Sundaryani and Singgih (2017) and KPMG (2018).
- 20. Refer, for example, Caraballo (2017).
- 21. Refer, for example, Baker McKenzie (2017).
- 22 Ibid
- 23. See, for more details, UNESCAP (2018).
- Ease of doing business is one of the important factors to attract FDI. Foreign investors closely look at the country's performance in Ease of Doing Business (EDB), reported by the World Bank. Business decisions of foreign investors depend on countries' performance in quality of business environment, investment climate at the border level, quality of law and regulations, availability of resources such as land, credit, electricity, etc., and labour market regulations, protection and dispute settlements for the investors.
- ^{25.} GCI helps to understand the effectiveness of government's policy towards improving performance and increasing productivity of an economy. GCI covers three broad parameters: (i) restoring basic requirement such as institution, infrastructure, macroeconomic environment and health and primary education; (ii) enhancing efficiency through higher education and training, market and labour efficiency, financial sector development and market size; and (iii) enduring innovation and sophistication factors.
- 26. Refer, for example, Vis-Dunbar and Henrique (2009) and UNCTAD (2009).
- 27. Refer, for example, Kumarasamy and De (2019).
- 28. Refer, Kumarasamy and De (2019).

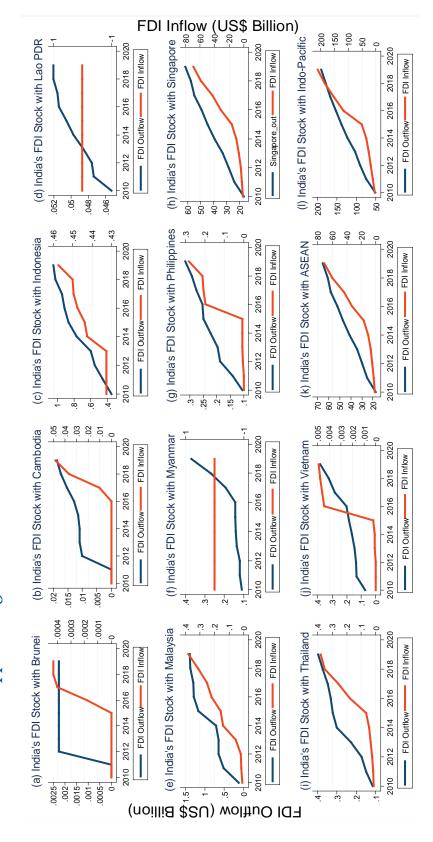
References

- Agrawal, P. and Kumarasamy, D. 2017. Impact of Foreign Capital Flows in Emerging Asia. Chapter 8 in Agrawal, P. (ed) *Reviving Economic Growth in India*. London: Cambridge University Press, pp.209-229.
- AHK. 2020. Indonesia's healthcare industry set to grow. EKONID Insight. Available at: https://indonesian.ahk.de/en/infocenter/news/news-details/indonesias-healthcare-industry-set-to-grow#:~:text=Local%20 healthcare%20app%2C%20Alodokter%2C%20recorded,19%20diagnostics%20in%20remote%20areas.
- ASEAN Secretariat. 2017. ASEAN Investment Report 2017: Foreign Direct Investment and Economic Zones in ASEAN, Jakarta.
- Baker McKenzie. 2017. Restrictions eased for foreign investors in certain businesses. 14 June. Available at: www.bakermckenzie.com/en/insight/publications/2017/06/restrictions-eased-for-foreign-investors.
- Bhat, K. S. and Kumarasamy, D. 2006. Foreign Direct Investment and Foreign Trade in India: What Causes What?. The Indian Journal of Economics. 87(345). pp. 237-251.
- Caraballo, M. U. 2017. Govt launches PH business databank. *Manila Times*, 5 December. Available at: www.manilatimes.net/govt-launches-ph-business-databank/366797/
- Daly, E., Das, K. and Yeoh, R. 2020. Reimagining emerging ASEAN in the wake of COVID-19. McKinsey & Company, September 2, 2020. Available at https://www.mckinsey.com/featured-insights/asia-pacific/reimagining-emerging-asean-in-the-wake-of-covid-19#

- FICCI. 2019. Speech by Mr. C R Chaudhary, Minister of State for Commerce and Industry at Fourth India-ASEAN Expo and Summit 2019 (February), organized by Federation of Indian Chambers of Commerce & Industry.
- KPMG. 2018. Revised tax holiday regulations more attractive for potential investors. 23 May. Available at: https://home.kpmg.com/id/en/home/insights/2018/05/id-tnf-may-2018-revised-tax-holiday-regulations.html.
- Kumarasamy, D. 2010. Foreign Direct Investment, Export and Economic Growth in India: An application of ARDL model. *Asian African Journal of Economics and Econometrics*, 10(2). pp. 245-259.
- Kumarasamy, D. and De, P. 2019. Promoting Foreign Direct Investment in the Indo-Pacific Region: Scope and Opportunities. *India Quarterly*, 75 (4), 490-509
- Singh, G. 2020. The Japanese plan for strategic investment in India, The Observer Research Foundation (ORF). Available at https://www.orfonline.org/expert-speak/japanese-plan-strategic-investment-india/
- Sundaryani, F. S., and Singgih, V.P. 2017. Speedy licensing pushed for energy. *Jakarta Post*, 31 January. Available at: www.thejakartapost.com/news/2017/01/31/speedy-licensing-pushed-energy.html
- UN. 2018. World Economic Situation and Prospects, 2018, New York. Available at: https://www.un.org/development/desa/dpad/wp-content/uploads/sites/45/publication/WESP2018_Full_Web-1.pdf
- UNCTAD. 2009. World Investment Report, United Nations, New York.
- 2020. World Investment Report, United Nations, New York.
- UNESCAP. 2018. Asia-Pacific Trade and Investment Report, 2018. United Nations Economic and Social Commission for Asia and the Pacific. Bangkok, https://www.unescap.org/publications/asia-pacific-trade-and-investment-report-2018
- UNESCAP. 2019. Asia-Pacific Trade and Investment Trends: Foreign Direct Investment Trends and Outlook in Asia and the Pacific. United Nations Economic and Social Commission for Asia and the Pacific. Bangkok. Available at: https://www.unescap.org/sites/default/files/Foreign%20Direct%20Investment%20Trends%20and%20Outlook%20in%20Asia%20and%20the%20Pacific%20%282019-12-04%29.pdf
- Vis-Dunbar, D. and Nikiema, H. S. 2009. Do Bilateral Investment Treaties Lead to More Foreign Investment? Investment Treaty News, 30 April, International Institute for Sustainable Development, Winnipeg, Manitoba, Canada.

Appendix 1

Appendix Figure 1: India's FDI Stock with ASEAN and Indo-Pacific Countries



Source: Authors' own based on Reserve Bank of India (RBI) Database and SIA, FIPB.

Appendix 2

Appendix Table 1: Sector-wise India's FDI Outward Stock to ASEAN and Its Share in the World (2008- 2019)

	lam										Secto	or-wise
Sector	Sector Prunei Darussalam	Cambodia	Indonesia	Lao PDR	Malaysia	Myanmar	The Philippines	Singapore	Thailand	Vietnam	India's Total Outward FDI to ASEAN	Share of Total Outward FDI to ASEAN in the World
			(US\$ Billion)	(%)								
Agriculture and Mining	1	7.52	307	14.24	5.63	71.56	10.03	11620	0.19	10.33	12.05	54
Manufacturing	2.25	10.1	346	0.51	1172.6	288.7	17.31	11426	338.66	315.97	13.92	79
Finance, Insurance and Business Services	-	0.01	11	-	154.27	0.43	231.1	14290	16.91	0.46	14.70	52
Wholesale, Retail, Restaurants and Hotel	-	0.95	185.23	-	8.32	0.08	9.41	5819.1	118.25	1.05	6.14	26
Construction	-	-	156.63	0.03	38.57	5.8	14.3	1338.7	0.79	50.07	1.60	8
Community, Social and Personal Services	-	0.01	0.66	-	80.23	0.55	-	1016.2	1.41	2.19	1.10	4
Electricity, Gas and Water	1	-	5.89	-	-	-	-	613.05		1	0.62	3
Transport, Storage and Communication Services	-	0.22	33.94	-	3.43	1.73	1.59	19522	2.01	0.23	19.57	70
Miscellaneous	-		0.49		0.58		0.2	584.39	-	-	0.59	2

Source: Reserve Bank of India.

Appendix 3

Appendix Table 2: Sector-wise India's FDI Inward Stock from ASEAN and Its Share in the World (2008- 2019)

	E								Sector-	wise
Sector	Brunei Darussalam	Cambodia	Indonesia	Malaysia	The Philippines	Singapore	Thailand	Vietnam	India's Total Inward FDI from ASEAN	Share of Total Outward FDI to ASEAN in the World
			(US\$ Billion)	(%)						
Agriculture and Mining	-	-	9.12	10.98	-	1344.26	1.13	-	1.37	15
Manufacturing	-	-	31.22	1112.45	96.7	48980.66	891.66	99.13	51.21	22
Finance, Insurance and Business Services	-	0.21	528.62	11	13.29	26522.94	21.69	-	27.10	35
Wholesale, Retail, Restaurants and Hotel	-	-	1	102.69	0.39	6232.7	38.41	10	6.39	32
Construction	-	-	3.64	2.73	0	3733.01	0.2	-	3.74	14
Community, Social and Personal Services	-	-	-	80.04	2.99	6233.03	16.49	-	6.33	13
Electricity, Gas and Water	99.03	99.03	-	-	281.25	-	1316.79	463.8	2.26	23
Transport, Storage and Communication Services	-	-	0.01	16.49	0.46	5015.49	8.39	-	5.04	18
Miscellaneous	-	-	-	2.56	-	549.51	-	-	0.55	24

Source: FIPB, Department of Commerce, MoCI.

Appendix 4

Appendix Table 3: Selected Indian Firms Invested in ASEAN Countries

India Firm	Foreign Firm	Sector	Country	FDI Outflow (US\$ Million)
Bharti Airtel Limited	Bharati Airtel Singapore P Ltd	Telecommunication	Singapore	7229.79
Tata Motors Ltd.	TML Holding Pte Ltd; Tata Motors Thailand Ltd; Tata Precision Industries Ltd., P.T. Tat Motors Indonesia	Automobile	Singapore, Thailand, Indonesia,	4895.55
Tata Communications Limited	Tata Communications International Pte Ltd; Vsnl International Pte.Ltd.	Telecommunication	Singapore	4092.2
Videsh Sanchar Nigam Ltd. (VSNL)	VSNL Sno Spv[Pte] Ltd	Telecommunication	Singapore	2476.98
Reliance Communications Ltd	Gateway Net Rading Ptd Limited	Telecommunication	Singapore	2470.12
Edeweiss Financialservices Ltd	Edelweiss Capital Singapore Pte Ltd	Financial Services	Singapore	335.44
Transport Corporation Of India Ltd	Tci Global Pvt Ltd And Tci Express Pvt Ltd	Logistic Services	Singapore	239.32
Reliance Ports and Terminals Ltd	Reliance Global and Holdings Pte Ltd	Logistic Services	Singapore	237.95
Manipal Health Enterprises Pvt Ltd	Manipal Health Enterprises International Pvt Ltd; Manipal Health Systems Malaysia	Health Care	Singapore and Malaysia	123.69
Reliance Big Entertainment Pvt. Ltd.	Reliance Big Entertainment (Singapore) Pte. Ltd.	Media	Singapore	105.1
Reliance Jio Infocomm Limited	Reliance Jio Infocomm Pte Ltd; Asia Africa Europe-1 (Aae-1) Submarine Cable System; Bbg Submarine Cable System	Telecommunication	Singapore	81.14
Cox & Kings Limited	Cox And Kings Global Services Singapore Pte Ltd; Cox And Kings Destinations Management Services Pvt Ltd; Cox & Kings (Australia) Pty Ltd	Tourism	Singapore And Indonesia	76.86
HCL Infosystems	HCL Infosystems Pte Ltd.	ITeS	Singapore	57.68
Kaya Limited	KML HIdings Pte Ltd	Health Care	Singapore	50.41
Manipal Global Education Services Private Limited	Manipal Education Malaysia	Education	Malaysia	49.72
India Infoline Ltd	IIFL Private Wealth (Mauritius) Ltd	ITeS	Singapore	43.38

Appendix 4 continued...

Tenshi Life Sciences Pvt Ltd	Gms Tenshi Holdings Pte Ltd;	Pharmaceuticals	Singapore	36,92
	Tenshi Life Sciences Pte Limited	1 Harmaceuticais	omgapore	30.72
Manipal Universal Learning P Ltd	Manipal Education Malaysia	Education	Malaysia	27
Universal Medicare Private Ltd	Geltec Pte Ltd	Health Care	Singapore	23.53
Tvs Motor Company Ltd	Pt.Tvs Motor Company, Indonesia; Tvs Motor (Singapore) Pte Ltd; Tvs Motor Company Pte Ltd.	Automobile	Indonesia; Singapore	21
Tata Coffee Ltd	Tata Coffee Vietnam Company Limited	Food Processing	Vietnam	19.32
T V S Logistics Services Ltd.	Tvs-Asianics Supply Chain Solutions Pte Ltd	Logistic Services	Singapore	15.83
HCL Services Limited	HCL Insys Pte. Ltd.,	ITeS	Singapore	10
Infosys Bpo Ltd	Infosys Bpo (Thailand) Ltd	ITeS	Thailand	6.9
Vasan Health Care Private Limited	Vasan Healthcare International Pte Ltd	Health Care	Singapore	6.54
Uttara Foods & Feeds Pvt. Ltd.	Venky's (Vietnam) Co. Ltd.	Food Processing	Vietnam	5.22
Natco Pharma Ltd.	Natco Pharma Asia Pte Ltd	Pharmaceuticals	Singapore, The Philippines, Malaysia	4.69
Aurobindo Pharma Ltd.	Apl Pharma Thai Ltd. Bangkok	Pharmaceuticals	Thailand	3.196
Bennett Broadcasting And Distribution Services Ltd	Times Box Tv Media Pte Ltd	Media	Singapore	3.15
Green Khmer Agro Private Ltd.	Green Agri Khmer Private Co Ltd	Food Processing	Cambodia	0.49
Indian Public School Private Limited	Tips Educate Malaysia	Education	Malaysia	0.25
Healthvista India Private Limited	Portea Medical	Health Care	Malaysia	0.25
Madison Communication P Ltd	Penada Co . Ltd	Media	Thailand	0.24
Madhav Biscuits Private Limited	Atlantic Food Products Co Ltd	Food Processing	Thailand	0.1848
Manipal Acunova Ltd	Asia-Pacific Iatec Cro Co; Ltd.	Health Care	Thailand	0.11
Chembond Chemicals Limited	I Chembond Water Sdn Bhd	Pharmaceuticals	Malaysia	0.06
Tech Mahindra Ltd	Tech Mahindra (Thailand) Ltd	ITeS	Thailand	0.0335
Golden Sands Beach Hotel & Spa Private Limited	Universal Golden Sands Son Bhd	Hotel	Malaysia	0.01

Source: Reserve Bank of India.

Appendix 5

Appendix Table 4: Selected Indian Firms Received Investment in Service Sector from ASEAN Countries

India Firm	Foreign Firm	Sector	Country	FDI Inflow
Bharti Airtel Ltd	Three Pillars Singapore Pte Ltd	Telecommunication	Singapore	1844.22
Telenor(India) Comunications Pvt Ltd(Tel	Telenor South Asia Investment Pte Ltd	Telecommunication	Singapore	1103.95
Unitech Wireless Tamilnadu Pvtltd (Ear:	Telenor Asia Pte. Ltd.	Telecommunication	Singapore	687.69
Fortis Healthcare Limited	Northern Tk Venture Pte. Ltd.	Health Care	Singapore	565.52
Utv Software Communications Limited	The Walt Disney Company (Southeast Asia)	Telecommunication	Singapore	550.61
Viom Networks Limited	tworks Limited Atc Asia Pacific Pte Ltd Media		Singapore	458.64
Bharti Telecom Ltd.	Singtel International Investment Pvt Ltd	Telecommunication	Singapore	403.58
One 97 Communications Limited	Wormhole Technology (Singapore) Pvt Ltd, Gamnat Pte. Ltd, Alibaba.Com Singapore E- Commerce Private, Alipay Singapore E- Commerce Pte Ltd, K2 Global A-Series Pte Ltd	Telecommunication	Singapore	563.22
Manipal Health Enterprises Pvt. Ltd.	mperius Healthcare Investments Pte Ltd, Tpg Asia Vi Sf Pte Ltd	Health Care	Singapore	330.61
Fortis Hospotel Ltd	Fortis Global Healthcare Infrastructure	Health Care	Singapore	160.07
Myntra Designs Private Limited	Fk Myntra Holdings Private Limited	E-Commerce	Singapore	63.17
Amazon Online Distribution Services Priv	Amazon Asia Pacific Resources Private Li	E-Commerce	Singapore	53.39
Amazon It Services (India) Private Limit	Amazon Asia Pacific Holdings Private Lim	E-Commerce	Singapore	50.89
Vasan Health Care Pvt Ltd	Lathe Investment Pvt Ltd	Health Care	Singapore	45.07
Tata Sky Ltd	Omega Fii Investment Pte Ltd	Telecommunication	Singapore	35.96
Pearson India Education Services Pvt Ltd	Pearson (Singapore) Pte Ltd	Education	Singapore	35.1
Vedantu Innovations Private Limited	Internet Fund Iii Pte Ltd	Information Services	Singapore	37.34
India bulls Pharmaceuticals Ltd	Tamarind Capital Pte Ltd	Pharmaceutical	Singapore	24.13

Appendix 5 continued...

$Appendix\ 5\ continued...$

Ebix Software India Pvt Ltd	Ebix Singapore Pte Ltd	Information Services	Singapore	22.09
Health Care At Home India Pvt Ltd	Conven Investment Holdings Pte. Ltd	Health Care	Singapore	18.68
Nittsu Logistics (India) Pvt Ltd	Nippon Express (South Asia And Oceania)	Logistic Services	Singapore	18.66
Educomp Vocational Education Pvt Ltd	Educomp Higher Initiatives Pte Ltd	Education	Singapore	15.2
Medica Synergie Pvt Ltd	Orilus Investments Holdings Pte Ltd	Media	Singapore	14.54
Google India Digital Services Pvt Ltd.	Google Asia Pacific Pte Ltd.	E-Commerce	Singapore	13.29
Ebay India Pvt Ltd	Ebay Singapore Services Pte Ltd	E-Commerce	Singapore	11.75
Indian Health Organisation Pvt Ltd	Aetna Global Benefits (Singapore) Pte Lt	Health Care	Singapore	10.16
PVR Pictures Ltd	Major Cineplex Group Public Oc Ltd	Media	Thailand	9.27
India Education Services Pvt Ltd	Apollo Global Singapore Holdings Pte Ltd	Education	Singapore	7.04
Paytm E-Commerce Private Limited	Alipay Singapore E- Commerce Pte Ltd	E-Commerce	Singapore	4.02
Radiant Life Care Pvt Ltd (Ear: Ihhs)	Infrahealth Pte Ltd	Health Care	Singapore	3.44
Adt India Private Limited	Adt Biotech Sdn Bhd	Pharmaceutical	Malaysia	0.02
/bestinet india private limited	Bestiner sdn.bhd.	Information Services	Malaysia	0.98
Nuvo Logistics Private Limited	Beenext Pte Ltd	Logistic Services	Malaysia	1.96
Bluengreen Drugs & Surgicals Private Lim	Pardeep Bhalla	Pharmaceutical	The Philippines	0.02
Dcdc Health Services Private Limited	Asian Development Bank	Health care	The Philippines	3.16
Snapbizz Cloudtech Private Limited	Snapbizz Cloudtech Pte Ltd	Information Services	Singapore	7.93
India Education Services Pvt Ltd	Apollo Global Singapore Holdings Pte Ltd	Education	Singapore	7.04
Tata Sia Airline Limited	Singapore Airlines Ltd	Tourism	Singapore	4.06
Educomp Raffles Higher Education Ltd	Rec India (Bvi) Ltd	Education	Singapore	8.18

Source: FIPB, Department of Commerce, MoCI.

ASEAN-India Production Networks in Covid-19 Times

1. Introduction

The Global Value Chains (GVCs) promote economic integration, multilateral or otherwise. The rapid growth of parts and components trade is a natural consequence of liberalised trade, where a final good is the result of a production process that takes place in different locations. International fragmentation of production is mainly associated with the activities of Multinational Companies (MNCs)¹. This occurs when different stages of production take place in subsidiaries located in different countries, leading to promote intra-firm trade.² Studies such as Athukorola and Yamashita (2006) and Kimura *et al.* (2007) have looked at the case of Asia, where trade in intermediate goods has expanded more rapidly than conventional final-goods trade, as a result of the increasing fragmentation of production process due to low service-link and inter-country wage differentials.

Almost 70 per cent of MNCs are involved in the GVC activities and have contributed about 22 per cent of global output in 2019.³ In GVC, both trade and investment are well integrated, particularly through MNCs. In the Asia-Pacific region, the contribution of trade in GVCs has reached about 40 to 50 per cent in 2017.⁴ Therefore, production networks have become an important phenomenon in Southeast and East Asia.⁵ India has a limited number of products, where it leads in GVCs. India has gained competitiveness in GVCs in 35 products that could sell in 50 countries.⁶ To realize such potentials, India has taken initiatives to encourage GVCs. The 'Make in India' is such an initiative that encourages foreign investors to manufacture in India. In his Independence Day speech, Indian Prime Minister repositioned the 'Make in India' agenda as 'Make in India for the world'.⁷

The outbreak of Covid-19 has deeply disrupted the supply chain network that has affected the supply of intermediate inputs as well as final goods across the world. Most of the countries are majorly depending on other countries' inputs for their domestic exports since value chain integration and intra-industry trade account for more than half of Asia's trade. Therefore, the Covid-19 and subsequent measures have led to restrict the flow of goods and services between the countries. In general, value chain process engages in pre-production stages such as R&D, design and purchasing of raw materials, which are the value added to the production process, and further value additions come from the post-production activities such as distribution, marketing and services to reach the end consumers. The disruption of supply chains has affected the post-production activities (Figure 1).

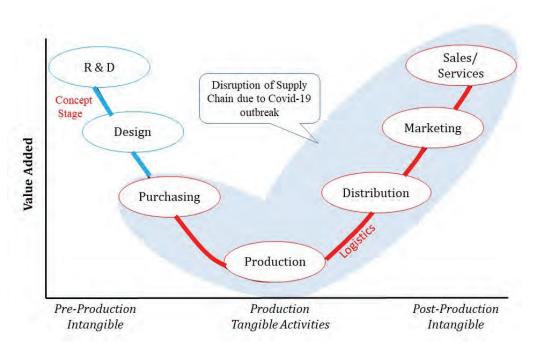


Figure 1: Covid-19 Effect on Supply Chain Disruption

Source: Authors' own illustration based on Baldwin, et. al. (2014).

Given above, this chapter discusses the impact of Covid-19 outbreak on ASEAN-India value chain integration and identifies the potential sectors for value chain linkages between ASEAN and India in the post-Covid-19. The chapter also addresses the barriers to value chain and investigates the impact of Covid-19 on different types of GVC participation in ASEAN and India. The rest of the chapter is organised as follows. Section 2 presents the trends of GVCs in ASEAN and India. Whereas the Section 3 discusses the value chain linkages between them. Section 4 discusses the impact of Covid-19 on GVCs. Section 5 analyses the impact of Covid-19 on different types of GVC participation in ASEAN and India. Section 6 highlights the potential sectors for value chain linkages between ASEAN and India. Barriers to value-chain trade are then discussed in Section 7. Recommendations for strengthening ASEAN-India value chain linkages are presented in Section 8. Finally, the conclusions are drawn in Section 9.

2. Trends in Global Value Chains in ASEAN and India

A country's integration into the global economy is often closely linked to its active participation in the GVCs, both in terms of upstream and downstream activities. Upstream and downstream links explain the participation of a country in GVCs through its exports, i.e. the use of foreign intermediaries in the exports (backward participation) or the use of respective country's domestic intermediaries in exports (forward participation), depending upon the level of integration and the stages of the integration process in an economy. For instance, the share of foreign intermediaries in ASEAN, ASEAN plus, East Asia and South Asian regions is in the range of 23 to 27 per cent in 2018, whereas, the share of domestic intermediates in other countries' export (i.e. forward participation) in these regions is relatively higher in the range of 27 to 37 per cent in 2018 (see Figure 2). The GVC participation of the Indo-Pacific is about 44 per cent, which is lower than the regional average of ASEAN, East Asia and South Asian countries. This shows that

Southeast Asia, East Asia, Pacific and South Asia have both strong backward and forward linkages in the GVCs, thereby having strong potential to strengthen the GVCs in the Indo-Pacific. That may eventually benefit other regions like Central Asia and Africa, which have at present relatively weaker backward and forward linkages but have potentials to become important import destinations of intermediates.

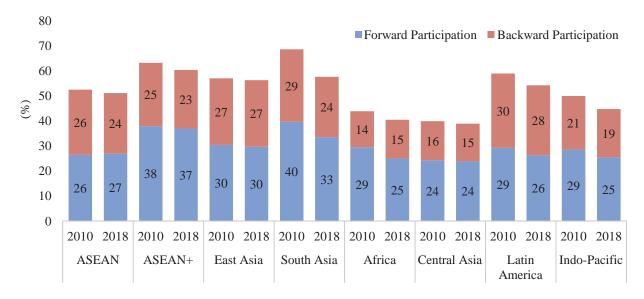


Figure 2: GVC Participation Index in Regional Groups

Note: *Estimates; Backward participation in GVCs is the foreign value-added embodied in exports as a share of total gross exports in per cent and Forward participation in GVCs is the domestic value-added embodied in foreign exports as a share of total gross exports in per cent. The regional group is based on the World Bank country classification. Indo-Pacific includes 44 countries across various regions.¹⁰

Source: Authors' calculation based on Casella et al. (2019) database on UNCTAD-Eora Global Value Chain Database.

Among the ASEAN countries, Singapore, Thailand and Malaysia have relatively higher backward participation, which shows that these countries are significant users of imported inputs in their exports to the world (Figure 3). These countries are having relatively higher participation in GVCs due to their ability to process and assemble efficiently. In particular, the logistic infrastructures, which are crucial for the production process, are effectively managed in these countries. On the other, Brunei, Indonesia, Malaysia, the Philippines and Vietnam are highly engaged in forward participation, thereby showing that these countries supply inputs to foreign partners which are then used in the production process of finished products. For instance, Malaysia and the Philippines have strong capacities in relatively less technology-intensive and fairly skill-intensive production of parts, components and accessories through the diverse use of raw materials, intermediates and final products at various stages of processing and further value addition. Both Brunei and Indonesia have rich resources to exports such as crude oil, coal and minerals, cocoa, which are critical for moving into GVCs. In ASEAN, countries like Cambodia, Lao PDR and Myanmar are less integrated in the GVCs. However, these countries are gradually picking up the production process with the supply of rich natural resources to the partner countries, which are critical for the GVCs. Vietnam's proximity to its regional suppliers of production inputs like China, Japan, South Korea and Singapore has facilitated the country's GVC participation in the electronics sector. 11

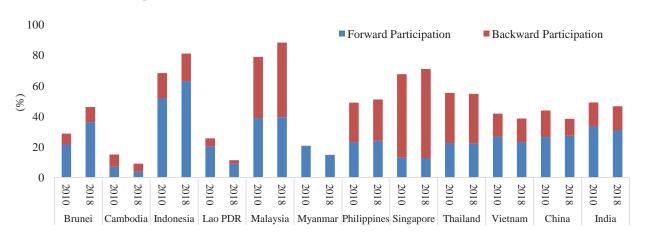


Figure 3: GVC Participation Index in Selected Countries

Note: *Estimates; Backward participation in GVCs is the foreign value-added embodied in exports as a share of total gross exports in per cent and Forward participation in GVCs is the domestic value-added embodied in foreign exports as a share of total gross exports in per cent.

Source: Authors' calculation based on Casella et al. (2019) database on UNCTAD-Eora Global Value Chain Database.

Both China and India are more engaged in forward participation than backward participation stage. China has deeply integrated in GVCs both through forward and backward linkages with ASEAN countries. China's diverse manufacturing base and large presence of MNCs in extensive assembling and processing of various high-tech and skilled-based products have created strong supply chain networks of procuring intermediate inputs from the Southeast and South Asian countries.¹²

India's GVC participation has been low, compared to China and other major Southeast Asian countries. India has production and market advantages in some of the industries such as automobile, textile, jewellery, pharmaceuticals and petroleum processing and still has huge potential in some of the industries which are well inter-dependent with the services sectors. India's comparative advantage in services sectors may facilitate further participation in GVCs. Similarly, India, Thailand, Indonesia, and the Philippines are having closer proximity in the regional value chains in automotive parts and components. Several automobile MNCs target these countries to set up a plant to produce final assembly product by using local content requirements and to easily target large market access such as India, Indonesia, the Philippines and China.¹³ India is the major exporter of small car segment and two-wheeler to the African countries.

3. Trends of P&C between ASEAN and India

India's exports of parts and components (P&C) have contributed almost 8 to 10 per cent of India's total exports to Thailand (13.9 per cent), Indonesia (11.6 per cent), Japan (10.1 per cent), the USA (8.7 per cent) and Singapore (8.5 per cent) in 2018 (see Table 1). Parts and components have also contributed almost 8.1 per cent (US\$ 2.13 billion) of India's export to ASEAN in 2018. In other words, about 10.8 per cent of India's exports of P&C go to ASEAN with respect to India's exports of P&C to the world in 2018. In case of India's imports of P&C, India has imported majorly from the USA (25.2 per cent), Japan (22.9 per cent), South Korea (19.2 per cent), China (17.2 per cent), and Thailand (18.4 per cent), Vietnam (14.3 per cent), Malaysia (7.5 per cent), Singapore (7.2 per cent) from the ASEAN countries in 2018. India's imports of P&C from ASEAN were about 7.4 per cent in 2019. Overall, India's P&C exports to and imports from ASEAN are close to 10 per cent of India's total P&C exports to and imports from the world. This shows that India is getting more engaged in production networks with ASEAN countries in both export and import of parts and components.

Table 1: India's Ex	ports and Im	ports of Parts and	Components	$(P&C)$, 2018^{14}
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		India's Expo	rts		India's Impor	cts
	India's	Share of	Share of India's	India's	Share of	Share of India's
	Exports of	India's	Exports of	Imports of	India's	Imports of
	P&C	Exports	P&C in India's	P&C	Imports	P&C in India's
		of P&C	Exports of P&C		of P&C	Imports of
		in Total	to World		in Total	P&C from
		Exports			Imports	World
	(US\$ billion)	(%)	(%)	(US\$ billion)	(%)	(%)
Indonesia	0.36	11.6	1.8	0.20	1.7	0.6
Malaysia	0.26	6.2	1.3	0.65	7.5	2.0
Singapore	0.62	8.5	3.2	0.48	7.2	1.5
Thailand	0.41	13.9	2.1	0.98	18.4	3.0
Vietnam	0.16	2.7	0.8	0.44	14.3	1.4
ASEAN	2.13	8.1	10.8	2.84	7.4	8.8
China	0.50	5.6	2.5	10.43	17.2	32.4
Japan	0.39	10.1	2.0	2.24	22.9	7.0
Korea	0.20	5.8	1.0	2.34	19.2	7.3
USA	3.66	8.7	18.5	5.15	25.2	16.0
World	19.74	7.6	100.0	32.17	9.0	100.0

Note: Classification of parts and components is based on Broad Economic Categories (BEC) and SITC 3.1 -Rev. **Source:** Authors' calculation based on WITS Database.

Table 2: India's Exports to and Imports of Parts and Components (P&C) from ASEAN

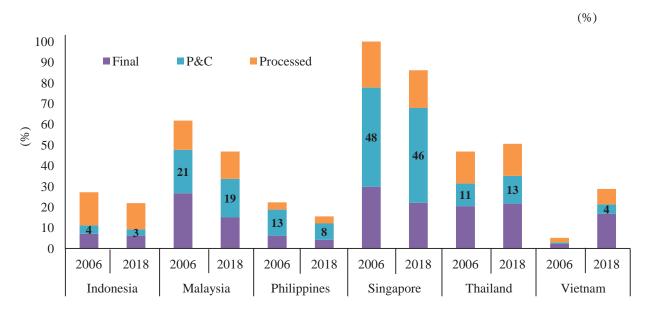
		India's	Exports			India's	Imports	
Country	Fina	l goods	Pe	&C	Final	goods	P	&C
Country	2006	2018	2006	2018	2006	2018	2006	2018
				(US\$ Millio	n)			
Brunei	1.14	11.73	0.91	3.07	1.14	0.04	0.91	0.34
Indonesia	175.00	264.21	103.87	407.55	175.00	700.74	103.87	282.81
Cambodia	1.68	11.65	2.30	4.89	0.05	0.15	0.07	0.17
Lao PDR	2.23	18.53	0.87	5.82	2.23	4.93	0.87	0.00
Myanmar	11.05	121.17	15.00	112.85	11.05	7.21	15.00	2.61
Malaysia	89.39	942.99	105.02	274.42	597.16	1306.62	347.83	860.99
The Philippines	37.07	199.31	150.30	173.76	37.07	134.38	150.30	145.16
Singapore	580.93	1198.45	207.81	520.75	1157.98	1940.32	920.35	820.26
Thailand	68.06	246.86	82.61	414.08	364.21	1375.15	270.70	1214.46
Vietnam	34.58	364.40	32.08	152.23	3.93	863.34	4.54	490.32
ASEAN	1001.14	3379.30	700.75	2069.41	2349.82	6332.88	1814.42	3817.13
CAGR of ASEAN (2006-2018) (%)	1	0.7	9	.4	8.	6	6.4	

Source: Authors' calculation based on WITS.

India's exports of P&C to ASEAN have increased by about 9.4 per cent (US\$ 2.07 billion in 2018) between 2006 and 2018 (see Table 2). Among the ASEAN countries, India's exports of P&C were majorly directed to Singapore (US\$ 520.7 million), Indonesia (US\$ 407.5 million), Thailand (US\$ 414.1 million) and Malaysia (US\$ 274.4 million) in 2018. Barring Brunei, Cambodia and Lao PDR, India's exports of

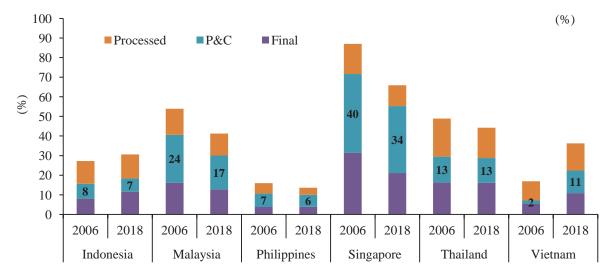
P&C to the other ASEAN countries were more than US\$ 100 million in 2018. Figure 6 clearly shows that India's major exports of P&C to ASEAN countries were directed to Singapore (46 per cent), followed by Malaysia (19 per cent) and Thailand (13 per cent) in 2018. Overall, India's export of P&C to ASEAN was about 8.1 per cent in India's total exports to ASEAN (Figure 4). India's imports of P&C are majorly from Thailand (US\$ 1,214 million), Malaysia (US\$ 860.99 million), Singapore (US\$ 820.26 million) and Vietnam (US\$ 490.32 million) in 2018. India's imports of P&C have grown by 6.4 per cent between 2006 and 2018. In terms of share of India's imports of P&C from ASEAN are majorly from Singapore (34 per cent), Malaysia (17 per cent), Thailand (13 per cent) and Vietnam (11 per cent) in 2018 (Figure 5).

Figure 4: India's Export Share of Parts and Components to ASEAN in Total Export to ASEAN



Source: Authors' calculation based on WITS.

Figure 5: India's Import Share of Parts and Components from ASEAN in Total Imports from ASEAN



Source: Authors' calculation based on WITS.

Table 3 shows the share of India's major sector-wise exports of P&C to ASEAN countries in 2018. More than 50 per cent of India's exports of P&C of electrical equipment, industrial equipment, power generating equipment, etc. were directed to all the ASEAN countries. However, in terms of value, it varies across ASEAN. India's P&C exports of road vehicles, telecommunication equipment and industry special machine were directed mostly to Thailand, Indonesia, Malaysia, Indonesia and Singapore. India's exports of P&C of rubber manufacturing is with Cambodia, the Philippines and Vietnam, whereas, India's export of metal manufacturing machinery was directed to Myanmar and Vietnam in 2018.

Table 3: Major Sector-wise Share of India's Export of Parts and Components on Sector-wise Total Exports to ASEAN, 2018

(%)

	Export of Parts and Components (US\$ Million)	Share of Export of Parts and Components in Total Exports	Electrical equipment	Industrial equipment	Industry special machine	Metal manufactures	Metal working machinery	Office / data processing machines	Power generating equipment	Railway/ tramway equipment	Road vehicles	Rubber manufactures	Scientific instruments	Telecommunication equipment
Brunei	3.07	8.1	55.5	72.0	93.9	1.8	92.9	3.5	16.2	0.0	3.7	42.2	55.1	75.4
Cambodia	407.55	3.0	73.8	9.8	1.9	0.1	7.1	7.9	2.3	0.0	2.4	86.3	2.8	45.2
Indonesia	4.89	11.0	50.0	41.5	29.9	8.2	33.8	7.6	39.5	0.4	78.8	81.9	18.9	85.5
Lao PDR	5.82	9.5	69.5	10.6	8.1	0.7	0.4	0.0	44.0	0.0	1.4	0.3	3.0	1.4
Malaysia	112.85	5.6	50.0	50.5	25.1	4.6	38.7	70.5	87.0	2.7	73.2	76.9	19.9	5.0
Myanmar	274.42	14.5	64.3	29.8	39.1	1.9	76.8	2.7	16.8	67.5	27.0	95.5	10.1	42.2
The Philippines	173.76	13.5	45.2	42.7	24.2	1.0	3.4	44.1	42.5	97.4	9.2	94.9	18.0	28.8
Singapore	520.75	6.1	45.5	68.3	60.5	19.5	31.1	44.4	90.6	6.1	18.5	56.0	15.1	12.6
Thailand	414.08	12.5	57.7	37.9	27.7	4.6	31.2	28.4	69.3	13.4	95.1	82.9	7.2	17.9
Vietnam	152.23	2.5	32.6	41.4	16.1	4.9	77.2	20.1	56.0	2.3	7.7	68.7	7.4	72.0
ASEAN	2069.41	7.3	48.0	47.5	34.5	7.9	48.5	45.8	64.4	5.0	47.1	84.3	14.7	41.3

Note: SITC classification at 2-digit is followed for the sectoral classification.

Source: Authors' calculation based on WITS database.

Similarly, Table 4 shows the share of India's major sector-wise imports of P&C with ASEAN countries in 2018. It indicates that India's imports of P&C are with some ASEAN countries, except Brunei, Cambodia, Lao PDR and Myanmar. About 100 per cent of India's imports of P&C of industry-specific machine¹⁵, power generating equipment telecommunication equipment, scientific equipment are procured from some of the ASEAN countries like Brunei, Cambodia and Myanmar. About 90 to 100 per cent of the P&C of road vehicles were procured from Indonesia, Thailand, Vietnam, the Philippines and Malaysia (74 per cent) in 2018. This shows a strong regional value chain integration in the automobile sector between ASEAN and India. More than 50 per cent of India's imports of P&C of electrical equipment, industrial equipment, power generating equipment, rubber manufactures were mostly from the Philippines, Indonesia, Thailand, Malaysia and Vietnam in 2018.

Table 4: Major Sector-wise Share of India's Imports of Parts and Components on Sector-wise Total Imports from ASEAN, 2018

(%)

	Import of Parts and Components (US\$ Million)	Share of Import of Parts and Components in Total Imports	Electrical equipment	Industrial equipment	Industry special machine	Metal manufactures	Metal working machinery	Office / data processing machines	Power generating equipment	Railway/ tramway equipment	Road vehicles	Rubber manufactures	Scientific instruments	Telecommunication equipment
Brunei	0.34	0.0	60.2	2.7	100.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	100.0	100.0
Cambodia	282.81	0.4	0.0	0.0	0.0	0.0	100.0	55.0	0.0	0.0	0.3	1.9	96.5	0.0
Indonesia	0.17	1.6	56.3	52.2	62.3	13.7	8.3	4.9	28.5	0.0	93.9	68.4	59.7	30.7
Lao PDR	0.00	0.0	16.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Malaysia	2.61	8.3	74.2	26.8	52.0	5.1	4.9	59.9	93.5	4.3	74.0	10.3	23.5	12.4
Myanmar	860.99	0.0	16.9	12.5	72.2	0.0	100.0	14.4	99.2	100.0	62.5	0.0	0.0	3.2
The Philippines	145.16	26.0	78.7	61.0	13.7	10.0	22.2	10.9	61.0	98.9	100.0	86.7	31.9	29.5
Singapore	820.26	11.2	73.2	57.3	47.2	10.9	14.4	9.1	68.7	6.7	49.2	11.1	18.2	15.9
Thailand	1214.46	21.2	50.1	31.6	17.3	10.3	23.2	2.6	94.2	28.0	91.9	58.2	23.9	11.8
Vietnam	490.32	18.1	75.8	63.8	18.3	0.6	13.3	45.4	24.7	19.8	99.8	65.0	31.8	25.7
ASEAN	3817.13	8.6	68.2	36.2	39.3	8.2	17.8	24.6	84.4	3.8	92.1	49.7	22.2	18.3

Note: SITC classification is followed for the sectoral classification.

Source: Authors' calculation based on WITS.

This trend also shows that intra-sectoral level trade in P&C between ASEAN and India is mostly conducted in electrical equipment, industrial machines, road vehicles, power generating machines and telecommunications, and these are the common sectors, where India's share of P&C exports to and imports from ASEAN was more than 50 per cent in respective sector's trade (Table 5). India also has a relatively strong regional value chain base in the automobile sector with ASEAN countries like Indonesia, Thailand and Malaysia.

Table 5: Potential Value Chain Linkages between ASEAN and India*

	India's Exports to ASEAN	India's Imports from ASEAN
Brunei	Electrical equipment; Industry special machine, metalworking machinery and Telecommunication equipment	Electrical equipment, Industry special machine; power generating equipment, scientific instruments, Telecommunication equipment
Cambodia	Electrical equipment; Rubber manufactures and Telecommunication equipment	Metalworking Machinery, Office and data processing machines and Scientific instruments
Indonesia	Electrical equipment; Road vehicles, Rubber manufactures and Telecommunication equipment	Electrical equipment; Industrial equipment; Road vehicles; Rubber manufactures and Scientific instruments
Lao PDR	Electrical equipment, Power generating equipment	Industry special machine
Malaysia	Electrical equipment; Industrial equipment; Power generating equipment; Road vehicles and Rubber manufactures	Electrical equipment; Industry special machine; Office and data processing machines; Power generating equipment; Road vehicles
Myanmar	Electrical equipment; Metalworking machinery; Railway equipment and Rubber manufactures	Industry special machine; Metalworking machinery; power generating equipment; Road vehicles
The Philippines	Railway equipment, Rubber manufacturers and Industrial equipment	Electrical equipment; Industrial equipment; Power generating equipment; Railway equipment; Road vehicles; Rubber manufactures
Singapore	Industrial equipment; Industry special machine	Electrical equipment; Industrial equipment; Power generating equipment and Road vehicles
Thailand	Electrical equipment; Power generating equipment; Rubber manufacturers	Electrical equipment; Power generating equipment; Road vehicles and Rubber manufactures
Vietnam	Metalworking Machinery; Power generating equipment; Rubber manufacturers and Telecommunication equipment	Electrical equipment; Industrial equipment; Office and data processing machines; Road vehicles and Rubber manufactures

Note: * Based on Table 3 and Table 4, India's P&C Exports to and Imports from ASEAN of greater the 50 per cent in the respective Sectors.

Source: Authors' own.

4. Impact of Covid-19 on GVC Participation

Disruption of the movement of raw materials, intermediate and finished goods due to lockdown and Covid-19 measures has exposed the vulnerability of global supply chains. The Covid-19 invariably has also shattered both inter- and intra trade relations across the world. Figures 6 and 7 illustrate the impact of Covid-19 on trade openness and GVC. Figure 6 presents scatter plots between trade openness and quarter-on-quarter exports growth in pre-Covid-19 and the Covid-19 period. The quarter-on-quarter growth of exports in pre-Covid-19 considers the period Q12017 to Q12018, and for the Covid-19 period, a quarter-on-quarter growth of exports covers the period Q12019 to Q12020. Country's trade openness is the percentage share of total exports and imports in GDP. Figure 6 exhibits that compared to pre-Covid-19 scenario (Figure 6a), the quarter-on-quarter growth of exports during the covid-19 period is found to be negative for the countries, which have trade openness more than 60 per cent. Figure 8b also shows the severity of the Covid-19 outbreak. Here, red scatter points represent those countries which have reported more than 1000 per million population confirmed Covid-19 cases. Most of the red scatter points are close to zero or negative, thereby indicating the high severity of the Covid-19 outbreak on trade.

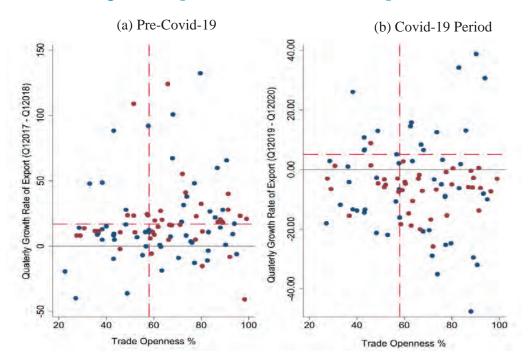


Figure 6: Impact of Covid-19 on Trade Openness

Source: Authors' own

To understand the impact of Covid-19 on GVC, Figure 7 exhibits the scatter plots between GVC backward participation and quarter-on-quarter growth of exports for both pre-Covid-19 and Covid-19 periods. It clearly shows that in the pre-Covid-19, the quarter-on-quarter growth of exports is found to be positive for most of the countries, whereas in the Covid-19 period (Q12019 – Q12020), the growth of export is found to be negative across countries falling under the GVC backward participation. Most of the quarter-on-quarter export growth has come out negative in the range of 0 to -20 per cent and scattered between 10 and 80 per cent of GVC participation rate. Figure 7b also shows that some of the countries which have experienced positive export growth are in low-level backward participation phase.

(a) Pre-Covid-19 (b) Covid-19 Period 100 Quaterly Growth Rate of Export (Q12017 - Q12018) Quaterly Growth Rate of Export(Q12019 - Q12020) -20 -50 Ó 20 40 60 80 100 0 20 60 80 100 GVC Backward Participation, % GVC Backward Participation, %

Figure 7: Impact of Covid-19 on Global Value Chain

Source: Authors' own

To examine the impact of GVC on quarter-on-quarter export growth, the study has used cross-section analysis using quarter-on-quarter growth of exports, imports and trade between Q12017 and Q12018 for pre-Covid-19 and Q12019 and Q12020 for the Covid-19 period. Ideally, we expect to have a positive relationship between GVC participation and export growth: higher the GVC participation, both in terms of forward and backward participation, countries will witness higher growth in exports (Figure 7a). Similarly, we expect to have a positive and significant relationship between trade openness and export growth (Figure 6a): higher the trade openness, countries would promote the domestic production activities to fuel the growth in exports. Estimated results in Table 6 for the pre-Covid-19 period show a positive and statistically significant coefficient of share of GVC participation and trade openness. The estimated results show that one per cent increase in the share of GVC participation may lead to the growth of exports by 0.05 per cent. Similarly, one per cent increase in trade openness would increase the export growth by 0.03 per cent. In the normal scenario, both trade openness and share of GVC participation have a positive impact on export growth. However, the results of Model 5 to Model 6 in the Covid-19 period show the vulnerability of the outbreak that has negatively affected the quarter-on-quarter export growth. For instance, in Model 4, the coefficients of both GVC participation and trade openness are found to be negative and statistically significant, suggesting that the countries in GVC and also supporting trade openness are negatively affecting the growth of exports in the Covid-19 period. Therefore, the impact of supply chain disruptions due to lockdown and the pandemic is multifaceted due to high degree of integration and interdependence of value chains across the countries.

Table 6: Impact of Global Value Chain Participation on Export Growth during Covid-19

		Pre covid-19			Covid-19 Perio	od
	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
	Quarter on Quarter Export Growth (Q12018- Q12019)	Quarter on Quarter Import Growth (Q12018 - Q12019)	Quarter on Quarter Trade Growth (Q12018- Q12019)	Quarter on Quarter Export Growth (Q12019- Q12020)	Quarter on Quarter Import Growth (Q12019- Q12020)	Quarter on Quarter Trade Growth (Q12019- Q12020)
Trade Openness	0.03 (0.00)***	0.004 (0.00)***	0.23 (0.00)***	-	-	-
Trade Openness (t-1)	-	-	-	-0.03 (0.00)***	-0.04 (0.00)***	-0.07 (0.00)***
Share in GVC Participation	0.05 (0.00)***	0.10 (0.00)***	0.05 (0.00)***	-	-	-
Share in GVC Participation (t-1)	-	-	-	-0.04 (0.00)***	-0.05 (0.00)***	-0.006 (0.55)*
Number of countries	150	150	150	150	150	150

Notes: Data in parentheses show p-value. *** and * indicate statistical significance at 1 per cent and 10 per cent, respectively. *Source:* Authors' own.

To mitigate the supply shocks and rebound strongly in post-Covid 19 periods, Japan has initiated the Supply Chain Resilience Initiative (SCRI), a trilateral approach to trade, partnering with India and Australia (see Box 1). The SCRI is set to reshape the geographical contour of the cross-border production networks in the region and would help in diversifying the supply risks across nations instead of being dependent on one or few countries. Re-location of industries away from China would create a new wave of industrialisation. Both ASEAN and India have the potential opportunities in terms of attracting FDI that are planning to re-locate the firms in ASEAN and India and also new MNCs, which look for a sustainable value chain across the region to avoid high dependency on any particular country(s). In this regard, ASEAN or India may gain direct or indirect trade benefits through bilateral trade relations and also with the already established backward and forward participation. However, to explore this opportunity, both ASEAN and India have to upgrade the skill, improve logistics services and strengthen the transportation infrastructure.

5. Impact of Covid-19 on Different Types of GVC Participation in ASEAN and India

Both ASEAN and India are engaged in GVC, but their participation levels vary across different stages of production. For instance, our interest is to understand the extent of countries' backward participation or forward participation, in terms of whether countries are engaging in the low level of forward participation such as export of raw materials for further processing, or low level of backward participation such as import of inputs for further assembling and exporting to a foreign country or engaging in a higher level of backward or forward participation by engaging in designing, innovation and research and development (R&D). In this context, WDR (2020) has classified the countries in four different types of participation: commodities, limited manufacturing, advanced high manufacturing and services and innovative activities (Figure 8). The classification is based on the goods and services exported, the extent of GVC participation and measures of innovation.

Box 1: Supply Chain Resilience Initiative (SCRI)

Supply Chain Resilience Initiative (SCRI) is a trilateral approach to trade, proposed by Japan with India and Australia as other two partners. Asia and Pacific Rim countries may potentially join later. SCRI is set to reshape the geographical character of cross-border production networks in the region. SCRI would help a country in diversifying its supply risk across nations instead of being dependent on one or few countries, in order to mitigate the impact of unanticipated events on the country.

The Covid-19 has made the countries to reconsider traditional supply chains which are incapable of withstanding the shocks, when its disrupted the supply chain. For instance, most of the country's economic activity depending on China's import which are disrupted due to the Covid-19 outbreak. Besides, the trade tension between the USA and China has created insecurity situation in international market. The impact of supply chain disruptions has heavily affected Japan's exports and supply of primary goods to the world. Japanese government recently earmarked US\$ 2.2 billion to incentivize its companies to move their manufacturing out of China and relocate to any other third country. Japan and India have had a long-standing and deepening trade relationship. Japan is one of the largest investors in India. The border conflict between the two neighbours, India and China, also presented an opportunity that India may be willing to get on with alternative supply chains. To enhance self-reliance and work with nations other than China, India needs to build resilience into the economy's supply networks.

Source: Authors' own based on various secondary sources.

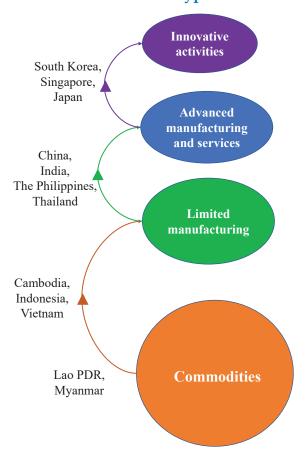


Figure 8: Transition between Types of GVC Participations

Source: Authors' own based on WDR (2020).

Figure 8 shows the transition stage of ASEAN and India in different types of GVC participation. For instance, ASEAN countries such as Lao PDR and Myanmar having rich natural resources but a small share in manufacturing exports are engaged in medium backward GVC integration. Countries such as China, India, the Philippines and Thailand are specialised in the process of moving towards advanced manufacturing and services GVCs that have a high share of manufacturing and business services exports and high backward GVC integration. Countries such as Singapore, South Korea and Japan are specialised in innovative GVC activities and spend a large share of GDP on research and development and exhibit high backward GVC integration. Countries such as Cambodia, Vietnam and Indonesia have been moving towards limited manufacturing by reducing the domestic raw materials exports that are used as inputs in destination countries. Figure 8 also shows the progressive stage of moving up the ladder from lowend GVC participation to high-end GVC participation.

The Covid-19 outbreak has caused two major effects. The effect of the full and partial lockdown of major manufacturing hubs, blockage in transportation and logistical services has created the supply shocks. On the other hand, a slowdown in economic activity, raise in unemployment, direct and indirect effect on sectors like hospitality, travel and tourism, automobile, textiles, etc. have created the demand shocks. This has triggered the cascading effect on global supply chains. For instance, the exports of ASEAN countries such as Cambodia, Indonesia, Myanmar and Lao PDR used as inputs in the further production process are likely to suffer due to demand shocks as a result of slowdown in production activities in the foreign country. On the other hand, countries such as Thailand, Malaysia, Vietnam, China and India specialising in advanced manufacturing tend to import intermediate products from the foreign countries, which are embodied in their respective exports, would suffer from supply shocks due to strong backward linkages.

6. Potential Sectors for Value Chain Engagement in the Post-Covid-19

The Covid-19 outbreak has emphasised the significance of food security and health security in addition to energy security. In the Covid-19 period, there is a rise in demand for healthcare services, medical products, medicines and food products. The demand for trade-in 'quality of life' products such as pharmaceuticals and healthcare products and services has gone up. For instance, most of the European Union countries, Central Asia, and some of the Latin and North American countries, which are exposed to Covid-19 with more than 1000 per million population, may depend more on essential goods such as food and healthcare products (Figure 9). India has exported about 18 per cent of healthcare products and 17 per cent of food products, as a share of total medical and food products exports to the world, to these countries in 2019 (Figure 10).

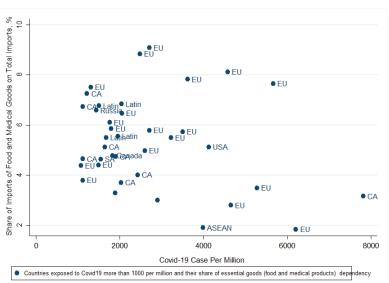


Figure 9: Effect of Covid-19 Outbreak vs. Essential Goods Dependency

Source: Authors' own based on WITS.

20.0 17.9 ■ Food Products ■ Medical Products 16.9 18.0 16.0 14.0 11.0 11.4 12.0 10.0 8.0 5.7 6.0 4.0 2.0 1.0 1.0 2.0 0.0 Exports to World Imports from World Exports to ASEAN Imports from ASEAN

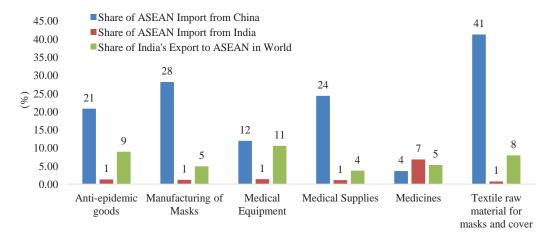
Figure 10: Share of India's Food and Medical Products Trade with ASEAN (Avg. 2018 and 2019)

Note: The classification of food and medical products based on Espita *et. al* (2020).

Source: Authors' own calculation based on WITS.

There is also unrealised potential trade between ASEAN and India on healthcare products. For instance, ASEAN's trade in healthcare products with China was more than 20 per cent in 2019, whereas ASEAN's trade in healthcare products with India is only about one per cent for most categories of the healthcare products. India's export of healthcare products to the world was about 10 per cent in 2019 (Figure 11).

Figure 11: India's Potential Exports of Medical Products to ASEAN (Avg. 2018 and 2019)



Notes: The classification of food and medical products based on Espita *et. al* (2020); the detailed trends of ASEAN and India trade on medical products are given in Appendix 3.

Source: Authors' own calculation based on WITS.

At the virtual meetings of Economic Ministers of the 10 ASEAN member states and eight other countries including India at 8th East Asia Summit Economic Ministers' Meeting (EAS-EMM) on 28 August, 2020 have underscored the importance of strengthening regional supply chains to make them resilient and

less vulnerable to shocks besides advancing sustainable economic growth. They have also reaffirmed their commitment to promote trade and investment, minimise disruptions to trade and global supply chains and facilitate supply chain connectivity, including essential goods like medical supplies, medicines, vaccines, foods and other essential supplies and services in the region. Both ASEAN and India should promote the trade in healthcare products and also explore the traditional knowledge of medicines and practices through R&D and engage in facilitating supply chain process in the health products.

7. Promoting Regional Value Chain Linkages between ASEAN and India

7.1 Elimination of Exclusion and Sensitive List

ASEAN-India FTA in goods has large exclusions (negative) list on which concessional tariffs are not offered. There are certain products reserved under the sensitive lists, for which tariff reductions have been slower than the reduction in the normal track. The rationale for any kind of exclusion or sensitive list is to protect domestic industries. Contrary to popular belief, import demand has gone up in the sensitive and exclusion lists items between India and ASEAN countries since the signing of the FTA in 2010 (Table 7). For instance, Table 7 shows that most of the sectors which have potential value chain linkages between ASEAN and India are under the exclusion or highly sensitive list. In case of ASEAN FTA with India, at least 50 per cent of the products at HS 6-digit level are under exclusion and highly sensitive lists, which are now actively part of P&C trade between ASEAN and India in the sectors like electrical equipment, industrial equipment, road vehicles, metal manufacturers, etc. On the other hand, India has also imposed some restrictions on imports from ASEAN. Therefore, most of the P&C products do not enjoy concessional tariffs under the AIFTA. While reviewing the ASEAN-India FTA, the focus should be given to the products which are engaged in the value chain production process leading to strengthening the regional value chain linkages.¹⁷

Table 7: Products in Exclusion and Highly Sensitive List (Number of Products at HS 6-digit level)

		ASEAN against India														
		Cambodia		Laos PDR		Myanmar		ivialay sia	The Philippines		Thailand		Vietnam		India against ASEAN	
	Overall	P&C	Overall	P&C	Overall	P&C	Overall	P&C	Overall	P&C	Overall	P&C	Overall	P&C	Overall	P&C
Electrical equipment	21	13	6	4	30	8	4	1	11	5	8	3	41	11	21	7
Furniture/furnishings	1		12	1			2		6				10			
Industrial equipment	14	9	12	2	40	15	8	2	3		7	2	19	6	22	8
Industry special machinery	5	2	2	1	29	12	9				2	1	9	1	1	
Metal manufactures	25	2	5	1	66	6	47		44		62		57		5	
Metalworking machines					12	3										
Office/data proc machines	2				2	1										
Photographic equipment	5	2	56	3	6										1	
Power generating equipment	7	4	7	5	23	9			8	3	6	5	14	7	9	4

Table 7 continued...

Table 7 continued...

Railway/tramway equipment			21	2	8	1							1			
Road vehicles	11	10	39	17	21	9	22	3	23	7	38	13	40	21	20	8
Rubber manufactures	10	7	3		23	11	42	26	15	8	12	10	16	14	26	12
Scientific/etc instruments	3		3		7	1			1		3	1	2		2	1
Telecommunications equipment	1		5	2	14	4	1	1					23	1	1	
Textile yarn/fabrics	73		12		27		210		23		93		137		134	
Total	178	49	183	38	194	80	345	33	134	23	231	35	369	61	242	40

Note: P&C: Parts and Components. Number of Products at HS 6-digit level under Exclusion List and Highly Sensitive List. *Source:* Authors' own based on AIFTA.

7.2 Reduction of Trade Costs and Improve the Efficiency in Services

GVC participation requires timely production and Just-in-Time (JIT) delivery. Trade in P&Cs is more sensitive to the delivery time and costs of trade, where, each stage of the production process is very crucial for final assembly. Lack of timely delivery and increase in costs would affect the survival of manufacturing exporters. Table 8 shows the indicators related to time and cost for both ASEAN and India.

Table 8: Trading Across Border Indicators, 2019

			Export urs)		Export S\$)		Import urs)		Import S\$)
		Documentary compliance	Border compliance						
	Brunei	155	117	90	340	132	48	50	395
	Cambodia	132	48	100	375	132	7.5	120	240
	Indonesia	61.3	56.3	138.8	211.1	106.2	99.4	164.4	382.6
—	Lao PDR	60	9	235	140	60	10.5	115	223.5
ASEAN	Malaysia	10	28	35	212.5	6.5	36	60	212.5
4SE	Myanmar	144	141.7	140	431.7	48	230	210	456.7
	The Philippines	36	42.5	52.5	456	96	120	67.5	689.5
	Singapore	2	10	37	335	3	33	40	220
	Thailand	11.3	44	96.9	222.6	4	50.2	43.5	232.5
	Vietnam	50	55	139.2	290	76	56	182.5	373
	India	11.6	52.1	58	211.9	19.9	65.3	100	266.1
lus	China	8.6	20.7	73.6	256.2	12.8	35.7	77.3	241.3
ASEAN Plus	Japan	2.4	26.7	54	272.4	3.4	39.6	107	314.8
EAI	South Korea	1	13.4	11.1	184.7	1	6	26.8	314.6
AS	Australia	7	35.5	264	766	4	39	100	539
	New Zealand	3	37	67	337	1	25	80	366.5

Source: Doing Business Database, the World Bank.

In terms of time to export and import of documentary compliance, ASEAN countries such as Singapore, Malaysia and Thailand take less than 10 hours, whereas, in terms of border compliance, these countries take about 10 to 50 hours, respectively. The other ASEAN countries like Brunei, Myanmar and Cambodia take more than 100 hours for documentary and border compliance. In the case of India, the time to export and import take about 11 to 20 hours for documentary compliance and 50 to 65 hours for border compliance. India takes almost double the time for documentary and border compliance. However, in terms of export and import costs, India's border costs are lower than that of China and relatively closer to Japan. Barring Indonesia and Myanmar, cost to export and import is between US\$ 35 to US\$ 100 for most of the ASEAN countries.

Lack of proper infrastructure and delay in customs clearance add to the rise of trade costs, which affect a country's GVC participation. In this regard, East Asian countries like China, Japan and South Korea and some of the ASEAN countries like Singapore, Thailand and Malaysia have successful in minimising the time and costs of trade, compared to other ASEAN countries and India.

7.3 Digitalisation in Trade Facilitation Measures

The Covid-19 outbreak has forced the producers of goods and services to move towards digitalisation of business operations. In particular, digitalising the supply chain would help achieve business resilience against supply chain disruptions amidst Covid-19 outbreak. Studies¹⁹ have shown strong positive linkages between countries' internet usage and GVC participation, where about 30 per cent ICT-enabled services are embodied in inputs that are imported and both suppliers and customers frequently communicate through internet-based technologies. Therefore, digital technology in the trade facilitation measures would strengthen the supply chains. To facilitate digital trade, ASEAN has ratified the ASEAN Digital Integration Framework (ADIF), which was ratified at the 18th AEC Meeting in Bangkok in October 2019 (Box 2). ADIF has prioritised the improvement of reliable physical infrastructure for digital-enabled trade to facilitate seamless trade flows within and across ASEAN. Similarly, India has also initiated several digital trade facilitation measures, which have effectively improved the trade facilitation process.²⁰

The Trade Facilitation Agreement (TFA) of the WTO aims to improve transparency, increase possibilities to participate in global value chains, and reduce the scope of corruption. It also sets out measures for effective cooperation between customs and other appropriate authorities on trade facilitation and customs compliance issues. Both ASEAN and India have ratified the WTO TFA, where most of the ASEAN countries have bound their commitments in category A, and India has selected both categories A and B (Appendix 4).

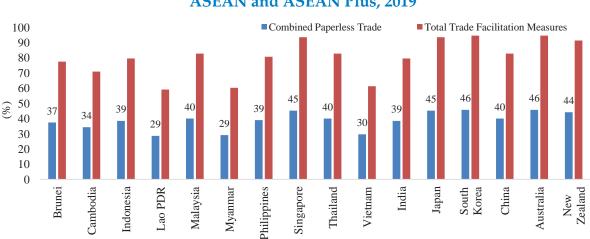


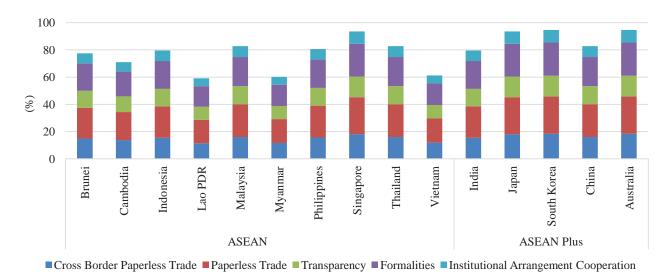
Figure 12: Share of Digital Trade Facilitation Implementation in ASEAN and ASEAN Plus, 2019

Source: UN Global Survey on Trade Facilitation and Paperless Trade Implementation

Figure 12 shows the UN Global Survey of Trade Facilitation Measures implemented by ASEAN and ASEAN plus in 2019. Except, Lao PDR, Myanmar, Cambodia and Brunei, the other ASEAN countries have implemented digital trade facilitation measures of about 40 per cent in 2019. Among ASEAN plus countries, India and China have gained 40 per cent implementation rate, whereas the other countries have about 45 per cent implementation of digital trade facilitation. ASEAN and India have a varying implementation in case of non-digital trade facilitation measures such as transparency, formalities and institutional arrangement cooperation (Figure 13). Overall, ASEAN countries, except Singapore, have achieved about 60 to 80 per cent implementation rate. On the other, India and China have implemented about 80 per cent of trade facilitation measures.

What follows is that implementing trade facilitation commitments and improving border management would reduce trade costs between and within ASEAN and India. Besides, strengthening regional value chains between ASEAN and India require an effective way of implementing trade facilitation measures.

Figure 13: Share of Trade Facilitation Measures Implementation in ASEAN and ASEAN Plus, 2019



Source: UN Global Survey on Trade Facilitation and Paperless Trade Implementation

7.4 Encourage the Participation of SMEs

SMEs play a significant role in strengthening the value chain linkages both in terms of forward and backward linkages within and across the region. The Covid-19 outbreak has hit hard the SMEs across the world. SMEs often work with shorter working capital cycles, resulting which SMEs are most vulnerable due to the Covid-19 and the subsequent policy measures such as partial or full lockdown across the world. To support SMEs and encourage them to revive their production activities and promoting trade, ASEAN and India have initiated several policy measures specific to SMEs (see Table 9). The most widely used instruments in response to the outbreak are income and profit tax deferrals, loan guarantees and direct lending to SMEs, and wage subsidies. Central banks of both ASEAN and India are also stepped in to support SMEs by enabling commercial banks to provide loans. Similarly, some of the ASEAN countries have also supported labourers through wage and income support, etc. India may look into the packages offered by the ASEAN that help to integrate regional supply chains leading to revive the SMEs. ASEAN countries have offered income tax deferment, VAT collection deals and concessional

loans, which India may also offer while reviving the SMEs. Both ASEAN and India should encourage and provide technical assistance to SMEs, particularly to the sectors which have potential to be a part of GVCs by supporting through forward and backward linkages such as automobiles, textiles, chemicals, electrical and electronic components, etc.

Box 2: ASEAN Digital Integration Framework (ADIF)

The ASEAN Economic Community (AEC) Ministers ratify the completion of the Digital Integration Framework Action Plan 2019-2025 at the 18th AEC Meeting in Bangkok in October 2019, and aim to advance and overcome digital integration barriers to ASEAN digital integration is a critical enabler for harnessing the scale of ASEAN as a region, enabling ASEAN to compete more effectively in the global economy, and bridging the digital divide to create a more inclusive ASEAN region. It also enables individual ASEAN Member States to accelerate their own domestic growth. At the core of regional digital integration is transforming the basis of competition for ASEAN and local businesses, including the MSMEs. It is, therefore, critical for ASEAN to accelerate the progress of digital integration and ensure all its Member States take deliberate and coordinated actions to build a regionally integrated digital economy. The key elements in the ASEAN Digital Integration Framework are in line with the AEC Blueprint 2025, ASEAN ICT Master Plan 2020, Master Plan on ASEAN Connectivity 2025, ASEAN Framework for Personal Data Protection, and the ASEAN Strategic Action Plan for SME Development 2025. The ASEAN Digital Integration Framework enables ASEAN Member States to prioritise existing policy actions that will deliver the full potential of digital integration.

Six priority areas are identified to address the critical barriers and accelerate existing ASEAN platforms and plans to realise digital integration. They are: (1) Facilitate seamless trade, (2) Protect data while supporting digital trade and innovation, (3) Enable seamless digital payments, (4) Broaden digital talent base, (5) Foster entrepreneurship, and (6) Coordinate actions.

Source: ASEAN Secretariat (2019).

Table 9: SME Policies in Response to Covid-19

		Indonesia	Malaysia	Singapore	Thailand	Vietnam	Australia	Japan	Korea	India	China
ur	(Partial) redundancies										
Labour	Wage subsidies				\checkmark					$\sqrt{}$	$\sqrt{}$
Ţ	Self-employed				\checkmark		$\sqrt{}$				
	Income/ corporate tax				\checkmark		$\sqrt{}$			$\sqrt{}$	$\sqrt{}$
ral	Value Added Tax (VAT)	√			\checkmark	\checkmark					
Deferral	Social security and pension contributions				\checkmark	\checkmark					$\sqrt{}$
	Rent/utilities/local tax				$\sqrt{}$						$\sqrt{}$
	Debt moratorium		√							$\sqrt{}$	$\sqrt{}$

Table 9 continued...

- T			
Tah	109	continu	₽d

ts	Loan guarantees		√	√		√	√	√		
cial	Direct lending to SMEs		√	√	√	√			√	\checkmark
Financial instruments	Grants and subsidies	V	V			V	V	V		V
	New markets						\checkmark	$\sqrt{}$		
Structural policies	Teleworking/ digitalisation	√	√				√	√		√
frue	Innovation			√	√		$\sqrt{}$			
SO	Training and redeployment		√		√	√	√	√		√

Source: Authors' own based on OECD (2020).

8. Policy Recommendations

To strengthen the regional value chains between ASEAN and India and to deal with the supply chain challenges due to Covid-19, this section presents some major policy recommendations. Here, we also resent the recommendations drawing upon the webinar on ASEAN-India value chain in the Covid-19, organised by AIC at RIS on 22 May 2020.

Elimination of Exclusion and Sensitive List

ASEAN-India FTA in goods has large exclusions (negative) list on which concessional tariffs are not offered. Most of the sectors such as electrical equipment, industrial equipment, automobiles, metal manufacturing, etc. which show potential value chain linkages between ASEAN and India are listed under an exclusion or highly sensitive list. Therefore, while reviewing ASEAN-India FTA, emphasis should be given to the products which are engaged in the value chain production process.

Reduction of Trade Costs and Improvement in Efficiency in Services

Lack of infrastructure and delay in customs clearance may increase trade costs, which may affect countries GVC participation. Both ASEAN and India's regional value chains are major with East Asian countries, who have effectively minimised the time and costs of trade, compared to some of the ASEAN countries and India. Both ASEAN and India have to improve their trade facilitation measures, logistics and customs system in order to minimise the trade costs and time. This would ultimately enhance deeper economic integration of the region and facilitate India's trade with East Asian countries.

Digitalisation of Trade Facilitation Measures

Digitalisation of supply chain would help to achieve business resilience against supply chain disruption amidst Covid-19 outbreak. Effectively implementing the cross-border paperless trade, improving transparency and institutional arrangements would reduce the trade costs and strengthen the regional value chains between ASEAN and India.

Encourage Small and Medium-Sized Enterprises

SMEs play a significant role in strengthening the value chain linkages, both in terms of forward and backward linkages within and across the region. In this Covid-19 time, SMEs are the most vulnerable and have faced the hardest hit. Both ASEAN and India should encourage and provide technical assistance,

simplify the loan and lending process, facilitate minimum support to revive the production activity to promote export and strengthen the forward and backward linkages, particularly to the sectors such as automobiles, electrical and electronic components, textiles and chemical products which offer potential value chain linkages between ASEAN and India.

Box 3: Major Recommendation from the Webinar on ASEAN-India Trade and Value Chains in Covid-19 Era

22 May 2020

- ASEAN and India should continue with a national stimulus package for MSMEs, strengthen domestic competitiveness and jointly work for resilient recovery.
- Further momentum should be added to integration initiatives such as BIMSTEC, ASEAN, MGC, IOR, Indo-Pacific, etc.
- ASEAN and India should promote new sectoral opportunities in digital connectivity, health, pharmaceuticals, etc.
- ASEAN and India may initiate B2B Business Facilitation through industry associations and chambers of commerce (e.g. FICCI-AIBC, CII, ASSOCHAM, ICC, EEPC India, FIEO, etc.) to promote trade and investment between ASEAN and India.
- ASEAN and India should cooperate in the IT industry and pharmaceutical sector to gain from comparative efficiency in the new export areas, which are based on digital technologies such as entertainment, education, tele-medicine, healthcare, medical tourism, etc.
- ASEAN and India should strengthen the regional partnership and support the domestic industries to be more competitive in order to compete with other countries.
- Given the technological advancement in 3D printing, artificial intelligence, etc., the future industries may not be in mass production. Instead, it would be customised products with higher technology in the production process to meet the customers' requirements. ASEAN and India can work together and support each other in the robotics and information technology and communication (ICT) related industries.
- Future automobiles would be more on electrical vehicles with the usage of less parts and shorter value chain linkages. Some of the ASEAN countries and India engaging in automobile industries for long with deeply integrated production processes may have to look for gradual transition to cope with future requirements. In post-Covid-19, both ASEAN and India may have an opportunity to attract FDI in the automobile sector to produce electrical vehicles.

Source: Refer Appendix 5.

9. Concluding Remarks

The Covid-19 has disrupted the supply chain networks, and the supply of intermediate inputs and final goods across the world has been disrupted disproportionately. Both ASEAN and India are not exceptional to this pandemic shock. Despite limited GVC participation, India is having a strong hold in some of the advanced manufacturing sectors like automobile, which tend to have strong backward linkages that are heavily affected due to supply shock. Our analysis also suggests that the countries, those are engaged in GVC and also support trade openness, negatively affect the growth of exports in the Covid-19 period. Therefore, the impact of supply chain disruptions due to pandemic is multidimensional due to high degree of integration and interdependence of value chains across the countries.

India's parts and components (P&C) exports to and imports from ASEAN are close to 10 per cent, and India's P&C trade with major ASEAN countries are Singapore, Thailand, Malaysia, Indonesia and Vietnam. In particular, ASEAN and India have substantial intra-sectoral level trade in P&Cs in the sectors like electrical equipment, industrial machines, road vehicles, power generating machines and telecommunications. In addition, India also has a strong regional value chain base in the automobile sector with ASEAN countries such as Indonesia, Thailand and Malaysia. India also has high potential in some of the sectors which are inter-dependent with the services sector such as ICT, R&D, pharmaceuticals, etc.

The pandemic has created an opportunity to promote trade and investment by realigning the supply chains. Re-location of industries away from China would create a new wave of industrialisation. Both ASEAN and India have the potential opportunities in terms of attracting FDI that are planning to relocate the firms in ASEAN and India and also new MNCs, which look for sustainable value chains across the region and to avoid high dependency on one single country. Both ASEAN and India can leverage the emerging scenario and support each other to build new and resilient supply chains. However, to explore this opportunity, both ASEAN and India must upgrade the skilling, improve logistics services and strengthen the transportation infrastructure.

The nature of trade flows in post-Covid-19 may likely be technology- and health-oriented and thus, there would a potential demand for healthcare services, medical products, medicines and safe food processing items. Both ASEAN and India may focus on sectors like healthcare, education, green energy, traditional medicine for R&D collaboration, etc. Also, ASEAN and India can explore the value chain linkages in producing health products and pharmaceuticals. Besides, there are huge business opportunities for SMEs and Start-ups in the post-Covid-19, particularly, in digital connectivity, e-commerce, cross-border delivery services, logistics business, etc.

Endnotes

- 1. Refer, for example Jones *et al.* (2005)
- 2. Refer, for example, Venables (1999)
- 3. Refer, for example, Qiang et al. (2020)
- 4. Refer, for example, UNESCAP (2018)
- 5. Refer, OECD (2017)
- 6. Refer, Banga (2016)
- 7. Delivered on 15 August 2020
- 8. Refer, UNESCAP (2018)
- 9. Post-production activities require logistics, trading raw materials, intermediate products and final goods, skilled and un-skilled human resources, directly or indirectly who are engaging in the post-production activities.
- Indo-Pacific includes 44 countries across various regions, they are as follows: ASEAN: Brunei Darussalam, Cambodia, Lao PDR, Myanmar, Malaysia, Indonesia, Singapore, Thailand, Vietnam, the Philippines; South Asia: India, Sri Lanka, Pakistan, Bangladesh, Maldives; Latin America: Colombia, Chile, Ecuador, Peru; North America: Canada, Mexico, United States; North-East Asia: China, Japan, South Korea, Russian Federation; Pacific: Australia, New Zealand, Papua New Guinea, Fiji; West Asia: Iran, Islamic Rep., United Arab Emirates, Yemen, Rep., Oman; Africa: Kenya, Somalia, Tanzania, Madagascar, Mozambique, South Africa, Mauritius, Comoros, Seychelles; European Union: France.
- 11. Refer, for example, WDR (2020).
- 12. Refer, for example, UNCTAD (2013).
- 13. Refer, for example, WDR (2020).
- 14. We follow the Sturgeon and Memedovic (2013) methodology to classify the goods at HS 6-digit level (combined) based on Broad Economic Categories classification scheme (BEC, revision 3). The detailed methodology is given in Appendix 1.

- 15. Such as commercial food products machinery, industrial food products machinery, food packing/ packaging/ bottling, wrapping machinery, textile machinery, paper industry machinery, printing trades machinery, chemical industry machinery, foundry machinery, plastics industry machinery, rubber working machinery, etc.
- 16. The detailed empirical model, methodology and data source are given in Appendix 2.
- 17. ASEAN Secretariat (2020b).
- 18. Refer, for example, UNESCAP (2018).
- 19. Refer, for example, WDR (2020) and UNESCAP (2018) for detailed literature.
- 20. Refer, for example, De and Kumarasamy (2020).

References

- ASEAN Secretariat. 2019. ASEAN Digital Integration Framework. ASEAN Secretariat, Jakarta. Available at: https://asean.org/storage/2019/01/ASEAN-Digital-Integration-Framework.pdf
- Athukorola, P. C. and Yamashita, N. 2006. Production fragmentation and trade integration: East Asia in a global context. *The North American Journal of Economics and Finance*, Vol. 17, No. 3, pp. 233-256.
- Baldwin, R., Ito, T. and Sato, H. 2014. The Smile Curve: Evolving Sources of Value Added in Manufacturing. Available at: http://www.uniba.it/ricerca/dipartimenti/dse/e.g.i/egi2014-papers/ito
- Banga, R. 2016. India's Global Value Chains-Linking LDCs. Trade Express, The Commonwealth Issue 4, August. Available at: https://doi.org/10.14217/24144363
- Casella, B., Bolwijn, R., Moran, D. and Kanemoto, K. 2019. Improving the analysis of global value chains: the UNCTAD-Eora Database 2019. *Transnational Corporations*, Vol. 26, No. 3, New York and Geneva, United Nations.
- De, P. and Kumarasamy, D. 2020. Facilitating Trade in India: What Matters the Most. In A. Raychaudhiri, P. De and S. Gupta (Eds.), *World Trade and India: Multilaterlism, Progress and Policy Response*, Sage, New Delhi.
- Espitia, A., Rocha, N. and Ruta, M. 2020. Database on Covid-19 trade flows and policies. World Bank, Washington, DC.
- Jones, R. W. and Kierzkowski, H. 2005. International fragmentation and the new economic geography. *The North American Journal of Economics and Finance*, Vol. 6, No. 1, pp. 1-10.
- Kimura, F., Takahashi, Y. and Kazunobu, H. 2007. Fragmentation and Parts and Components Trade: Comparison between East Asia and Europe. *The North American Journal of Economics and Finance*, Vol. 18, No 1, pp. 23-40.
- OECD. 2017. Economic Outlook for Southeast Asia, China and India 2017: Addressing Energy Challenges, OECD Publishing, Paris. Available at: http://dx.doi.org/10.1787/saeo-2017-en
- 2020. Coronavirus (Covid-19): SME Policy Responses. Tackling Covid-19: Contributing to a Global Effort, 15 July 2020. Available at: https://read.oecd-ilibrary.org/view/?ref=119_119680-di6h3qgi4x&title=Covid-19_SME_Policy_Responses
- Qiang, C. Z., Li, Y., Paganini, M. and Steenbergen, V. 2020. Foreign Direct Investment and Global Value Chains in the Wake of Covid-19. World Bank Blogs. Available at: https://blogs.worldbank.org/psd/foreign-direct-investment-and-global-value-chains-wake-covid-19
- Sturgeon, T. and Memedovic, O. 2010. Mapping Global Value Chains: Intermediate Goods Trade and Structural Change in the World Economy. UNIDO Working Paper 05/2010.
- UNCTAD. 2013. World Investment Report 2013: Global Value Chains: Investment and Trade for Development, United Nations Publication, Switzerland. Available at: https://unctad.org/system/files/official-document/wir2013_en.pdf
- UNESCAP. 2018. *Asia-Pacific Trade and Investment Report* 2018. UNESCAP, Bangkok. Available at: https://www.unescap.org/sites/default/files/publications/APTIR%202018_4Jan19_0.pdf
- Venables, A. and Howard, S. 1999. The Geography of International Investment. Policy Research Working Paper, November. The World Bank, Washington, DC.
- WDR. 2020. World Development Report 2020: Trading for Development in the Age of Global Value Chains, The World Bank Group, Washington DC. Available at: https://www.worldbank.org/en/publication/wdr2020

Methodology to Calculate Parts and Components from HS 6-digit Level Products

UNCOMTRADE data broadly classify the Broad Economic Categories (BEC) into three end-use categories, namely, capital goods, intermediate goods and consumption goods. BEC can be used to identify the pre-determined category of intermediate goods to examine the issues related to value chain or production fragmentation between the countries. In other words, trends in intermediate goods trade are indicative of value chain formation, as fragmented production processes require parts and components for partially or sub-assemblies' cross borders, one or more times, before the production of final goods (Feenstra 1998). Sturgeon and Memedovic (2013) have customized the BEC classification of traded goods to reflect the nature of intermediate goods that are made specifically for one or a few final products in other country. All the export-import data is taken from World Trade Integrated Solutions (WITS) database.

Appendix 2

Empirical Model, Methodology and Data

To examine the impact of value chain participation and trade openness on export growth, we have used ordinary least square (OLS) regression model for our analysis based on cross-section data. We have estimated the model for two time periods to analyse the impact on pre-Covid-19 and Covid-19 period and the empirical model is as follows:

Pre-Covid-19
$$\rightarrow PreGr_i = \alpha + \beta_1 Openness_i + \beta_2 GVC_i + \varepsilon_i$$
 (1)

Covid-19 Period
$$\rightarrow Gr_i = \alpha + \beta_1 Openness_{it-1} + \beta_2 GVC_{it-1} + \varepsilon_i$$
 (2)

 $PreGr_i$ is the quarter-on-quarter growth of exports, imports and trade respectively between Q12018 and Q12019 for pre-Covid-19 and Gr_i is the quarter on quarter growth of exports, imports and trade for the Covid-19 period between Q12019 and Q12020. We have collected quarterly data from Direction of Trade Statistics, IMF. Openness is the measure of trade openness proxied by the percentage share of total export and import to GDP for the year 2019. We have collected the openness data from the World Development Indicators (WDI), the World Bank. GVC is proxied by the backward participation rate in GVC, which is the foreign value-added embodied in exports as a share of total gross exports. Compared to forward participation, countries in higher backward participation in GVC are deeply integrated in the production process, thus having strong intra-regional trade within and across the region. For backward participation in GVC, we have used the latest available data for the year 2018 as a proxy for the year 2019. GVC data is collected from Casella $et\ al.$ (2019) database on UNCTAD-Eora Global Value Chain Database. In case of equation (1) for pre-Covid-19 model, we have used 2019 data as the base year for explanatory variables of trade openness and GVC. In case of equation (2) for Covid-19 period, we have taken one-year lag (t-1) of trade openness and GVC due to unavailability of data for the current period.

Appendix Table 1: India's Export of Medical Products to ASEAN (Avg. 2018 and 2019)

(US\$ Million)

	Anti- epidemic goods	Manufacturing of Masks	Medical Equipment	Medical Supplies	Medicines	Textile raw material for masks and cover
Brunei	0.6	0.0	12.1	0.6	0.1	0.0
Cambodia	0.2	0.5	0.8	0.4	27.5	1.8
Indonesia	8.5	9.1	48.9	8.9	13.4	1.0
Lao PDR		0.0	0.1	0.0	1.1	
Malaysia	17.6	4.1	19.7	33.5	36.5	0.7
Myanmar	1.7	0.3	5.4	2.6	140.8	1.9
The Philippines	2.5	4.6	10.7	28.5	136.0	0.4
Singapore	12.9	9.2	13.5	20.8	45.3	0.0
Thailand	13.5	27.0	24.3	24.3	89.8	3.4
Vietnam	21.6	5.7	27.6	4.3	72.6	1.3
ASEAN	79.2	60.5	163.1	124.2	563.1	10.7
World	890.5	1245.2	1550.1	3352.2	10753.8	136.0

Note: The classification of food and medical products based on Espita et. al (2020).

Source: Author's own calculation based on WITS.

Appendix Table 2: India's Import of Medical Products from ASEAN (Avg. 2018 and 2019)

(US\$ Million)

	Anti- epidemic goods	Manufacturing of Masks	Medical Equipment	Medical Supplies	Medicines	Textile raw material for masks and cover
Indonesia	66.5	1.1	3.0	10.0	0.5	12.2
Malaysia	102.5	13.4	31.4	73.3	0.7	14.3
Myanmar	0.1	1.4	0.0	0.8		
Singapore	55.9	9.9	167.0	92.0	60.9	1.2
Thailand	55.2	77.2	29.9	52.6	0.4	10.8
Vietnam	33.9	14.7	27.3	14.9	0.0	5.0
ASEAN	280.3	103.0	231.4	228.9	62.5	38.5
World	1396.7	1207.5	4518.8	2784.4	1233.2	271.1

Note: The classification of food and medical products based on Espita et. al (2020).

Source: Author's own calculation based on WITS.

India and ASEAN Countries and WTO Trade Facilitation Agreement (TFA)

The Trade Facilitation Agreement entered into force on 22 February 2017, when the WTO obtained the two-thirds acceptance of the Agreement from its 164 Members. To benefit from special and differential treatment (SDT), a Member must categorize each provision of the Agreement, as defined below, and notify other WTO Members of these categorizations in accordance with specific timelines outlined in the Agreement:

- **Category A:** Provisions that the Member will implement by the time the Agreement enters into force (or in the case of a least-developed country Member within one year after entry into force)
- **Category B:** Provisions that the Member will implement after a transitional period following the entry into force of the Agreement
- Category C: Provisions that the Member will implement on a date after a transitional period following
 the entry into force of the Agreement and requiring the acquisition of assistance and support for
 capacity building.

Appendix Table 3: Trade Facilitation Agreement: Ratification and Notification of MGC Countries*

				Category			
Country	Ratified on	A		В		C	
Country	Tutilieu on	Notified on	(%)	Notified on	(%)	Notified on	(%)
Brunei	15-12-2015	12-09-2017	91.6	06-09-2017	8.4		0
Cambodia	12.02.2016	-		-	-	-	-
Lao PDR	29.09.2015	17.09.2015	20.8	-	-	-	-
Malaysia	26-05-2015	23-07-2014	94.1	27-11-2017	5.9		0
Myanmar	16-12-2015	27-02-2018	5.5	27-02-2018	9.2	27-02- 2018	85.3
Indonesia	05-12-2017	05-07-2018	88.7	05-07-2018	11.3		0
Vietnam	15.12.2015	31.07.2014	22.9	-	-	-	-
Singapore	08-01-2015	18-06-2014	100		0		0
Thailand	05.10.2015	19.09.2016	91.7	-	-	-	-
Vietnam	15-12-2015	31-07-2014	22.7		0		0
India	22.04.2016	23.03.2016	70.8	23.01.2017	29.2	-	-

Note: *As on 15 October 2020. *Source:* www.tfadatabase.org

The TFA contains provisions for expediting the movement, release and clearance of goods, including goods in transit. It also sets out measures for effective cooperation between customs and other appropriate authorities on trade facilitation and customs compliance issues. It further contains provisions for technical assistance and capacity building in this area. The implementation of this Agreement may help improve transparency, increase possibilities to participate in global value chains, and reduce the scope for corruption. The TFA was the first Agreement concluded at the WTO by all of its Members. All ASEAN countries have ratified the WTO TFA. While most of them have bound their commitments in category A, India has selected both categories A and B.







Webinar ASEAN-India Trade and Value Chains in COVID-19 Era 22 May 2020

KEY RECOMMENDATIONS

The ASEAN-India Centre (AIC) at RIS jointly with the Asian Confluence (AC) organised a webinar titled "ASEAN-India Trade and Value Chains in Covid-19 Era" through online video-conferencing on 22 May 2020. Panellists were from the prominent think-tanks of ASEAN and India. About 60 participants attended, viewed the webinar discussion and took part in the Q&A session. Ambassador Mohan Kumar, Chairman, RIS delivered the Opening Remarks and chaired the webinar. Special Address was delivered by Mr Srinivas Gotru, Joint Secretary (CSSS), Ministry of External Affairs (MEA). Special remarks was given by Dato' Ramesh Kodammal, Co-Chairman, ASEAN-India Business Council (AIBC), Kuala Lumpur. Mr. Sabyasachi Dutta, Director of Asian Confluence gave the Welcome Remarks. Dr. Prabir De, Professor, ASEAN-India Centre (AIC) at RIS made the lead presentation. Mr. Sabyasachi Dutta extended the Vote of Thanks at the end. The major recommendations of the webinar are as follows:

Dr. Mohan Kumar, Chairman, Research and Information System for Developing Countries (RIS), New Delhi

- Dr. Mohan Kumar made his Opening Address and chaired the webinar. Dr. Kumar raised three pertinent issues that he expected the panellists to address such as to what extent the Covid-19 has disrupted the value chain; how long would it take to recover from the economic crisis; and how ASEAN and India would be facing this situation.
- Dr Kumar suggested that there is a need to review of ASEAN-India FTA and also to address the non-tariff barriers.

Dato' Ramesh Kodammal, Co-Chairman, ASEAN-India Business Council (AIBC), Kuala Lumpur

- Covid-19 has a series of implications on health, financing, trade distortion and economic depression for most of the countries. ASEAN and India should cooperate to deal with this complex situation.
- Both ASEAN and India have handled the Covid-19 issue in a better way leading to low spread and low mortality rate.
- Tourism, hotel and transport industries are the most affected due to Covid-19, particularly for the ASEAN countries.

- Both ASEAN and India have introduced several stimulus packages to boost SMEs. However, the stimulus may support the SMEs for the short-term. We need to design a long term strategy to revive the economy.
- ASEAN has attracted huge investment from all across the world. Therefore, ASEAN countries are
 the preferred destinations for the investment that may move out of China. Similarly, India also has
 scope to attract those companies which are leaving China. ASEAN and India should work together
 to enable the production process across smaller ASEAN countries and may re-export the products
 (and services) to India for further augmentation of the production process.
- India should further open the sectors for FDI to attract more investment from ASEAN and other countries.
- ASEAN and India should work together to revive the agriculture sector as it provides jobs and helps to reduce poverty.

Dr. Prabir De, Professor, ASEAN-India Centre (AIC) at RIS, New Delhi

- Both ASEAN and India should continue with a national stimulus package for MSMEs, strengthen
 domestic competitiveness and jointly work for resilient recovery.
- Too much dependence on China has caused disruptions in supply chains. ASEAN and India must work together to re-establish the supply chains.
- ASEAN and India shall work together to attract FDI, particularly those leaving China, and strengthen investment relations between them.
- Further momentum should be added to integration initiatives such as BIMSTEC, ASEAN, MGC, IOR, Indo-Pacific, etc.
- India may consider increasing bilateral and regional development aid in ASEAN though additional Line of Credit (LoC), technical assistance, etc.
- Both ASEAN and India should promote new sectoral opportunities in digital connectivity, health, pharmaceuticals, etc.
- India has actively engaged with ASEAN in response to Covid-19 through senior-level communication, repatriation of stranded people, sharing information and exchange of experts and distribution of medical and pharmaceutical supplies, etc. ASEAN and India may issue a joint declaration on Covid-19, set-up a special fund to mitigate the loss due to Covid-19, arrange currency swap, etc.
- Bilateral FTAs with Australia and New Zealand, Vietnam and Indonesia may generate new trade opportunities, subject to studies and feasibilities (especially we can think of Vietnam)
- ASEAN and India may recast ASEAN-India FTA in goods, services and investment in view Covid-19.
- Both ASEAN and India may initiate B2B Business Facilitation through industry associations and chambers of commerce (e.g. FICCI-AIBC, CII, ASSOCHAM, ICC, EEPC India, FIEO, etc) to promote trade and investment between ASEAN and India.
- Countries have to strengthen institutional connections and share information with health experts, and promote research and development (R&D) in the field of traditional medicines, epidemiology, etc.

Dr. Arpita Mukherjee, Professor, Indian Council for Research in International Relations (ICRIER), New Delhi

- India should engage with multilateral level FTA engagements rather than going for bilateral level
 trade agreement. Industries prefer to have simple processes and uniformity in tariffs and rules of
 origin while trading instead of country-wise differences in the tariffs and rules of origin.
- To attract FDI from East Asian countries like Japan and South Korea, India should diversify the supply chain linkages, relax the labour laws, etc.
- In terms of services agreement, India should engage beyond Mode 4 of services. India should look into the sectors such as e-commerce and encourage start-ups between ASEAN and India.
- The nature of trade flow in post Covid-19 may likely be technology- and health- oriented. Both ASEAN and India may focus on the sectors like healthcare, education, traditional medicine for collaboration.
- Both ASEAN and India should address non-tariff measures like food safety and standard issues to
 ensure trade in quality food products. Harmonization of the food safety and standards would ease
 the barriers to promote trade between ASEAN and India.

Dr. Siddharth Roy, CEO, SR Associates, Mumbai

- ASEAN and India should work together to support agriculture and manufacturing sectors to be more
 competitive and make it export oriented to address the declining trade due to the ongoing pandemic.
- ASEAN and India should cooperate in the IT industry and pharmaceutical sector to gain from
 comparative efficiency in the new export areas, which are based on digital technologies such as
 entertainment, education, tele-medicine, healthcare, medical tourism, etc. Both ASEAN and India
 may attract FDI in the new export areas, if we show the potential and comparative advantage with
 the rest of the world.

Dr. Amita Batra, Professor, Jawaharlal Nehru University (JNU), New Delhi

- Though India managed to control the spread of Covid-19, it is still at the risk of a second wave. India
 may gain from ASEAN experience in terms of management of Covid-19, where some of the ASEAN
 countries have been using advanced communication technology and artificial intelligence in tracking,
 tracing and testing in order to control the spread of virus.
- Both ASEAN and India have announced several stimulus packages for the MSMEs. However, ASEAN
 countries have focused on four sectors such as travel, tourism, MSMEs and agriculture. India may
 look into the packages offered by the ASEAN that help to integrate regional supply chains leading to
 revive the MSMEs. In particular, ASEAN countries have offered income tax deferment, VAT collection
 deals and concessional loans, which India may also offer while reviving the MSMEs.
- ASEAN and India should work together to strengthen and support multilateralism. Both shall also
 consider new norms while reviewing the ASEAN-India FTA by considering the situation of post
 Covid-19, and also consider restructuring the policies of e-commerce, data and data privacy, etc.
- To generate investment opportunities and shift of supply chain, which are likely to move from China to ASEAN and India, India has to further enhance the ease of doing business environment in a significant manner.

Mr. Johnny Chotrani, Country Chair, AIBC, Manila, The Philippines

- The pandemic situation has created an environment to less depend on the external market and be self-reliant. ASEAN and India should strengthen the regional partnership and support the domestic industries to be more competitive in order to compete with other countries.
- Both ASEAN and India should collaborate to bring best practices using digital technology in the trade facilitation measures such as paperless trade.
- ASEAN can learn from India in self-sustaining the production of medical products at cheaper costs.
 India can support ASEAN in terms of research and development in the pharmaceutical industry.
- ASEAN and India may bring a road map for the tourism industry to revive the tourism sector which
 is deeply hurt due to Covid-19.
- ASEAN and India should promote open market, rules-based trading systems and information sharing to face the post Covid-19 challenges.

Dr. Chayodom Sabhasri, Associate Professor, Chulalongkorn University, Bangkok, Thailand

- Given the technological advancement in 3D printing, artificial intelligence, etc., the future industries
 may not be in mass production. Instead, it would be customized products with higher technology in
 the production process to meet the customers' requirements. ASEAN and India can work together
 and support each other in the robotics and information technology and communication (ICT) related
 industries.
- There will be huge business opportunities for SMEs and Start-ups in the post Covid-19, particularly, in the digital connectivity, e-commerce, cross-border delivery services, logistics business, etc. ASEAN and India can work together to create an environment to grab the new opportunities.
- Both ASEAN and India shall promote cooperation in agriculture and agro-based industries. ASEAN
 and India can work together to deepen the value chains in the food processing industry to produce
 premium quality products and supply to the world.
- The situation of Covid-19 scenario would make the country adapt to self-reliance in the essential
 products like food and pharmaceuticals and engage in less value chain activities. This possibly gives
 more opportunities to the local market to replace the import. ASEAN and India should cooperate to
 develop the new technology in order to secure the existing supply chains.
- Future automobiles would be more on electrical vehicles with the usage of less parts and shorter
 value chain linkages. Some of the ASEAN countries and India engaging in automobile industries for
 long with deeply integrated production processes may have to look for gradual transition to cope
 with future requirements. In post Covid-19, both ASEAN and India may have an opportunity to
 attract FDI in the automobile sector to produce electrical vehicles.

Mr. Indronil Sengupta, Country Chair, AIBC, Hanoi, Vietnam

- In post Covid-19, there may not be major restructuring in the supply chain linkages as these are established over a long period of time and backed majorly with trade financing, supported by the Chinese banks. There may be an investment shift from China, but it may move to ASEAN countries, particularly Vietnam due to liberal FDI policies. In addition, Vietnam has a maximum number of FTAs, which may lead to receive more investments and trade opportunities. Similarly, India should also engage with a higher number of bilateral and multilateral trade agreements with both ASEAN and other countries to boost trade and investment.
- Given that India is not part of RCEP, India may consider joining the CPTPP, which is excluding China, and may gain from trade.

Dealing with Non-Tariff Measures (NTMs) between ASEAN and India

1. Introduction

The trade relations between ASEAN and India have made significant progress over the last two decades. The ASEAN-India Free Trade Agreement (AIFTA) in goods, implemented in 2010, has considerably reduced average tariff to almost 80 per cent of the products traded between ASEAN and India, thereby granting higher market access to each other's exports. While the trade between them has grown over time, a large part of the trade potential remains unrealised due to high trade costs in the form of slow and unpredictable goods delivery, cumbersome customs procedures, non-tariff measures (NTMs), etc.¹ The complexities and the application of NTMs have been increasing consistently over the time period. Most often NTMs are less transparent and add to the costs of doing business in the importing country. Exporters often consider NTMs as barriers to trade since compliance to standards makes additional cost and time to exports, which also negatively affect the competitiveness of the products of the exporting countries.²

While NTMs act as barriers to trade, it also maintains quality and health standard with a legitimate purpose, to protect domestic food and environment by imposing several technical measures. This is highly apparent during the current Covid-19, where several countries including ASEAN and India have notified several NTMs related to Covid-19 to protect health and quality standards of the products procured to meet domestic consumption. NTMs, however, has serious implications on trade and difficult for the firms, particularly SMEs to cope up with the change in the measures both in short and long terms due to lack of data availability, complexities and policy sources from various government regulatory agencies, etc.

In view of the above this chapter looks at the market access barriers arising from NTMs between ASEAN and India. It also attempts to measure the incidence of NTMs and assesses their impact on trade between ASEAN and India both at country and sectoral levels. The chapter explores the regulatory environment between ASEAN and India and suggests policy recommendations to strengthen the trade relation between them.

The chapter is arranged as follows, Section 2 discusses the trends of market access between ASEAN and India. Section 3 discusses the incidence of NTMs between ASEAN and India. Section 4 analyses the sector-wise impact of NTMs between ASEAN and India trade. Section 5 discusses ASEAN and India's NTMs related to Covid-19 and its effect on trade. Section 6 briefly explores the regulatory environment between ASEAN and India. Section 7 outlines the policy recommendations and the Way Forword, and the concluding remarks are presented in Section 8.

2. Trends in Market Access between ASEAN and India and the Importance of NTMs

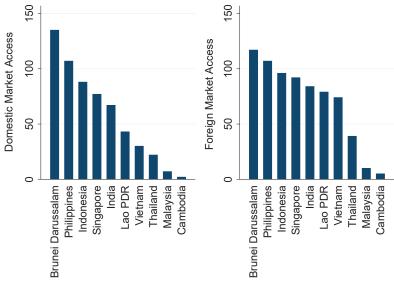
The trade relations between ASEAN and India have made significant progress over the last two decades. ASEAN-India trade has grown substantially since 1990s. The ASEAN-India Free Trade Agreement (AIFTA) has boosted the trade from US\$ 51 billion in 2010 to US\$ 91 billion in 2019, wherein India's export to ASEAN was US\$ 37 billion and import from ASEAN was US\$ 59 billion (see Figure 1). While the trade between them has grown over time, due to stringency and complexities of trade-restrictive policies, some of the sectors and products are denied market access in both ASEAN and India (Figure 2). In terms of domestic market access, Brunei, the Philippines, Indonesia, Singapore are relatively difficult to access, compared to India and other ASEAN countries, whereas, most of the ASEAN countries and India almost have a similar experience of difficulties to access foreign markets.

120 India's Exports India's Imports AI-FTA 100 80 US\$ Billion 60 40 20 2004 2003 2015 2014 2013 2012 2012 2010 2010 2009 2008 2006 2006 2000 2001 2002 1999 .994 .995 997 .998

Figure 1: Trends of India's Trade with ASEAN

Source: Direction of Trade Statistics (DOTS), IMF.





Notes: (1) Domestic market access captures the extent and complexity of a country's tariff protection as a result of its trade policy. (2) Foreign market access captures the tariff barriers faced by a country's exporters in destination market.

Source: Based on World Economic Forum, Global Enabling Trade Index (ETI) Report Database (2016).

It is evident from the Figure 3 that both Effectively Applied (AHS) and Most Favoured Nation (MFN) tariffs show a declining trend and have almost settled at the range of 2 to 8 per cent, whereas the accumulation of the number of NTMs imposed by ASEAN on India at HS 6-digit level shows an increasing trend. For instance, in 1995, ASEAN imposed NTMs on about 3167 products at HS 6-digit level, which has increased to 13972 products at HS 6-digit level. The trends of weighted AHS, MFN tariffs and NTMs show that tariffs have declined since the 1990s, whereas NTMs have increased over time.

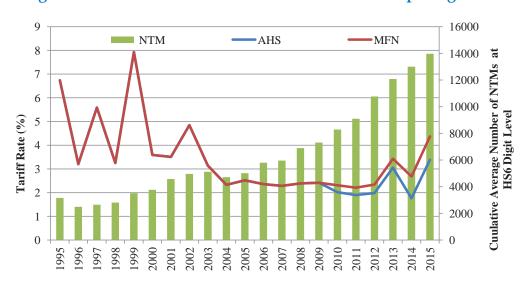


Figure 3: Tariff vs. Non-Tariff Measures: ASEAN Imposing on India

Source: Authors' calculation based on WITS and UNCTAD (2017) database

Figure 4 shows an upward tariff trend of upto 40 per cent till 2002 and then drops to 17 per cent 2003 onwards and remain at the same rate till 2015. On the other hand, India imposing NTMs on imports from ASEAN shows a gradual rise in the trend till 2010 and shifts upward from 2011 onwards to upto 5000 products at HS 6-digit level. Overall, both Figures 3 and 4 show shrinking tariffs and increasing number of NTMs, thereby indicating that the effectiveness of tariff liberalisation. However, due to increasing consumer demand for higher-quality and safer products and also to protect the domestic market, both ASEAN and India have been imposing increasing number of NTMs against each other.

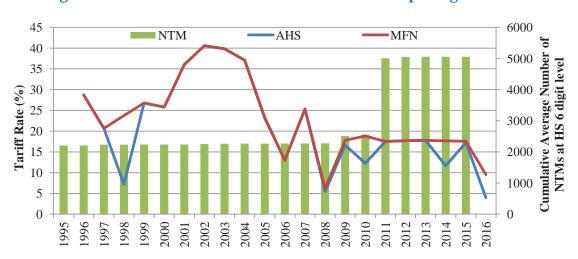


Figure 4: Tariff vs. Non-Tariff Measures: India Imposing on ASEAN

Source: Authors' calculation based on WITS and UNCTAD (2017) database.

Many countries have been using NTMs to restrict domestic market access in the selected sectors or products for protecting the domestic industries.⁴ Several studies have found that falling tariffs have exposed the importance of other obstacles to trade, particularly NTMs which are increasingly considered as most significant for trade.⁵ However, it could also have an adverse effect on trade and increase the cost of trading across borders. UNESCAP (2017) has reported that new trade-restrictive measures introduced globally are accounted at 56 per cent, whereas it was about 55 per cent at the Asia-Pacific level. Therefore, in addition to tariffs, an increase in NTMs would cause a serious impact on trade between ASEAN and India, if not addressed.

3. Incidence of NTMs between ASEAN and India

The effect of NTMs imposed by importing country affects both the value and quantity of products exported. Besides, some of the products also encounter more than one type of NTMs on the same product, which has the effect on ASEAN and India trade. Table 1 shows various types of NTMs imposed by ASEAN against India and India against ASEAN on their respective exports. The total number of NTMs imposed by ASEAN against India is almost doubled that of India imposing NTM against ASEAN. For instance, including bilateral measure, ASEAN's NTMs such as SPS (2037), TBT (3377) and QCM (862) are imposed against India's export. On the other hand, including bilateral measure, India's NTMs such as SPS and TBT are in the range of 1500, imposed against ASEAN. However, India has about 169 bilateral SPS measures which are imposed against ASEAN. Relatively ASEAN imposes higher number of NTMs against India in comparison to India's NTMs against ASEAN in almost all the products.

Table 1: Chapter-wise NTMs Imposed between ASEAN and India*

(numbers)

	India Impo Against		ASEAN Impos Against	
	All Members	Bilateral	All Members	Bilateral
Sanitary and Phytosanitary Measures (SPS)	1466	169	2016	21
Technical Barriers to Trade (TBT)	1481	1	3368	9
Pre-Shipment Inspection and other formalities (PSI)	43	-	196	3
Non-Automatic Licensing, Quotas, Prohibitions and Quantity-Control Measures other than for SPS or TBT Reasons (QCM)	201	2	855	7
Price-Control Measures, Including Additional Taxes and Charges (PCM)	42	-	319	2
Export-Related Measures	407	16	1353	9
Other Measures	23	-	61	2

Note: *Data till 5 October 2020

Source: Authors compilation from TRAINS, UNCTAD.

To assess the incidence of NTMs between ASEAN and India both at country and sectoral levels, the study has used frequency index, coverage ratio and prevalence ratio, respectively. The Frequency Index (FI) describes percentage share of number of products exported that are affected by NTMs imposed by importing countries. In other words, FI accounts only for the presence or absence of an NTM and

summarises the percentage of products to which one or more NTMs are applied. The Coverage Ratio (CR) describes percentage share of trade value affected by NTMs for the importing country on total trade value; therefore, it provides a measure of the impact of NTMs on overall exports. Prevalence ratio indicates the average number of types of NTMs imposed at each product level at HS 6-digit level. The detail data and definition of the incidence of NTMs are given in Appendix 1.

Figure 5 shows the country-wise incidence of NTMs imposed by ASEAN on imports from India and India on ASEAN. The measures of frequency index and coverage ratio are illustrated in blue and red bar, respectively. The indicator of prevalence ratio (i.e., average number of NTM types) is depicted in black triangle. On an average, both ASEAN and India apply some forms of NTMs for most of the products at HS 6-digit level. These statistics are simple averages across countries, and, thus, have to be interpreted as a representative of the use of NTMs for the average country.

120 Average Number of NTMs (In Nos.) Frequency Indx and Coverage Ratio (%) 1.0 100 0.8 80 0.6 60 0.4 40 20 0.0 Brunei Indonesia Cambodia Malaysia Philippines Singapore Thailand Vietnam Lao PDR Myanmar India ASEAN Imposing NTM against India India [mposing Frequency Index ■ Coverage Ratio ▲ Prevalence Ratio NTM against **ASEAN**

Figure 5: Country-wise Incidences of NTMs between ASEAN and India, 2016

Source: Authors' calculation based on UNCTAD (2017) database.

Broadly, the incidence of NTMs varies considerably, not only across regions but also more so between countries. Among ASEAN countries, Cambodia, Lao PDR, the Philippines, Singapore and Vietnam have scored almost close to 100 per cent of frequency index and coverage ratio. It means that the NTMs imposed by these countries have affected India's export to ASEAN in almost all the products at HS 6-digit level, both in terms of volume and value of exports. Particularly, the Philippines have imposed highest number of NTMs at product level, compared to other ASEAN countries. For instance, on an average, the Philippines imposes 1.12 types of NTMs on imports from India, followed by Vietnam (0.53) and Cambodia (0.42).

In the case of India, 90 per cent of the products are covered by NTMs as its calculated frequency index and coverage ratio scores are very high. India imposes smaller number of NTMs against ASEAN, which is about 0.55. In terms of frequency index, Thailand, Malaysia, Myanmar and Brunei cover almost 60 per cent of the imported products that face NTMs when imported from India. However, in terms of coverage ratio, almost 80 per cent of imported goods from India are affected by NTMs in ASEAN market.

Figures 6 and 7 show the sector-wise incidences of NTMs imposed by ASEAN and India against each other. The incidences of ASEAN imposing NTMs on India, represented by both FI and CR, vary widely

across sectors. FI and CR for agricultural sectors including live animals, fats and oil, processed foods are close to 100 per cent, suggesting that almost all the products that are exported by India are affected by NTMs in ASEAN. Moreover, in terms of types of NTMs imposed, agriculture products face higher NTMs (about 1.8 times), compared to other sectors. In the case of India, barring few, the coverage of FI and CR is close to 100 per cent for most of the sectors. The average number of NTM types imposed by India on imports from ASEAN is in the range of 1.2 to 1.8 for agricultural products, whereas, for the rest of the sectors, same is close to 0.4 per product.

Frequency Index ■ Coverage Ratio ▲ Prevalence Ratio Frequency Index and Coverage Ratio 2 1.8 1.6 1.4 1.2 120 100 Prevalence Ratio (No.) 80 60 0.8 0.6 0.4 0.2 40 20 0 Paper Minerals Products Wood Textile Miscellaneous goods Art & Antique Live Animals Vegetable Products Chemical Products Raw hide & skins Footwear Stone and Cement James & Jewellery Base Metals Instruments Arms & Ammunition Processed Food Rubber & Plastic Machinery & Electrical Transport Equipment Fats & Oil

Figure 6: Sector-wise Incidences of NTMs Imposed by ASEAN on India, 2016

Source: Authors' calculation based on UNCTAD (2017) database.

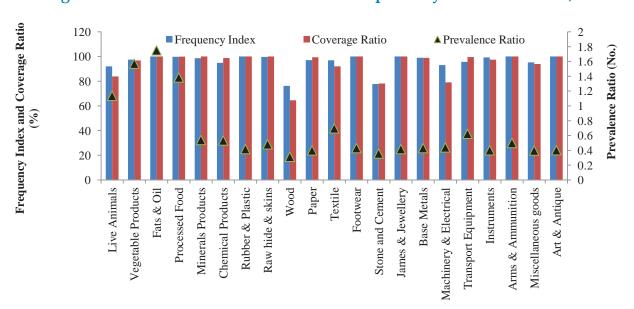


Figure 7: Sector-wise Incidences of NTMs Imposed by India on ASEAN, 2016

Source: Authors' calculation based on UNCTAD (2017) database.

Figure 8 shows the average number of NTMs from different chapters affecting HS 6-digit products. Both the Philippines and Vietnam have imposed more than 3 types of NTMs on a single product at HS 6-digit level. For instance, the Philippines has imposed 3 types of NTMs to about 1000 products at HS 6-digit level and 4 types of NTMs to about 4000 products at HS 6-digit level. In case of Vietnam, 3 and 4 types of NTMs are imposed on about 3500 and 1500 products at HS 6-digit level, respectively.

5000 Number of Products at HS 6 Digit Level 4000 3000 2000 1000 0 India Indonesia Myanmar Philippines Brunei Cambodia Malaysia Singapore **Thailand** Lao PDR Vietnam ASEAN Imposing NTM Against India India Imposing NTM ■2 types ■3 types ■4 and Above types Against **ASEAN**

Figure 8: Number of Products Affected by NTM Chapters (at HS 6-digit level), 2016

Source: Authors' Calculations based on UNCTAD (2017) Database.

Singapore has imposed one type of NTM on 3000 imported products from India at HS 6-digit level, followed by 2 and 3 different types of NTMs against 1000 products, each at HS 6-digit level. Similarly, Lao PDR has imposed one type of NTM on 3300 products and 3 different types of NTMs on 1200 products at HS 6-digit level. ASEAN countries like Brunei, Indonesia, Cambodia, Myanmar, Malaysia and Thailand have imposed one type of NTM against about 1000 products imported from India at HS 6-digit level. Cambodia has imposed both two different types of NTMs on about 2000 products, followed by three different types of NTMs against about 1000 products at HS 6-digit level, respectively. Both Indonesia and Malaysia have imposed two different types of NTMs on about 1000 products at HS 6-digit level, respectively. In sum, Vietnam, the Philippines, Singapore, Cambodia and Lao PDR have imposed higher types of NTMs on imports from India, whereas, Brunei, Indonesia, Myanmar, Malaysia and Thailand have imposed fewer types of NTMs on India.

In the case of average number of NTM across chapters imposed by India on ASEAN, on an average, about 4000 products face 3 different types of NTMs. About 1000 products face more than 4 different types of NTMs that are imposed by India against imports from ASEAN.

Overall, among ASEAN countries, Cambodia, Lao PDR, the Philippines, Singapore and Vietnam have imposed more NTMs on India's export. Particularly, the Philippines has imposed highest number of NTMs at each product level, compared to other ASEAN countries. On the other, India's NTMs have been affecting exports of ASEAN countries like Thailand, Malaysia, Myanmar, Brunei, respectively. However, India imposes lesser number of NTMs against ASEAN. In terms of average number of different chapters

of NTMs affecting the importing country, there has been a variation among ASEAN countries in imposing different types of NTMs on India. Both ASEAN and India are highly restrictive. Most of the ASEAN countries impose up to three different types of NTMs on imports from India, whereas India imposes at least three different types of NTMs to almost all the products on imports from ASEAN countries.

4. Sector-wise Impact of Tariff and NTMs on ASEAN-India Trade

Countries often engaging in tariff liberalisation either by preferential or free trade agreements use NTMs as a tool to restrict market access. On the other, countries are also using NTMs and other traditional trade policy measures such as tariff to regulate imports. Countries use restrictive trade policies such as high tariff as well as high NTMs more frequently to protect their domestic market from the foreign competition. Therefore, NTMs and tariffs may tend to work towards the same direction when the products are protected by both NTMs and high tariffs. Although several NTMs may result from the nature of the products traded, when these are accompanied by a high tariff, it may indicate the intent to use NTMs complementing tariffs in order to further insulate domestic industries from foreign competition.² It is also evident from the Section 3 that the incidence of NTMs is more prevalence at the sector level in both ASEAN and India. This section attempts to understand how effectively the country has been imposing NTMs in addition to the tariff policies.

Table 2 shows the sector-wise impact of ASEAN's tariff and NTMs on imports from India under ASEAN-India FTA. The second column on sector-wise share of India's export clearly shows that India's export to ASEAN was majorly on mineral products (20.4 per cent), live animals (14.5 per cent), chemical products (10.8 per cent), machinery and electrical (9 per cent), transport equipment's (9 per cent), vegetable products (7.2 per cent) and textile products (5 per cent) of total India's export to ASEAN in 2016, respectively. Though average bound tariff is in the range of 20 to 30 per cent against India's export, the MFN rates are considerably low between 3 to 10 in most of the sectors and applied tariffs are even further low in the range of 2 to 7 per cent due mainly to ASEAN-India Free Trade Agreement (AIFTA).³

Under the AIFTA, some of the products in specific sector are still under exclusion and sensitive lists, which are excluded from trade liberalisation. Columns (7) and (8) show the sector-wise distribution of average number of products falling under exclusion and sensitive lists at HS 6-digit level. It clearly shows that both exclusion and sensitive lists are mostly for agricultural and processed foods, chemical products, rubber, textiles, base metals, machinery and electrical products. In terms of sector-wise share of India's export, column (9) shows that barring few sectors, almost 20 to 40 per cent of India's export to ASEAN are covered under exclusion and sensitive list which also has impacted India's export to ASEAN. For instance, shares of India's export routed through exclusion and sensitive lists on India's total exports are higher in agricultural and processed goods, textile, leather, rubber and plastic goods, chemicals, etc. Further, it also clearly shows that India has huge export potential in the exclusion and sensitive list items.

Table 2: ASEAN's Tariff and NTMs on Imports from India, 2019

	Trade Value# (2019)			riff Rat	te##	ASEAN-India FTA\$			NTM ^{\$\$}	
	(sı	s Export				Average Number of Products at HS 6-Digit Level			at HS	fected by
Major Sector	India's Export (US\$ Billions)	Sector-wise Share of India's Export (%)	Bound Tariff (%)	Applied Tariff (%)	Most Favoured Nation (%)	Exclusion List (EL) (Nos.)	Sensitive List (SL) (Nos.)	Share of India's Export in EL and SL (%)	Average Number of NTMs at HS 6-digit level (Nos.)	Share of India's Exports Affected by ASEAN NTMs (%)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
Live Animals	2.49	8.4	26	6	8	19	26	23.5	171.0	87.6
Vegetable Products	1.32	4.5	29	6	9	24	36	19.2	218.0	60.4
Fats & Oil	0.06	0.2	24	3	5	7	3	26.9	41.0	97.4
Processed Food	0.69	2.3	36	5	10	22	34	38.2	182.0	92.9
Minerals Products	6.23	21.1	20	2	3	3	4	1.5	126.0	66.6
Chemical Products	4.08	13.8	19	2	3	24	48	14.3	603.0	80.9
Rubber & Plastic	0.69	2.4	23	5	8	18	40	38.9	148.0	65.2
Leather Products	0.16	0.5	28	6	8	2	9	21.8	63.0	75.8
Wood	0.01	0.0	21	4	8	0	6	0.5	53.0	77.9
Paper	0.17	0.6	21	4	6	3	10	1.5	106.0	43.0
Textile	1.16	3.9	20	5	9	25	117	29.4	566.0	60.5
Footwear	0.06	0.2	28	7	11	3	10	11.9	34.0	66.1
Stone and Cement	0.35	1.2	25	5	8	10	20	31.1	85.0	56.1
Base Metals	3.83	13.0	26	5	7	60	60	0.0	380.0	74.1
Machinery & Electrical	3.30	11.2	22	4	6	24	32	14.5	561.0	55.2
Transport Equipment	3.11	10.6	17	3	5	20	13	9.9	105.0	69.3
Instruments	0.40	1.4	25	10	14	0	14	8.7	153.0	78.4

Source: Authors' calculation based on several sources, # India's export data collected from Export-Import Data Bank, ## Tariff rate data are collected from WITS database, \$-ASEAN-India FTA is collected from Ministry of Commerce, Government of India and \$\$ NTM data is collected from UNCTAD database.

In addition, rise of NTMs has nullified the effect of AIFTA on trade. Unlike tariff, the NTMs have differential market access impact, based on the quality of the product and the perceived impact from the products entry. Column (10) shows that the sector-wise average number of NTMs imposed by ASEAN on imports from India at HS 6-digit level are relatively higher for the agricultural and food processing products, chemical products, textiles, base metals, machinery and electrical equipments. Almost more than 60 per cent of India's export is affected by NTMs imposed by ASEAN on India.

Table 3: India's Tariff and NTMs on Imports from ASEAN, 2019

		e Value# 019)	Tar	iff Ra	te##	ASI	EAN-Ind	lia FTA\$	N	Γ M ^{\$\$}
					(%) u			mber of S 6-Digit I	NTMs [0s.)	cports VTMs
Major Sector	ASEAN's Export (US\$ Billions)	Sector-wise Share of ASEAN's Export (%)	Bound Tariff (%)	Applied Tariff (%)	Most Favoured Nation (%)	Exclusion List (EL) (Nos.)	Sensitive List (SL) (Nos.)	Share of ASEAN's Export in EL and SL (%)	Average Number of NTMs at HS 6-digit level (Nos.)	Share of ASEAN's Exports Affected by India's NTMs (%)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
Live Animals	0.04	0.1	107	25	29	39	6	8.6	210	83.8
Vegetable Products	0.96	1.8	97	26	33	108	6	22.1	248	96.8
Fats & Oil	4.88	9.4	211	53	48	27	2	99.8	45	100.0
Processed Food	0.55	1.1	101	41	35	69	2	31.8	191	100.0
Minerals Products	11.08	21.4	39	3	4	13	9	68.1	143	100.0
Chemical Products	5.00	9.6	42	6	8	14	111	19.8	747	98.8
Rubber & Plastic	3.35	6.5	36	8	9	15	90	42.1	210	100.0
Leather Products	0.09	0.2	28	6	9	0	13	10.7	68	100.0
Wood	0.59	1.1	37	7	9	0	0	0.0	55	64.5
Paper	0.56	1.1	36	8	9	0	6	0.9	141	99.4
Textile	0.95	1.8	31	7	10	75	163	24.2	769	92.0
Footwear	0.21	0.4	40	8	10	1	24	87.0	49	100.0
Stone and Cement	0.31	0.6	39	7	10	1	12	7.3	123	78.2
Base Metals	4.74	9.1	40	7	11	0	0	0.0	51	100.0
Machinery & Electrical	13.40	25.8	35	6	9	6	7	0.1	554	98.8
Transport Equipment	2.71	5.2	27	5	7	14	41	5.9	705	79.0
Instruments	1.24	2.4	35	12	13	15	6	32.7	128	99.5

Source: Authors' calculation based on several sources, # India's export data collected from Export-Import Data Bank, ## Tariff rate data are collected from WITS database, \$-ASEAN-India FTA is collected from Ministry of Commerce, Government of India and \$\$ NTM data is collected from UNCTAD database.

Table 3 shows the sector-wise India's tariff and NTMs on imports from ASEAN. Column (2) on sector-wise share of ASEAN's export clearly shows that ASEAN was majorly exporting mineral products (23.4 per cent), transport equipment (23 per cent), oil products (14 per cent), chemical products (10 per cent), machinery and electrical (7 per cent) of total ASEAN's export to India in 2016, respectively. Compared to ASEAN's AVE and MFN tariff, India's AVE and MFN tariffs are slightly higher in the range of 7 to 10 per cent, except agricultural products. Columns (7) and (8) clearly show that India has liberalised most of the products under AIFTA leaving few in exclusion and sensitive lists, except specific sector like textiles, agriculture and chemicals, rubber and plastics. In terms of the sector-wise share of ASEAN's export

to India, column (9) shows that almost 100 per cent of fats and oil export to India are under exclusion list, followed by footwear (87 per cent), mineral products (68 per cent), rubber and plastic (42 per cent) and processed foods (31 per cent), respectively, which are covered under exclusion and sensitive lists. However, the shares of those products in ASEAN's export to India are very marginal. Therefore, sectors covered under exclusion and sensitive lists have less impact on ASEAN's actual export to India, but more impact on ASEAN's potential export to India. Column (10) shows that barring few, sector-wise average number of NTMs imposed by India on ASEAN's export at HS 6-digit level has affected most of the sectors close to 100 per cent.

This suggests that most regulated sectors are also experiencing higher tariffs. The presence of both NTMs and traditional trade policy indicators such as tariffs are visible in both Tables 2 and 3 at sectoral level. More generally, countries are imposing higher tariffs on those products that also have a larger NTM impact, thereby indicating that countries are protecting their domestic sectors with both NTMs and tariffs, despite tariff liberalisations.

5. NTMs in Response to Covid-19 Imposed by ASEAN and India

The Covid-19 has infected several million people across the world and caused thousands of deaths. Many countries have implemented stringent measures such as partial or full lockdown of the economy, border closures which has significant disruptions to productions, trade flows and other economic activities. Both ASEAN and India have imposed several NTMs that have huge implications for the firms in meeting the additional costs. For example, due to the lockdown, both public and private enterprises functioning with their operations with less manpower would face difficulties in meeting the newer NTM requirements. It would disrupt the movement of goods and over-logging in the ports and delay the exports. Since January 2020, ASEAN countries such as the Philippines, Thailand, Indonesia and Vietnam have imposed different types of NTMs, especially SPS, TBT, Import Licensing and Anti-dumping practices. Besides, India has also imposed mostly TBT (54) against all countries and about 91 measures since January 2020 (see Table 4).

Other Measures Countervailing Rules of Origin Anti-Dumping Market Access Subsidies and Safeguards Measures icensing Country Import Brunei Cambodia Indonesia Lao PDR Malaysia Myanmar The Philippines Thailand Vietnam Singapore India

Table 4: NTMs Imposed by ASEAN and India since January 2020

Source: Authors' compilation based on WTO.

During the Covid-19, both ASEAN and India have initiated several policy measures both trade restrictive and liberalising measures, especially on exports and imports of critical medical equipment, food and basic supplies to protect the domestic supply and also to procure for domestic consumption to mitigate negative shock from Covid-19 outbreak (see Table 5).

Among ASEAN countries, Indonesia, Thailand, Vietnam and Malaysia have issued the highest number of trade measures, each with five or more measures; followed by Cambodia, Myanmar, the Philippines and Singapore each with two or more measures; and Brunei and Lao PDR with one measure. Most of the ASEAN countries have mix of both trade restrictive and liberalising measures against medical and food products. Most of the trade measures imposed by ASEAN countries are trade restrictive measures. In case of India, it has imposed about 16 measures against medical and food products, both trade restrictive and liberalising measures (see Table 5).

Table 5: Type of Measures related to Covid-19 by ASEAN and India, 2020

			Trade N	e Res Ieası		ive	Tra		ibera asure	llising es	Tot	al
			Export Prohibition/Licensing/ Permit Requirement	Import Ban	Tariff Increase	Certification requirements	Import Ban/Suspension	Tariff Reduction	Extension of Import Licensing	Requirement/Suspension of Certification	Total Restrictive Measures	Total Liberalising Measures
	Brunei	Medical Products					√					1
	Cambodia	Food Products	√								1	2
	Camboula	Medical Products	\checkmark								1	
	Indonesia	Food Products				$\sqrt{}$				\checkmark	3	5
	maonesia	Medical Products	√							$\sqrt{}$	3	
	Lao PDR	Medical Products										1
—	Malaysia	Medical Products	$\sqrt{}$								3	2
ASEAN	Myanmar	Food Products	$\sqrt{}$								1	3
4SE	Wiyaninai	Medical Products									1	3
7	The Philippines	Food Products	\checkmark								2	2
	The Finippines	Medical Products								\checkmark		
	Singapore	Medical Products							\checkmark			2
	Thailand	Food Products	\checkmark								2	3
	Thanand	Medical Products	\checkmark									3
	Vietnam	Food Products	\checkmark								4	2
	vietilaili	Medical Products	\checkmark								4	
	India	Food Products	V	$\sqrt{}$							7	9
	IIIuIa	Medical Products					$\sqrt{}$				/	9

Note: Detail tables are given in Appendix 2.

Source: Authors' compilation based on WTO and ITC.

During the Covid-19 period, majority of the trade restrictions are related to essential products, such as medical products (personal protection equipment like masks and gloves), vital medicines (pharma products and hand sanitisers), medical supplies, and food products. ASEAN countries are the largest exporters of personal protection equipment products in the world, mostly from Malaysia, Thailand and Vietnam. ASEAN countries have imposed trade restrictive measures on both medical and food products to protect domestic supply and imposed liberalising measures by eliminating import duties and sales tax to procure more medical and PPEs products for domestic consumption. India has also imposed series of measures to protect domestic supply and also to procure basic medical products for domestic consumption.

6. Regulatory Environment Dealing NTMs in ASEAN and India

Countries have increasingly imposed stricter technical regulations not only to maintain product standards but also to restrict trade. And if the standards and technical regulations vary from country to country and requirement of conformity assessment procedures becomes burdensome, it leads to technical barriers in both domestic market and importing countries. Therefore, lack of standardisation can create barriers to trade instead of removing them and confuse markets instead of creating confidence. It may also lead to inadequate support for regulation.⁵ In this regard, institutional framework for quality infrastructure is a must for global trade and has a great social concern regarding consumers and environmental protection. Both ASEAN and India have taken series of measures and initiations to harmonise standards and technical regulations and mutual recognition agreements (MRAs) at the sectoral level and country level.

ASEAN has initiated several work programmes for NTMs, that include:

- ASEAN has adopted WTO Agreement on Import Licensing Procedures, and developed national guidelines that are compatible with the WTO Licensing Agreement.
- ASEAN has initiated to collect the NTM database in terms of compilation, identification and verification of NTMs by ASEAN member countries. UNCTAD, I-TIP and ERIA are the international institutions responsible to build comprehensive NTM database for 10 ASEAN countries.
- As part of the NTB work programme, ASEAN member countries have agreed to phase out a few of the NTMs identified as NTBs.
- ASEAN has the Coordinating Committee for ATIGA (CCA)⁶ to deal with the trade- related issues, particularly responsible for collecting and identifying NTBs from the database of NTMs.
- ASEAN Secretariat constituted a body on ASEAN Consultative Committee on Standards and Quality (ACCSQ) to undertake harmonisation process and to implement mutual recognition agreement (MRAs) with international bodies. Its major objective is to harmonise national standards with international standards and practices, develop and harmonise technical regulations, and to create an efficient and non-duplicative conformity assessment procedures (see Box 1).
- ACCSQ Prepared Foodstuff Products Working Group (ACCSQPFPWG) is the main body currently
 engaged in regulatory harmonisation and convergence in relation to the food sector. Its priority areas
 include: transparency of prepared foodstuffs regulatory regime among ASEAN member countries;
 MRAs; technical infrastructure for prepared foodstuffs; and food safety standards for prepared
 foodstuffs (see Box 1).

Box 1: ASEAN Consultative Committee on Standards and Quality (ACCSQ)

The ASEAN Consultative Committee on Standards and Quality, ACCSQ was established in 1992 with the aim to facilitate the removal of Technical Barriers to Trade (TBT) among ASEAN member countries to expand intra- and extra- ASEAN trade. It is the key body responsible for coordinating work on standards and mutual recognition, accreditation and conformity assessment and sector-specific harmonisation efforts. ACCSQ is supported by three working groups and eight product working groups (*see* Table 1). The eight product working groups have priority sectors for integration, namely: automotive products, electronics, healthcare, rubber-based products, prepared food stuffs.

Box Table 1: Working Groups and Committees and ACCSQ

Sl. No.	Working Groups Assisting ACCSQ
1	WG1-Working Group on Standards and MRAs
2	WG2-Working Group on Accreditation and Conformity Assessment
3	WG3-Working Group on Legal Metrology
	Product Working Groups (PWGs)
4	JSC EE MRA – Joint Sectoral Committee for ASEAN Sectoral MRA for Electrical and Electronic Equipment
5	ACC - ASEAN Cosmetic Committee
6	PPWG - Pharmaceutical Product Working Group
7	PFPWG - Prepared Foodstuff Product Working Group
8	APWG - Automotive Product Working Group
9	TMHSPWG - Traditional Medicines and Health Supplements Product Working Group
10	MDPWG - Medical Device Product Working Group
11	WBPWG - Wood-Based Product Working Group
12	RBPWG – Rubber-Based Product Working Group

Notes: MRAs - Mutual Recognition Agreements; GRP - Good Regulatory Practice; ISO - International Standards Organisation; IEC - International Electro-technical Commission; ASEM - Asia-Europe Meeting; UNECE - UN Economic Commission for Europe.

Source: ASEAN Secretariat, Jakarta.

ASEAN Harmonisation of Standards: ACCSQ WG3 was set up in 1998 for harmonisation of standards within the region. The main recommendation is to harmonising National Standards to International Standards for priority products in order to enable the elimination of trade barriers arising from differences in National Standards. It covered 20 priority products covering 58 International Standards for harmonisation. Table 2 gives the list of the 20 products. Later, ACCSQ WG3 covered harmonisation of 72 Safety and 10 EMC Standards.

Box Table 2: Priority Sectors under ACCSQ WG3

Air-conditioners	Loudspeakers	Parts of TV and Radio	Cathode Ray Tubes
Refrigerators	Video Apparatus	Capacitors	Diodes
Monitors & Keyboard	Telephones	Resistors	Mounted Piezo- electric crystal
Motors & Generators	Radio	Printed Circuits	Rubber condoms
Inductors	Television	Switches	Medical Gloves

Source: ASEAN Secretariat, Jakarta.

6.1 ASEAN Working Group on SPS and TBT

The effects of SPS and TBT measures on trade are also often related to compliance costs, lack of technology, weak infrastructure and poor export services, all of which may impede developing countries in meeting. The cost of compliance is often higher in low -income countries as infrastructure and export services are more expensive or need to be outsourced abroad. In this regard, ASEAN has been undertaking series of measures to harmonise standards to promote inter-ASEAN trade and progress towards ASEAN single market.

ASEAN Consultative Committee on Standard and Quality (ACCSQ) has been undertaking the Working Group on the Sanitary and Phytosanitary (SPS) measures, a body under the Senior Officials of the ASEAN Ministers of Agriculture and Forestry (SOM AMAF), which has action plans on NTB elimination in crops, livestock and fisheries. It involves compiling information on NTMs affecting agricultural products and developing MRA of SPS standards to liberalise intra-ASEAN trade in agriculture products. Box 2 provides summary of progress in ASEAN agreement on harmonisation of agricultural products' standards based on the international standards from Codex, International Plant Protection Convention (IPPC) and World Organisation for Animal Health (OIE).

Box 2: Harmonisation in ASEAN Agriculture Products

ASEAN has agreed on the following harmonisation:

Codex

ASEAN Task Force on Codex (ATFC) agreed on the harmonisation of:

Codex General Standards for the Labelling of Prepackaged Foods,

Codex General Standard for the Labeling of Food Additives;

Codex General Guidelines on Claims

Codex Guidelines on Nutrition Labelling

International Plant Protection Convention (IPPC)

The ASEAN Working Group on Crops (ASWGC) agreed on the Harmonisation of International Standards for Phytosanitary Measures (ISPMs) Standards Number:

No. 6 (1997) - Guidelines for surveillance

No. 7 (2011) - Phytosanitary Certification System

No. 10 (1999) - Requirements for the establishment of pest free places of production and pest free production sites

No. 12 (2011) - Phytosanitary Certificates

No. 13 (2001) - Guidelines for the notification of non-compliance and emergency action

No. 15 (2002) - Guidelines for regulating wood packaging material in international trade

No. 17 (2002) - Pest reporting No. 19 (2003) - Guidelines on lists of regulated pests

No. 20 (2004) - Guidelines for a phytosanitary import regulatory system

No. 23 (2005) - Guidelines for inspection

No. 24 (2005) - Guidelines for the determination and recognition of equivalence of phytosanitary measures No. 25 (2006) - Consignments in transit

No. 28 (2009) - Phytosanitary treatment for regulated pests

No. 31(2008) - Methodologies for sampling consignments

World Organisation for Animal Health (OIE)

ASEAN Working Group on Livestock (ASWGL) agreed for harmonisation of OIE Guidelines for disease reporting (Section 1.1-1.5), import-export risk analysis (Section 3.1), surveillance section (Section 3.4)

Source: ASEAN Secretariat, Jakarta.

ASEAN has established eight working groups along the lines of the Codex working groups, whose mandate is the development of principles and standards relating to food control: ASEAN Sectoral Working Group on Livestock (ASWGL); ASEAN Sectoral Working Group on Fisheries (ASWGF); ASEAN Sectoral Working Group on Crops (ASWGC); ASEAN Experts Group on Food Safety (AEGFS); ACCSQ – Prepared Foodstuff Product Working Group (ACCSQ-PPWG); ASEAN Task Force on Codex (ATFC); ASEAN Working Group on Halal (AWG Halal); and Ad-hoc Working Group on Food Irradiation (AWGFI). These working groups have, so far, produced the ASEAN Harmonised Food Control and Safety Requirements and Principles, which are largely adaptations of the Codex standards and principles.⁸

Table 6: Summary of Activities Addressing TBTs in Priority Sectors

	0. 1 1/2 1 1			
Sectors	Standard / Technical Requirements	Technical Regulations	Conformity Assessment	
Automotive	Harmonisation of national standards and technical requirements (mandatory and voluntary) with UNECE Regulations of the 1958 Agreement	Development of a single regulatory regime in ASEAN for the automotive sector is not in the work programme of the Automotive Product Working Group	ASEAN MRA for type Approval of Automotive Products.	
Cosmetics	Harmonisation of technical requirements for limits of cosmetic ingredients	ASEAN Cosmetic Harmonised Regulatory Scheme (Schedule B ASEAN Cosmetic Derivative)	ASEAN Cosmetics Testing Laboratory Network.	
Electrical and electronic equipments	Harmonisation of national standards and technical requirements (mandatory and voluntary) with ICE standards	ASEAN Harmonised Electrical and Electronic Equipment Regulatory Regime	ASEAN Sectoral MRA for Electrical and Electronic Equipment.	
Medical devices	Harmonisation of national standards and technical requirements with ISO standards for medical devices	ASEAN Medical Device Directive (draft stage)	Conformity Assessment and evaluation of medical devices are within the purview of national level. No harmonised regional approach for conformity assessment of medical devices.	
Pharmaceutical	Adoption of the ASEAN Common Technical Requirements and ASEAN Common Technical Dossier for product placement supported by guidelines for its uniform application in the region	Development of a single regulatory regime in ASEAN for the pharmaceutical sector is not in the work programme of the Pharmaceutical Product Working Group	ASEAN Sectoral MRA for GMP inspection of Manufacturers of Medicinal Products	
Prepared food stuff	Harmonisation of national standards and technical requirements for limits for pesticide residues, fruits, animal vaccines and products, food safety requirements on food additives and contaminants	Development of a single regulatory regime in ASEAN for the Pharmaceutical sector is not in the work programme of the Prepared Food stuff Product Working Group	ASEAN Food Testing Laboratory Network	

Table 6 continued...

Rubber- based products	Harmonisation of national standards with ISO standards	Development of a single regulatory regime in ASEAN for the rubberbased products sector is not in the work programme of the Rubber-based Product Working Group	Exchange of information and transparency in available accredited conformity assessment bodies for rubber-based products
Traditional medicines and health supplements	Harmonisation of national standards and technical requirements with harmonised requirements for product placement and support supported by guidelines for its uniform application in the region	ASEAN Regulatory Framework for TMHS (draft stage)	Conformity Assessment and evaluation of traditional medicine and health supplements are within the purview of the national level

Source: Pasadila (2013)

ACCSQ has formulated different committees and working groups across several sectors such as automotive, cosmetics, electrical and electronic equipment, medical devices, pharmaceuticals, food processing and traditional medicines and health supplements to harmonise the national standards and international technical requirements related to TBT measures among ASEAN (see Table 6).

6.2 MRAs in ASEAN

The ASEAN initiation of harmonising and standardisation of the NTMs has brought major improvement in several sectors and moved towards eliminating NTB. Table 3 presents a brief overview of MRAs in ASEAN. It shows that ASEAN has signed 4 MRAs, which are being implemented (see Table 7).

The MRA for electrical electronic equipment, which provides for the acceptance of test reports and certification, was signed in 2000 and was implemented in 2004. The ASEAN MRA on Good Manufacturing Practice (GMP) for pharmaceuticals was signed in 2009. This MRA provides for inspection to be carried by local inspection bodies. The ASEAN cosmetic directive harmonised technical requirements including definitions for cosmetics, allowable ingredients, etc. was implemented in 2008. The ASEAN Harmonised Regulatory Regime for Electrical and Electronic Equipment (AHEER), which harmonised technical regulations and conformity assessment procedures, was signed in 2005.

6.3 ASEAN-Wide Self-Certification Scheme

To further facilitate intra-ASEAN trade, a 'self-certification' scheme has been initiated. This mechanism allows certified exporters to self-certify the origin of their exports to enjoy preferential tariffs under the ATIGA. The operationalisation of the ASEAN-Wide Self-Certification Scheme (AWSC) implemented in 20 September 2020 across the region to facilitate trade and to comply with ATIGA rules of origins requirements (see Box 3).

6.4 NTM Regulations in India

In India, the product standards are being managed by the Bureau of Indian Standards (BIS), a National Standards Body of India established under an Act of Parliament. BIS is the sole entity responsible for development and formulation of standards for 14 industries and also has the status of Indian Standards. BIS is also the member body to International Organisation for Standardisation (ISO) and International Electro-technical Commission (IEC). The BIS follows the Code of Good Practice for the preparation, adoption and application of standards.

Table 7: Mutual Recognition Agreements (MRAs) in ASEAN

MRA	Description	Status
MRA for electrical equipment	 - Acceptance of test reports based on APLAC MRA and IECEE Certification Body (CB)Scheme; - Acceptance of certification based on PAC MRA and IECEE CB; - Supports implementation of AHEER 	Signed in 2000 and implemented in 2004
ASEAN Harmonised Regulatory Regime for Electrical and Electronic Equipment (AHEEER)	- Harmonised technical regulations based on essential safety requirements for electrical and electronic equipment (EEE); - Listed standards deemed to meet essential requirements (based on IEC standards); - Harmonised conformity assessment procedures (based on ISO/IEC guides 53, 67, & 28); - Registration of EEE and designation of conformity assessment bodies (CABs)	Signed in December 2005; ASEAN members are in the process of transposing national legislation to implement AHEEER
ASEAN Harmonised Cosmetic Regulatory Scheme	- Harmonised technical requirements, including definitions for cosmetics, permitted ingredients and preservatives;	Implemented in January 2008
Pharmaceutical Good Manufacturing Practice (GMP)	 Adopts GMP inspection of manufacturers of medicinal products based on PIC/S; Inspection can be carried out by competent local inspection bodies; Mutual recognition of inspection 	Signed in 2009

Notes: APLAC - Asia Pacific Laboratory Accreditation Cooperation is a cooperation of accreditation bodies in Asia Pacific that accredit laboratories, inspection bodies and reference material producers; IECEE - International Electro-technical Commission (IEC) system for conformity testing and certification of electrotechnical equipment and components; PAC - Pacific Accreditation Cooperation; PIC/S Scheme - Pharmaceutical Inspection Convention and Pharmaceutical Inspection Cooperation Scheme. PIC is a cooperative arrangement between government health authorities, a more formal counterpart of PIC Scheme. PIC main purpose is for the mutual recognition of inspections, and it was established *via* treaty.

Source: ASEAN Secretariat, Jakarta.

BIS has been designated by India as the WTO-TBT Enquiry Point, while the Department of Commerce in the Ministry of Commerce and Industry is responsible for implementing and administering WTO Agreement on Technical Barriers to Trade. A product certification scheme under the Bureau of Indian Standards Act (1986) and its accompanying regulations and rules are operated by the BIS. Products meeting the requirements of relevant Indian standards are granted by the Bureau of Indian Standard Mark (ISI). ISI certification is voluntary on most of the products, but is mandatory for 66 products related to health and consumer safety. Both imported and domestically produced goods on this list must conform to certification requirements. The BIS also operates other certification schemes such as the Hazard Analysis and Critical Control Points (HACCP), the Environmental Management Systems (EMS), the Food Safety Management System (FSMS), certification of Public Service Organisations for Service Delivery, according to IS 15700:2005.

In March 2016, the Government of India had passed a revised bill to replace a 30-year-old BIS Act. The bill established BIS as a national body and empowered the Centre to authorise any other agency having necessary accreditation for the purpose of conformity assessment against Indian standards.

In India, voluntary standards are exclusively developed by the national standards body. Besides development and formulation of Indian Standards, BIS is involved with product certification, quality system certifications and testing, and consumer affairs. BIS is the only organisation in India authorised operating quality certification plans under the Act of parliament.

BIS comprises representatives of industry, consumer organisations, scientific and research bodies, professional organisations, technical institutions, ministries, and members of parliament. Presently, BIS has more than 800 technical committees and involved more than 14000 experts and stakeholders engaged in standards formulation. BIS has so far developed more than 19000 standards. Apart from BIS, there are other Standards Developing Organisations (SDOs) in the country, which formulate standards in specific sectors. There are some SDOs in the country that develop standards in their specific domain without any overlap with standardisation work carried out by BIS. Such sectors include railways, roads and bridges, drugs and pharmaceuticals. However, there are other sectors where BIS and other SDOs carry out standardisation work in parallel. These include Directorate of Marketing & Inspection (Agmark), Food Safety & Standards Authority of India (FSSAI), Automotive Research Association of India (ARAI), Ministry of Defence, etc.

To consolidate and unify legal regime pertaining to the regulation of food safety and standards, the Food Safety and Standards Authority of India (FSSAI) was established under the Food Safety and Standards Act in 2006 as a statutory body for laying down standards for articles of food and regulating manufacturing, processing, distribution, sale and import of food¹⁰.

FSSAI is the nodal point for WTO-SPS Enquiry Point in India. In India, SPS standards are also governed and enforced through a number of laws and agencies. The Prevention of Food Adulteration Act (1954) is the main law on food safety and quality. Imports and quarantine are regulated through additional legislation, such as the Livestock Importation Act (1898), which was most amended recently in 2001; the import of plants and plant materials is regulated under the provisions of the Plant Quarantine (Regulation of Import into India) Order 2003, issued under the Destructive Insects and Pests Act (1914). Implementation of these Acts and subordinate legislation has been carried out by different central government ministries, making the system relatively complex.

6.5 Compliance and Accreditation in India

Indian government and country's regulators are increasingly seeking accreditation as a means of checking compliance regulations through third party conformity assessment bodies. The Quality Council of India (QCI) was set up as a non-profit autonomous society, registered under the Societies Registration Act XXI of 1860 to establish an accreditation structure in the country (Box 2). QCI has also established National Accreditation Board for Testing and Calibration Laboratories (NABL) to involve in third-party assessment of the technical competence of testing including medical and calibration laboratories, proficiency testing providers and reference material producers (Box 3). The Petroleum and Natural Gas Regulatory Board (PNGRB) was the first regulator to rely on accredited inspection bodies, and uses NABCB accredited inspection bodies to check compliance with its regulatory framework; the Food Safety and Standards Authority of India (FSSAI), the food regulator, has notified NABCB accredited bodies to verify compliance to its regulatory requirements of GMP/GHP. Accreditation represents an excellent option to regulators to rely on the third party verification of compliance to their regulations and supplements their efforts.

Many voluntary schemes also utilise/prescribe NABCB accredited certification/inspection bodies. The Department of AYUSH, Ministry of Health and Family Welfare jointly with QCI has launched a

voluntary certification scheme for AYUSH products, which prescribes that AYUSH products should be certified by NABCB accredited product certification bodies. The National Medicinal Plants Board (NMPB) has launched a similar scheme jointly with QCI for certifying medicinal plants based on good agricultural and collection practices, which would use NABCB accredited product certification bodies. The QCI Ready Mixed Concrete (RMC) Plant Certification Scheme, launched jointly with the Ready Mix Concrete Manufacturers Association (RMCMA), shall also rely on NABCB accredited bodies.

Box 3: ASEAN-wide Self-Certification Scheme (AWSC)

The Rules of Origin (ROO) refers to the criteria used to determine the national source of a product for the purpose of eligibility in granting preferential tariffs. The AEC Blueprint 2025 stipulates that ROO implemented by AMS should be 'simple, business-friendly and trade-facilitative' so as to benefit the region's trade, in particular the participation of MSMEs to encourage them to expand, upgrade, and deepen their linkages within the region. To further facilitate intra-ASEAN trade, a 'self-certification' scheme is also being initiated. This mechanism allows certified exporters to self-certify the origin of their exports to enjoy preferential tariffs under the ATIGA. The operationalisation of the ASEAN-Wide Self-Certification Scheme (AWSC), which was first mooted in 2009, will minimise burdens associated with administrative compliance and decrease transaction costs.

While 2012 was set as the initial timeline for the operationalisation of the scheme, this schedule had to be deferred several times due to the differences in the certification requirements of the AMS. In order to address these differences, and for AMS to become a region-wide self-certification scheme, two Self-Certification Pilot Projects were initiated and implemented in parallel with the authorised Certificate of Origin Form D regime. In 2017, the key differences between these two pilot projects were resolved. The signing of the Protocol to Amend the ATIGA to allow for the AWSC Scheme by all AMS in January 2019, followed by the endorsement by the economic Ministers at the 33rd AEM-AFTA Council Meeting of the amended ATIGA Operational Certification Procedure in September 2019, as well as ongoing efforts by AMS to ratify the Protocol to Amend the ATIGA to allow for the AWSC Scheme, are paving the way for the operationalisation of the AWSC Scheme by March 2020.

The ASEAN-wide Self-Certification Scheme (AWSC) is a trade facilitation initiative that allows exporters who have demonstrated their competence to comply with ATIGA rules of origin requirements, known as "certified exporters", to self-certify the origin status for their goods to be eligible for ATIGA tariff preferences. With the implementation of the AWSC, the Certified Exporters are now able to make out Origin Declaration to all of the ASEAN Member States. The AWSC scheme has been implemented since 20 September 2020 across the region.

Source: ASEAN Secretariat, Jakarta.

6.6 MRAs in India

Indian government has entered into several mutual recognition agreements (MRAs) at multilateral and bilateral levels. At the multilateral level, India is signatory to MRAs such as Asia-Pacific Laboratory Accreditation Cooperation (APLAC), International Laboratory Accreditation Cooperation (ILAC)¹¹ and Pacific Accreditation Cooperation (PAC). These MRAs primarily deal with laboratory accreditation (Box 3). At the bilateral level, India's MRAs include those with Singapore and Sri Lanka, where the parties have agreed to facilitate bilateral trade in select commodities, such as telecom equipment, agricultural goods, electrical and electronic equipments, steel and steel products and pharmaceutical products, etc.

6.7 Customs Reform

The Single Window system is a crucial implementation of trade facilitation measure for goods clearance at the country's points of entry and exit. As part of the 'Ease of Doing Business' initiatives, the Central Board of Excise & Customs, Government of India, has taken up implementation of the Customs Single Window project to facilitate the 'Trading across Borders' in India. The Single Window allows importers and exporters, the facility to lodge their clearance documents online at a single point only. Required permissions, if any, from other regulatory agencies are obtained online without the trader having to approach these agencies. The Single Window Interface for Trade (SWIFT) reduces interface with Governmental agencies, and dwell time and cost of doing business. CBEC had already executed major projects to automate customs clearance processes and provide electronic data interchange (EDI) with all agencies.

The major import regulatory agencies in India are involved in issuing clearances or 'No Objection Certificates' (NoC) for live consignments. These agencies, namely, Food Safety (FSSAI), Drug Controller, Plant Quarantine, Animal Quarantine, Textile Committee and Wild Life Crime Control Bureau, are concerned with the vast majority of cases, where the NoCs are required for Customs' clearance.

By requiring all participating government agencies to publish standard operating procedures and timelines, the Committee of Secretaries, headed by the Cabinet Secretary, has set benchmarks and goals for all related regulatory agencies. To work collaboratively with agencies and industry stakeholders, port and central level Customs' Clearance Facilitation Committees (CCFCs) have been established to simplify and streamline their interagency procedures and documentary requirements for import and export of cargo. Later, as signatory of the WTO's Trade Facilitation Agreement, National Trade Facilitation Committee was set up.

Indian customs have introduced several path-breaking measures to facilitate trade during the Covid-19. Chapter 8 of this report presents a detailed account of such measures.

7. Policy Recommendations

Firms in both ASEAN and India, particularly SMEs, face several barriers on behind-the-borders such as lack of information on specific regulations, lack of coordination and coherence of regulatory regimes, complexities in following certain requirements. This has reflected in the pandemic situation, where both ASEAN and India have imposed several NTMs and regulations in a short duration create uncertainty among business firms, which may disrupt the trade between them. This section presents some recommendations to improve the regulatory process related to NTMs between ASEAN and India.

- Simplification of regulatory procedures: ASEAN countries and India should agree to work
 towards simplifications of regulatory procedures. For example, single window clearance, IT-enabled
 mechanisms, simplifications of license, permit procedures, etc. will help improve the productivity
 of firms.
- **Single Window System for NTMs:** Each ASEAN country and India should have a single portal to access all NTM-related regulations and procedures and also it should be available in English language.
- Simplification trade procedures: Adopt Information Technology-enabled services to make trade
 procedures simple to avoid delay in export time and reduce trade costs associated with cumbersome
 administrative procedures for meeting NTM requirements. Similarly, promote paperless trade
 procedures for prompt clearance.
- Engage private-public dialogue: Both ASEAN and India should actively engage in private-public
 dialogue both formally and informally to troubleshoot and improve trade-related issues related to
 NTMs and procedural obstacles.

- Regulatory Coherence between ASEAN and India: Need to have regulatory coherence between ASEAN and India to carry out discussions on the activities based on regulatory cooperation in terms of dialogues, meetings, information exchanges, including for SMEs related issues; training programmes and other assistance; and strengthening cooperation and relevant interaction amongst government regulatory bodies, private sector and other voluntary / non-profit organisations and associations. The deliberation should help improve conformity assessment capabilities and facilitate process of mutual recognition of each other's accreditation certificates.
- Streamlining NTMs between ASEAN and India: There is a need for regional agreement between
 ASEAN and India to facilitate trade by streamlining NTMs through harmonisation of standards and
 regulations and mutual recognition of conformity assessment and reduction of border procedures.
 India and ASEAN should form a taskforce involving relevant agencies and representatives from
 the private sector to review scope and implementation of its existing regulations with a view to
 streamlining regulatory framework.
- Harmonisation of Standard and Technical Regulations between ASEAN and India: Conformity
 assessment procedures can raise barriers when there is duplication of costs in different markets for
 essentially identical tests against the same or equivalent standards. Therefore, both ASEAN and
 India should harmonise standards and mutually recognise declarations, conformity assessment
 certificates, testing and licensing that would help minimise the burden of additional trade costs for
 firms, especially SMEs.
- Mutual Recognition Agreement between ASEAN and India: Given the number of national and international standards and technical regulations, which have grown across the sectors, there is a need for bilateral and multilateral negotiations by creating and strengthening discipline around the sectoral mutual recognition agreements (MRAs), particularly in dealing with the SPS and TBT measures. ASEAN and India should identify potential products of interests and build cooperation to work in areas where difficulties in recognising or validating certificates of testing and inspections, and strengthen use of international standards, mandatory documentation of equivalence procedure and adopting Codex consignment rejection guidelines, standards in English language and agreement on self-certification. Indian accreditation authorities should enter into MRAs with similar agencies in the ASEAN countries. This is important especially when it is found that several SPS and TBT measures are based on the national standards. This would facilitate lower transaction cost as well as hassle-free trade and would also help strengthen production networks across borders between ASEAN and India.
- Active Participation in ACCSQ: ASEAN Consultative Committee on Standard and Quality (ACCSQ)
 has been undertaking the Working Group on SPS and TBTs, committed to harmonisation of standards
 and technical regulations for the priority sectors towards ASEAN single market. In this regard,
 India should monitor development of ACCSQ Working Group on product standards and engage in
 cooperation with ASEAN to bring in the required standards in the domestic market. India should
 also disseminate development of harmonisation of standards and technical regulations within
 ASEAN, and how Indian SMEs and large enterprises should be adopting and improving standards
 accordingly to promote export from India.
- Initiate Common Information Portal between ASEAN and India: India trade portal, India standards
 portal and single window interface for facilitating trade (SWIFT) are intended to increase transparency
 and facilitate smoother trade among the countries. The portal, developed by the Ministry of Commerce
 and Industry, Government of India, along with other partners provides access to all trade-related
 regulations under MFN and various other agreements. These portals also allow access to rules of

origin criteria, procedural and documentary requirements for export and import, and information on best practices for trade facilitation. There should be a common portal for both India and ASEAN for traders to get comprehensive information on NTMs, tariff, rules of origin and others for regional trade. Regular updates of information under the common portal would help traders. The common portal would also encourage agencies and others stakeholders for reporting changes or suggestions.

Disseminate the NTM information and provide training and networking for SMEs: ASEAN and
India should create a forum with sector-specific business associations to help develop capacity of SMEs
as they face barriers to exports and find difficulties in capturing markets due to lack of knowledge
about issues such as rules of origin and export requirements as well as inadequate product standards.
This can be done through training on rules of origin and custom procedures; guidance and assistance
on improving production process and quality; and knowledge-sharing through networking and
consultation.

8. Concluding Remarks

The trade between ASEAN and India has grown over time and so does the rise in NTMs. The impact of NTMs on trade has been phenomenal. Firms often consider that NTMs as barriers to trade and compliance to NTMs requirements cause additional costs and time to export, in addition to the negative effect on the competitiveness of their products exported. This Chpater also shows that the during the Covid-19 outbreak both ASEAN countries and India have imposed several NTMs. Therefore, easing the barriers to trade would certainly be leading to strengthen not only the economic relations between ASEAN and India but also their global integration.

Some of the ASEAN countries and India more often have limited capacity to meet the NTM requirements that are imposed by partner countries and other regulatory practices which have influenced the firm's engagement with international trade. SMEs are more often affected by the increasing stock and flow of regulations and may, in turn, lack the adaptive capacity and comply with the regulations as large enterprises. India and ASEAN should form a task force involving relevant agencies and representatives from the private sector to review the scope and implementation of its existing regulations with a view to streamlining its regulatory framework. This would help to minimise the burden of additional trade costs for firms, especially SMEs.

ASEAN and India should identify the potential products those are of interests and should build cooperation to work in the areas where difficulties in recognising or validating certificates of testing and inspections and strengthen the use of international standards, mandatory documentation of equivalence procedure and adopting Codex consignment rejection guidelines, standards in English language and agreement on self-certification. Indian accreditation authorities should enter into mutual recognition agreements (MRAs) with similar agencies in ASEAN countries. This would facilitate lower transaction costs as well as hassle-free trade and helps to strengthen production networks across borders between ASEAN and India.

ASEAN has initiated several work programmes to improve the NTMs and constituted an ASEAN Consultative Committee on Standards and Quality (ACCSQ) to undertake the harmonisation process and to implement mutual recognition agreement (MRAs) with international bodies. Streamlining NTMs through harmonisation of standards and regulations and mutual recognition of conformity assessment and reduction of border procedures is important for facilitating preferential market access between ASEAN and India. Only then any regional trade agreements can promote trade and investment activities.

Endnotes

- Refer UNCTAD (2014)
- Refer, WTO (2012).
- 3. AIFTA was signed on August 13, 2009 and it became operational from January 01, 2010. It is one of the significant agreements for India with 10 ASEAN member countries towards integrating with the Southeast Asia. ASEAN-India FTA covers almost 90 per cent of the tariff line which has a preferential market access to reduce the tariff upto zero tariffs for those tariff lines covered under the Normal Track-1 and Normal Track-II of the AIFTA tariff schedule by the members to the Agreement. There are other tariff lines which are under exclusion list; sensitive list and highly sensitive list which are excluded from the AIFTA agreement.
- 4. Refer, Chandra et al. (2020).
- 5. Refer, CII (2015, 2016).
- 6. Interim Working Group for the Common Effective Preferential Tariff (CEPT) and AFTA (ITWG) was reconstituted as CCA to supports the work of the AFTA Council; the AFTA Council, in turn, supports the work of the ASEAN Economic Ministers (AEM). The ASEAN Secretariat supports all three ASEAN bodies the ITWG/CCA, SEOM, and AEM.
- 7. Refer, UNCTAD (2014).
- 8. Refer, Osiemo (2017).
- 9. Bureau of Indian Standards Act, 1986, revised as The Bureau of Indian Standards Act, 2016.
- The Act seeks to repeal eight different food-related legislations in India. It also seeks to establish the Food Safety and Standards Authority of India, which will lay down science-based standards for food items, regulate the manufacture, storage, distribution, sale and import of food item, and ensure the availability of safe and wholesome food for human consumption.
- ILAC is the international authority on laboratory and inspection accreditation, with a membership consisting of accreditation bodies and affiliated organisations throughout the world. Its website www.ilac.org provides a range of information on laboratory and inspection accreditation, as well as the location of its members including its MRA signatories world-wide. ILAC promotes the increased use and acceptance by industry as well as government of the results from accredited laboratories and inspection bodies, including results from accredited organisations in other countries.
- 12. All import declarations were brought in under the ambit of a single import declaration and the online clearance facility with effect from 1st April 2016.
- "sensitive product categories" and "technical regulations" were further subcategorised according to the objectives of the measure (for example, protection of safety, human health, animal health and life, plant health, environment and wildlife).
- In 1994, it began to collect and classify non-tariff barriers (NTBs) according to a customised Coding System of Trade Control Measures (TCMCS). This coding system classified tariffs, para-tariffs and non-tariff measures (NTMs) into over 100 sub-categories. Concurrently, a Trade Analysis and Information System (TRAINS) database was developed by UNCTAD, which subsequently grew into the most complete collection of publicly available information on NTBs. Later, in collaboration with the World Bank, TRAINS became accessible to researchers through the World Integrated Trade Solution (WITS) soft ware application. The TRAINS database contains a brief description of each NTB, affected or excluded countries and footnotes on the exact product coverage, where available.
- There are various approaches for identifying the importance of NTMs and assessing their effects on international trade, such as simple inventory measures, computation of price gaps and the estimation of ad valorem equivalents.

References

- AIC. 2019. Non-Tariff Measures (NTMs): Evidence from ASEAN-India Trade. ASEAN-India Centre at RIS, New Delhi, 2020.
- Chandra, A. C., Mujahid, I. and Mahyassari, R.K. 2020. *Trade Measures in the Time of Covid-19: The case of ASEAN*, ASEAN Policy Brief, No. 03. July 2020.
- CII. 2015. Standard Conclave 2015: Role of Standards in International Trade: Challenges, Opportunities & Isues, Confideration of Indian Industry, New Delhi.
- CII. 2016. Standard Conclave 2016: Challenge of Standards and Technical Regulations, Confideration of Indian Industry, New Delhi.
- Osiemo, O. 2017. Food Safety Standards in International Trade: The Case of the EU and the COMESA. Routledge Publications, London. pp. 1-229.
- Pasadilla, G. O., Wang, T., and Duval, Y. 2013. Non-Tariff Measures in ASEAN.
- UNCTAD. 2014. Non- Tariff Measures to Trade: Economic and Policy Issues for Developing Countries. United Nations Conference on Trade and Development (UNCTAD), Geneva, United Nation. Available at: https://unctad.org/system/files/official-document/ditctab20121_en.pdf
- UNESCAP. 2017. *Asia-Pacific Trade and Investment Report*, 2017, Bangkok, https://www.unescap.org/publications/asia-pacifi-trade-and-investment-report-2017
- WTO. 2012. World Trade Report 2012: B. An Economic perspective on the use of non-tariff measures. World Trade Organization (WTO), Washington DC. Available at: https://www.wto.org/english/res_e/booksp_e/anrep_e/wtr12-2b_e.pdf

Data and Methodology

The secondary data on NTMs are collected from the Trade Analysis and Information System (TRAINS) database, which was developed by UNCTAD. UNCTAD has comprehensive database on NTMs at sub-classification level¹³ by Harmonised System (HS) at the 6-digit level for most of the countries at the bilateral level. In this database, NTMs are classified based on Coding System of Trade Control Measures (TCMCS)¹⁴, which has distinguished 16 chapters of NTMs. This database covers data for 57 (reporter) countries for the period 1920 to 2015. However, the database lacks data for continuous period and does not cover complete sub-categories of NTMs for all the countries. Therefore, NTMs data collected from UNCTAD may have missing information in terms of detailed coverage of NTMs for some periods. UNCTAD has also cautioned that the data is based on an obsolete classification, which does not adequately and accurately reflect new forms of NTMs (UNCTAD, 2015).

While there are different ways to measure the incidence of NTMs¹⁵, this study has widely used techniques such as frequency index, coverage ratio and prevalence ratio to assess the impact of NTMs between ASEAN and India. To identify and assess the importance of NTMs and their effects on international trade, the study employed three simple inventory-based measures: the frequency index and the coverage ratio.

Frequency Index accounts only for the presence or absence of an NTM, and summarises the percentage of products i to which one or more NTMs is applied. The frequency index (F_j) of NTMs imposed by country j is calculated as:

$$F_j = \left[\frac{\sum D_i M_i}{\sum M_i}\right]. 100$$

where D_i is a dummy variable taking the value equal to one if one or more NTMs are in place and M_i is a dummy variable equal to one if there are imports of product i.

Coverage Ratio measures the percentage of trade subject to NTMs for the importing country. It shows the importance of NTMs on overall imports. The coverage ratio (C_i) for the importing country j is given by:

$$C_j = \left[\frac{\sum D_i V_i}{\sum V_i}\right]. 100$$

where V_i is the value of imports in product i and D is defined as above. However, frequency index and coverage ratio do not take into account the possibility of more than one type of NTM being applied to the same product. In practice, a large number of products have more than one regulatory measure applied to them. To measure prevalence of NTMs, prevalence ratio approach is employed.

Prevalence Ratio indicates the average number of NTMs affecting the imported product. It accounts whether more than one NTM is applied to the same product (which is not captured by frequency index and coverage ratios). The prevalence ratio (P_i) is given by:

$$P_j = \left[\frac{\sum N_i M_i}{\sum M_i}\right]$$

where N_i is the number of NTMs and M_i is as above.

Appendix 2: Type of Measures Related to Covid-19 Imposed by ASEAN and India

			Trade Re	Trade Restrictive Measures	STITES			Trade Liberal	Trade Liberalising Measures	
			Export Prohibition/Licensing/ Permit Requirement	Import Ban	Tariff Increase	Certification requirements	Import Ban/ Suspension	Tariff Reduction	Extension of Import Licensing	Requirement/ Suspension of
	Brunei	Medical Products					Personal hygiene			Certification
	-	Food Products	Rice, Fsh				0 /			
	Cambodia	Medical Products	Masks							
		Food Products				Live Animals (Pet animals and Mammals)				Sugar, Flour, onions and garlic
	Indonesia	Medical Products	Ethyl alcohol, raw materials for masks, personal protective equipment, medical supply products, sanitisers,					Medical supply products		Mask and Personal protective equipment
	Lao PDR	Medical Products						masks, soaps, other medical equipment		
	Malaysia	Medical Products	Masks					personal protective equipment, medical supply, face masks		
NY		Food Products	Rice							
YSE	Myanmar	Medical Products						Medical supply products		
	Ē	Food Products	Rice	Poultry meat	Petroleum products					
	ı ne Philippines	Medical Products						Healthcare equipment and supplies		Animal Industry Issuances
	Singapore	Medical Products						Medical, hygiene, pharmaceutical and agricultural products	Hand sanitisers, Masks, Thermometers, Protective gear	
		Food Products	Eggs							
	Thailand	Medical Products	Masks					Medical supply products		
	Vietnam	Food Products	Rice, Wild animals and products thereof							
		Medical Products	Masks, Pharmaceutical Products							
		Food Products	Onions, Rice	Military Equipment					Iron and steel products	
	India	Medical Products	Certain diagnostic instruments, apparatus, and reagents, hydroxychloroquine drugs,medical supply product, masks, ventilators, textile raw materials for mask production, medicaments, drugs				Medical ventilators	Medical supply products, medical or surgical instruments and apparatus		

Source: Authors' compilation based on WTO Notification.

7

E-Commerce and Digital Connectivity: Strengthening India-ASEAN Collaboration

1. Introduction

Digital integration and adoption of new technologies have been the basis of growth of India and the ASEAN countries in the era of fourth industrial revolution (IR 4.0). The two economies are emerging as fast adopters of digitalisation (UNCTAD, 2019) and some of the key drivers include favourable demographics, urbanisation, rising income levels, rising internet penetration, proliferation of new technologies and digital tools, and availability of skilled workforce (KPMG and FICCI, 2019). Today, India and the ASEAN are fastest growing e-commerce markets, and the growth has been fueled by services sector liberalisation, penetration of broadband and smart phones, growth of startups, along with changes in consumer shopping habits and preferences (UNCTAD, 2019; Chen, 2020). With the outbreak of the Coronavirus disease (Covid-19) in the year 2020, the need for lockdown and social distancing has led to even faster adoption of e-commerce, which has now become an essential service. The pandemic has fast-tracked the process of online delivery of services such as education and healthcare. The governments in India and ASEAN have implemented online clearance processes to help businesses.

One of the important benefits of digital connectivity and e-commerce channels is to link the small and medium enterprises (SMEs) to global markets at a low cost (see Rahayu and Day, 2015; Choe, 2016). India has around 10 million SMEs, contributing 23 per cent towards the gross domestic product (GDP) and accounting for over 80 per cent of manufacturing and services sectors. In ASEAN, the SMEs constitute around 50 per cent of the combined GDP of the region. Studies show that digital technology and e-commerce can help farmers to directly access their markets and lead to higher price realisation. Digital technology also helps to ensure product traceability from farms to the consumers (International Trade Centre, 2015; Mukherjee et al., 2019). E-commerce has a lower cost of entry as compared to offline stores/businesses. It also has a lower cost of infrastructure and maintenance. Technology helps government to have evidence-based, data-driven policies and fast-track the clearance processes, leading to ease of doing business. E-commerce helps consumers access and compare a wide range of products and services, purchase from any location and at any time as per their convenience, and get the product delivered to the place of their choice (OECD, 2019).

India's digital economy is projected to be US\$ 1 trillion by 2025, constituting around 18-23 per cent of the GDP (Ministry of Electronics and Information Technology and McKinsey, 2019). Prior to the Covid-19 outbreak, India's digital economy has generated around US\$ 200 billion annually. This is likely to increase with the pandemic. In 2019, value of digital transactions was around US\$ 53.83 billion, and it has been projected to reach US\$ 69.16 billion in 2020. The numbers of users were around 523 million for

e-commerce transactions and 152 million for mobile point of sale (POS) payments.³ India had a smartphone penetration rate of 35 per cent in 2018, an increase of 19 per cent from 2014 (GSMA Intelligence, 2019). The country has achieved 4G network coverage of more than 90 per cent. However, there are some gaps in digitalisation. For example, the fixed broadband subscriptions per 100 inhabitants were only 1.34 in 2018, far below the global average of 15.51.⁴

The digital economy of ASEAN constitutes around 7 per cent of its GDP and with digital integration across its member countries, and it is projected to be US\$ 1 trillion by 2025. E-commerce is predicted to grow above 10 per cent, accounting for roughly 13 per cent of total retail market by 2030. Although the growth varies across ASEAN member countries, most of them are seeing a high double-digit growth. For example, in Indonesia and Vietnam, the growth is over 40 per cent annually (Google and Temasek, 2019). In 2018, total transaction of digital payments in ASEAN stood at US\$ 73 billion (Chen, 2020). Most of the ASEAN economies had a smartphone penetration rate above 20 per cent in 2018, with Vietnam (53 per cent) and Indonesia (43 per cent) recording the highest growths from 34 per cent and 21 per cent, respectively since 2014 (GSMA Intelligence, 2019). While the average number of fixed broadband subscriptions per 100 inhabitants was at 9.23 in 2018, there were wide differences across the member countries, from 27.97 in Singapore to 0.24 in Myanmar.

India and ASEAN are among the top importers of e-commerce, while countries such as China and the United States (US) are among the top exporters. India's e-commerce market was valued at US\$ 38.5 billion by volume in 2017, and is estimated to reach US\$ 165.5 billion by 2025, while the ASEAN market is estimated to reach a volume of US\$ 90 billion by 2025 (KPMG and FICCI, 2019). Within ASEAN, Indonesia's e-commerce market has increasing rapidly and is estimated to reach US\$ 46 billion by 2025 from US\$ 1.7 billion in 2015.

India is growing as a startup destination, with cities such as Bengaluru being among the global top 20 startup hubs. As of February 1, 2020, India had 27,916 registered startups, one of the highest in the world. ⁹ The ASEAN has more than 2400 startups. ¹⁰ While Singapore is a start-up, other cities in Indonesia, Malaysia and Vietnam are trying to become vibrant technology hubs.

At the policy level, ASEAN was the first region in the developing world to adopt a harmonised legal framework for e-commerce with the 'E-ASEAN Framework Agreement', launched in 2000. The ASEAN Economic Community (AEC) Council endorsed the 'ASEAN Digital Integration Framework Action Plan (DIFAP) 2019-2025' in October 2019, where six priority areas to promote digital integration were identified.¹¹ These include (a) facilitating seamless trade through reliable physical infrastructure and favorable trade policies, (b) protecting data while supporting digital trade and innovation, (c) enabling seamless digital payments and extending financial inclusion, (d) broadening the digital talent base by designing digital skill roadmaps in priority sectors, (e) fostering entrepreneurship by assisting digital micro, small and medium enterprises (MSMEs), and (f) designating a body to coordinate different areas of this framework. The key elements of the DIFAP are in line with the AEC Blueprint 2025, ASEAN Information and Communications Technology (ICT) Masterplan 2020, the Master Plan on ASEAN Connectivity 2025, ASEAN Framework for Personal Data Protection, and the ASEAN Strategic Action Plan for SME Development 2025. The framework was adopted to help ASEAN overcome barriers to digital integration such as digital connectivity and affordable access, commerce and trade and, financial ecosystem. India launched the 'Digital India' initiative in 2014 as an umbrella programme to transform India into a digitally empowered society and knowledge economy through nine pillars such as adoption of e-governance, broadband highways, universal access to phones, etc.12

The 'ASEAN-India Partnership for Peace, Progress and Shared Prosperity 2016-2020'¹³ lays out measures to deepen bilateral ties in areas of mutual interest, including enhancing cooperation in ICT. It focuses on sharing of best practices in policy, training and capacity building in ICT, cross-border investments and collaborations. Taking such initiatives forward, for cross-border digital connectivity and e-commerce, there is a need to focus on infrastructure development along with policy support for cross-border trade in e-commerce and e-payments.

In view of the above, the objective of this chapter is to provide an overview of the status of digital integration and e-commerce in India and the ASEAN, identify the barriers and suggest how the two economies can collaborate to strengthen cross-border digital connectivity and e-commerce. The study is based on secondary data and information analysis.

2. Status of Digital Integration and Development of E-Commerce

The ICT infrastructure in India, although growing is much below the potential (see Table 1). While India has the second highest number of active internet users in the world, yet it is low, given its large population size (34.45 per cent in 2017). There is wide disparity within the ASEAN member countries. While countries such as Singapore and Malaysia had high percentage of individuals using the internet (above 80 per cent), countries such as Cambodia and Myanmar had low internet penetration. Brunei, in spite of being a least developed country, recorded the highest rate of internet penetration of 94.87 per cent in 2017. In terms of fixed broadband subscriptions, Singapore, Vietnam and Thailand seem to perform better, where as the data for India and other ASEAN member states shows gaps in broadband connectivity. Mobile phone subscriptions have been growing rapidly, except for countries such as Lao PDR and Myanmar.

Table 1: Select ICT Indicators of ASEAN and India

	Indi Usi	entage of viduals ing the ernet ¹⁴	Fixed Tele Subscription 100 Inhab	ons per	Mobile C Teleph Subscripti 100 Inhal	one ons per	Fixed Broad Subscriptio 100 Inhabit	ns per
Country	2016	2017	2017	2018	2017	2018	2017	2018
Indonesia	25.45	32.29	4.18	3.1	164.44	119.34	2.35	3.32
Malaysia	78.79	80.14	21.16	20.41	136.12	134.53	8.64	8.55
The Philippines	55.5	60.05	3.96	3.87	110.13	126.2	3.23	3.68
Singapore	84.45	84.45	34.89	34.75	146.84	148.82	28.28	27.97
Thailand	47.5	52.89	5.01	4.22	175.6	180.18	11.86	13.24
Brunei	90	94.87	19.74	19.25	128.33	131.93	9.68	11.53
Laos	21.87	25.51	16.19	20.99	53.38	51.86	0.39	0.64
Myanmar	25.07	30.68	1.04	0.97	89.82	113.84	0.21	0.24
Cambodia	32.4	32.45	0.83	0.54	116.01	119.49	0.83	1.02
Vietnam	53	58.14	4.64	4.5	126.87	147.2	11.91	13.6
India	22	34.45	1.74	1.62	87.32	86.94	1.33	1.34

Source: Compiled by the authors' from Country ICT Data (until 2018).

	Fixed Line	Connection	Mobile C	onnection	Bandwidth	n Capacity
Country	Average Upload Speed (mbps)	Average Download Speed (mbps)	Average Upload Speed (mbps)	Average Download Speed (mbps)	Total Bandwidth (gbps)	Per Internet User (kbps)
Indonesia	9.9	15.6	8.4	9.5	1784~2072	21~25
Malaysia	15.2	21.9	9.1	16.7	1078~1424	43~56
The Philippines	15.7	15.2	6.5	11.7	1101~2534	19~44
Singapore	170.9	132.2	31.7	76.0	4522~4544	954~959
Thailand	25.3	48.8	9.9	15.4	1764~4364	48~120
Brunei	NA	NA	NA	NA	~44	~108.2
Lao PDR	NA	NA	NA	NA	~32.2	~18.4
Myanmar	9.6	8.8	14.4	22.7	83~92	6~7
Cambodia	16.4	13.0	8.6	7.4	102~174	19~32
Vietnam	31.9	29.5	7.7	14.3	4038~6100	91~137
India	16.8	20.7	3.9	8.2	6185~10248	16~26

Table 2: Speed of Fixed Line and Mobile Connection in India and ASEAN

Note: mbps – megabytes per second; gbps – gigabytes per second; kbps – kilobytes per second. Data is not available for all countries.

Sources: Extracted from Chen (2020), based on calculations from European University Institute (EUI) Index, 2019, ITU Indicators and World Development Indicators of World Bank.

In case of India, the upload and download speeds seem to be low (see Table 2), but there are wide variations across ASEAN countries. The IMD World Digital Competitiveness Ranking measures the capacity and readiness of 63 economies (which includes India and 5 ASEAN countries) to adopt and explore digital technologies by using three factors; knowledge, technology, and future readiness to enable digital transformation. In 2019, Singapore ranked 2nd in the index. India, Indonesia and the Philippines ranked in the bottom 15, but India and Indonesia showed significant improvements in their rankings from 2018 (see Table 3).

Table 3: Ranking of Select ASEAN Member Countries and India in Digital Competitiveness Index

Country	Rank in 2018	Rank in 2019	Change in Rank
Singapore	2	2	~
Malaysia	27	26	<u>† 1</u>
Thailand	39	40	↓1
India	48	44	↑ 4
The Philippines	56	55	† 1
Indonesia	62	56	↑ 6

Notes: '~' denotes 'no change; '↓' denotes 'decrease in rank'; and '↑' denotes 'increase in rank' *Source:* Compiled by authors from the IMD World Digital Competitiveness Ranking, 2019.

The UNCTAD's Global B2C E-commerce Index, which measures a country's readiness in supporting online commerce, shows that among 152 countries in 2019, Singapore ranked 3rd after Netherlands and Switzerland. Malaysia and Thailand feature among the top 10 developing countries. India, Indonesia and the Philippines are among the fastest growing B2C e-commerce markets (see Table 4).

Table 4: UNCTAD B2C E-commerce Index, 2019, ASEAN Countries and India

Country	Rank in 2019 (out of 152 countries)	Index Value ¹⁵ Change from 2017-18	Share of Individuals Using the Internet (2018 or latest)	Share of Individuals with an Online Account (15+, 2017) ¹⁶	Secure Internet Servers (normalized, 2018) ¹⁷
Singapore	3	-0.2	88	98	97
Malaysia	34	-0.8	81	85	75
Thailand	48	-3.0	57	82	61
Vietnam	64	0.8	70	31	66
India	73	-1.3	34	80	48
Indonesia	84	1.6	40	49	64
The Philippines	89	-2.1	60	35	43
Lao PDR	113	-13.1	26	29	30
Cambodia	122	-4.3	40	22	41
Myanmar	126	-8.2	31	26	24

Source: Compiled by the authors' from UNCTAD's B2C Index.

3. Negotiating Positions in Trade Agreements/Multinational Forums

India and ASEAN member countries are engaged in various bilateral, plurilateral and multilateral agreements/forums related to digital connectivity and e-commerce. The nature of engagements varies, from undertaking commitments in the World Trade Organization (WTO) to sharing of best practices. The positions of countries vary. For example, Singapore has shown preference for removal of trade barriers, while India and Indonesia have taken a defensive approach in trade discussions.

3.1 WTO's Agreements

While 7 ASEAN member countries and India have signed Information Technology Agreement (ITA)-I (signed in December, 1996), only Malaysia, the Philippines, Singapore and Thailand have signed its expanded form, ITA-II (signed in December, 2015) (see Table 5).¹⁸ The primary reason for not signing ITA-II is high import dependence/negative trade balance of certain countries.

On 25 January 2019, 77 WTO member countries initiated plurilateral negotiations on global trade rules in e-commerce. Six ASEAN countries are part of this group (see Table 5). However, India, Indonesia and Vietnam did not join on grounds such as developing new rules in e-commerce would go beyond the existing mandate of the WTO's work programme on e-commerce.

As countries of the WTO, India and ASEAN member countries have made commitments for liberalisation of telecommunications services in the Uruguay Round and have committed to regulatory principles set out under the 'Reference Paper' (released on April 24, 1996) which reflects the best practices in the telecommunications regulations. However, the level of commitments are below the autonomous liberalisation undertaken by the countries and their bilateral trade agreements.

Countries	ITA-I	ITA-II	WTO Plurilateral Group on E-Commerce as on January 25, 2019	Telecommunications Commitments	Commitment on the Reference Paper
Brunei	×	×	$\sqrt{}$	$\sqrt{}$	$\sqrt{}$
Cambodia	×	×	×	×	×
Lao PDR	×	×	√	×	×
Malaysia	√	√	V	V	×
Myanmar	×	×	√	×	×
The Philippines	√	√	×	V	×
Indonesia	√	×	×	V	√
Singapore	√	√	√	V	√
Thailand	√	√	√	V	×
Vietnam	√	×	×	×	×
India	√	×	×	V	√

Table 5: Participation of ASEAN Countries and India in Select WTO Agreements

Source: Compiled by authors from different documents on WTO's agreements and commitments.

3.2 Bilateral and Other Agreements

Extent of commitments in bilateral/regional agreements varies. The Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP) (signed on 20 December, 2018), has detailed provisions on e-commerce and digital trade between the 11 member countries. Four ASEAN member countries namely, Singapore, Malaysia, Brunei and Vietnam (signed on January 14, 2019) are part of this Agreement. The ASEAN- Australia-New Zealand Free Trade Agreement (signed on January, 2010) has a chapter on e-commerce that aims to promote and enhance cooperation in the areas of electronic authentication and digital certificates, online consumer protection, data protection, paperless trading, etc.²¹ The Vietnam-European Union (EU) agreement, signed on 30 June, 2019, requires certain regulatory commitments in the ICT sector and tariff reductions. It is interesting to note that while Vietnam imposes trade barriers like data localisation, it has signed several trade agreements, making it a preferred destination for digital goods production. While India is no longer a part of the Regional Comprehensive Economic Partnership (RCEP), other countries, including ASEAN, plan to close the Agreement in 2020. This agreement would cover e-commerce and digital trade.

India-ASEAN Bilateral Engagements

India has trade agreements in goods and services with ASEAN, an Early Harvest Scheme (signed in September, 2004) with Thailand and comprehensive trade agreements with Singapore and Malaysia. The level of commitments and collaborations vary, but in general it includes mobility of high skilled ICT personnel, reduction in tariffs and sharing of regulatory best practices and information. At present, India and ASEAN are reviewing their trade agreements as it has now become important to examine the depth of the commitments and the extent of the collaborations undertaken within them.

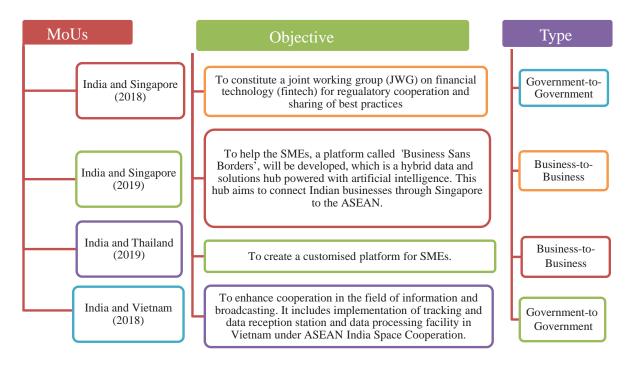
The 'ASEAN Agreement on E-commerce', ²² (signed in November 2018) is a comprehensive agreement and aims to facilitate cross-border e-commerce trade by lowering non-tariff barriers and enhancing digital connectivity within the region. India is yet to sign an agreement with regulatory commitments in e-commerce, and its present agreements only have provisions for cooperation.

4. Cross-Border Investments and Digital Collaborations/Initiatives: India and ASEAN

Cross-border collaborations and investments between India and ASEAN are rising in areas such as e-commerce, digital content, internet platforms and digital solutions. Indian private investments in ASEAN are concentrated in a few countries such as Singapore, Indonesia and Vietnam (see Appendix Table 1 in Appendix 1, for examples). India in July 2017 had announced a concessional Line of Credit of US\$1 billion to develop connectivity infrastructure, both physical and digital, as part of its commitments for integration with ASEAN.²³ It involves installation of a regional high-capacity fibre-optic network, supplemented by national rural broadband networks and digital villages in remote areas of ASEAN, among others. In January 2018, India announced a pilot project on rural connectivity in the CLMV (Cambodia, Lao PDR, Myanmar, and Vietnam) countries at the ASEAN-India Commemorative Summit.²⁴ Singapore-based Temasek Holdings has invested around US\$ 400 million in technology-based Indian startups such as Ola Cabs, Policy Bazaar, Zomato and Pinelabs.

India and ASEAN member countries have signed several memorandum of understanding (MoUs)/partnership agreements at different levels such as government-to-government (G2G) and business-to-business (B2B) (see Figure 1).

Figure 1: Objectives of Bilateral MoUs between India and Select ASEAN Member States in Digital Connectivity and E-Commerce



Source: Compiled by authors' from various government and business websites.

5. Regulations/Policies Related to Digitalisation and E-commerce

India and the ASEAN countries exhibit wide variations in their policies with respect to digital connectivity and e-commerce.

5.1 Digital Policies

India's 'Digital India Initiative' consists of three core components: the development of secure and stable digital infrastructure, delivering government services digitally, and universal digital literacy. Singapore, Malaysia, Thailand and Cambodia have come up with digital/ICT agenda through short-term/long-term strategies/blueprints to develop digital capabilities and harness digital technology (see Table 6). Indonesia is yet to come up with a comprehensive digital policy at the national level.

Table 6: Select Digital Policies in ASEAN Member States and Objectives

Country	Policy	Objective	Time Frame
Singapore	Digital Government Blueprint (2018)	To better leverage data and harness new technologies, and to drive broader efforts to build a digital economy and digital society. Focus is on building stakeholder-centric services that cater to citizens' and businesses' needs.	5 year
Thailand	Digital Government Development (2016)	To create a blueprint to identify digital capabilities by the government in alignment with national goals.	3 year
Malaysia	Malaysian Public Sector ICT Strategy Plan (2016)	It outlines the strategic direction of the implementation of ICT practices and policies in the public sector. This strategic plan emphasises the consolidation of efficiency and service effectiveness that enables a high-impact delivery system.	5 year
Cambodia	Cambodian ICT Masterplan (2015)	To make Cambodia an ICT hub in Southeast Asia	5 year

Source: Compiled by authors' from various ICT plans of the ASEAN member countries.

At the regional level, as discussed earlier, the 'ASEAN Digital Integration Framework Action Plan (DIFAP) 2019-2025' supports digital integration.

5.2 Data Privacy and Localisation Policies

India is yet to have a comprehensive data privacy and national security regulation and the 'Personal Data Protection Bill 2018' is pending in Parliament. The ASEAN member states do not have a common position in regulating cross-border data flow and are at different stages of framing their policies. The existing policies are in the form of laws, acts and additional decrees and are at different stages of operationalisation.

Countries such as Singapore, Thailand, the Philippines and Brunei have specific data protection policies. Thailand has enacted 'Personal Data Protection Act' (effective May 2020). Vietnam, Cambodia and Myanmar do not have a comprehensive personal data protection law/regulation (as of June 2020), but there are sector-specific laws for sectors such as telecommunications, healthcare, banking and finance. Indonesia's Electronic (Network and Information) Systems (GR 71/2019) introduced key changes to data localisation requirements, personal data protection, government authority to block access to negative

content, among others. In Indonesia, there is a ban on transfer of personal and transaction data, along with local storage requirements for financial data and protected private data. In Vietnam, there are restrictions on use of data and content related to social media platforms. In India, the Reserve Bank of India (RBI) had issued two directives in 2018, mandating all authorised payment system operators and banks to store payment systems data only in India.

5.3 E-Commerce Policies

E-commerce has been a key component of ASEAN's vision of creating a single and integrated regional economy. The region has been one of the early adopters of a harmonised e-commerce regulatory framework, with the formation of the 'E-ASEAN Framework Agreement' in 2000. The agreement focused on promoting a productive ASEAN 'e-space' through enhancing the ICT sector competitiveness, reducing the digital divide within and among individual ASEAN member states, promoting partnership between the public and the private sectors, and liberalisation in trade and investment in ICT goods and services. ASEAN has also adopted the 'ASEAN Agreement on Electronic Commerce', ²⁶ in November 2018, to facilitate cross-border trade and investment.

Countries may have a comprehensive regulation or multiple regulations governing e-commerce but all ASEAN countries have regulations in regard to electronic transactions and cybercrime.²⁷ These policies are aligned with international standards, such as the United Nations Commission on International Trade Law (UNCITRAL) texts on e-commerce.

India had come out with a 'Draft National E-commerce Policy' in February, 2019; however, the policy is under review as of June, 2020. The Consumer Protection Act, 2019 aims to enhance consumer rights in a digital economy. Under this Act, Consumer Protection (E-commerce) Rules, 2019, 28 released on 11 November 2019, has established conditions for governing set-up and operations of e-commerce businesses, their liability for non-compliance, etc.

Overall, while some countries such as Singapore have comprehensive digital plans, targets and policies, others including India have more generic policies or regulatory gaps in areas such as consumer data privacy, cyber-security, cross-border data flows and transactions.

6. Digital Connectivity and E-commerce: Responses to Tackle the Covid-19

India and the ASEAN member states have been adversely affected by the ongoing pandemic, leading to lower growth rates and disruption of value chains. Bilateral trade has declined drastically - India's export to ASEAN was US\$ 37.47 billion in 2018-19, which is expected to decline by 16.86 per cent in 2019-20. India's imports were US\$ 59.32 billion in 2018-19, which is expected to decline by 12.65 per cent in 2019-20.29 This is a cause for concern. At the government level, various initiatives and measures have been taken to fight the pandemic, help businesses to sustain/recover and facilitate trade. For example, in India, the clearances of Export Inspection Council (EIC), the export–certification body, is online due to Covid-19. Invest India (the National Investment Promotion and Facilitation Agency) has come up with a 'Business Immunity Platform' to help businesses and investors get real-time updates on India's active response to Covid-19. In the Philippines, the government is encouraging businesses and consumers to pay taxes, fees for permits, etc., through the digital medium. The administration in Manila has collaborated with PayMaya, a digital payment channel, to provide financial aid to its senior citizens during the crisis.

More and more businesses are now going online and use of online grocery shopping, online education and learning portals, video streaming applications, and digital payment wallets have increased among the consumers (WTO, 2020). Companies and enterprises have also focused on online advertising and digital marketing channels and online customer support (Li and Hall, 2020). Some examples of initiatives in e-commerce is presented in Figure 2.

India and the ASEAN countries have seen a surge in digital payments across certain segments and decline in others. For example, there is a growth in digital payments in sectors such as food and grocery, online video streaming, mobile recharges, e-learning services and online pharmacies,³⁰ while there is a decline in tourism and hospitality sectors.

In India, the governments' digital initiative of linking Jan Dhan accounts and other bank accounts with Aadhaar cards and Mobile numbers (the JAM trinity), have enabled transferring of benefits to targeted groups like farmers with ease during the crisis.³¹ In Indonesia, the state-owned microfinance institution Bank Rakyat Indonesia (BRI) have partnered with 'Gojek' (it has evolved from an online ride-hailing startup to a broad-based technology company offering more than 20 different types of services) and 'Grab Indonesia' (online transport and courier services, headquartered in Singapore) to provide online loans with low interest rates to the drivers and other merchants of the companies whose incomes have been cut down. The digital payment platform -'LinkAja'- collaborated with the Ministry of Information Technology to launch an e-shopping payment solution in 18 marketplaces throughout the capital city, Jakarta.

Figure 2: Covid-19 and E-Commerce Initiatives in India and Select ASEAN Countries

India

• In India, adoption of e-commerce has seen a growth across varied segments such as food and grocery as classified as 'essential categories' under the Central government guidelines. Some of the key players include Grofers, Amazon and BigBasket. Amazon has increased its services through launching its new food delivery service. To enhance activity through Reliance Retail's ecommerce platform Jiomart supports small businesses and kirana stores in serving endconsumers.

Malaysia

• One of the unique initiatives in the ecommerce segment is 'Ourfarm' launched by AirAsia (an airline group headquartered in Malaysia), Malaysia. It is a B2B ecommerce platform to enhance integration in the agribusiness supply chain, through providing support to over 1000 farmers of the country. It connects farmers directly to businesses eliminating middlemen, through providing logistics support and helping them in better price realisation.

Indonesia

• In Indonesia,

Tokopedia (a unicorn e-commerce company) have been taking a variety of initiatives to increase digitisation across small businesses. For example, to support the country's vast coffee industry during the pandemic, it has launched a campaign 'Satu Dalam Kopi' in collaboration with the Ministry of Tourism and Creative Economy and Ministry of Industry. The joint initiative has been helping over 1000 local coffee businesses to digitise through providing assistance on improving branding and marketing. The unicorn company has also taken steps along with other ecommerce firms such as Bukalapak and Shopee to stabilise the prices of healthcare products on their platforms.

Singapore

 In Singapore, under the 'Grow Digital Initiative' [a joint initiative of Enterprise Singapore and Infocomm Media Development Authority (IMDA) under the Ministry of Communications and Information], SMEs will be able to sell their products online in overseas markets without the requirement of having any physical presence. Launched on June 22, 2020, the initiative connects firms with ecommerce platforms and digital solution partners. Under IMDA, the Productivity Solutions Grant (PSG) gives subsidies up to 80 percent to SMEs who adopt digital

solutions.

Brunei

• Brunei's Bank Islam Brunei Darussalam (BIBD) has launched à virtual marketplace 'Community for Brunei' in April 2020, which is the country's first integrated ecommerce platform with zero costs for micro, small and medium enterprises (MSMEs) in sectors such as food and beverage, handcrafted products and services. Other e-commerce platforms such as Weelago' are also gaining importance to combat the downside effects of the crisis. The platform provides integrated end-to-end solutions from digital payments to marketing for distributors and manufacturers.

Source: Compiled by the authors from multiple e-commerce websites and government press statements

The Covid-19 has seen greater partnerships between government and private sector. A number of private players in countries such as the Philippines and Singapore have collaborated with government agencies to facilitate easier logistics and transport services. For example, the Philippines' logistics technology company 'Lalamove' partnered with more than 30 non-government organisations, government departments, and businesses, to offer free delivery of essential goods such as food packages and face masks. In case of e-learning, the DIKSHA portal, e-Pathshala and Lark in India and V Edukasi and Rumah Belajar of Indonesia are some examples.

At ASEAN level, the 26th ASEAN Economic Ministers (AEM) retreat in Da Nang, Vietnam (March 10, 2020), called for 'Strengthening ASEAN's Economic Resilience in Response to the Outbreak of the Covid-19'.³² It focused on leveraging technology, digital trade, and trade facilitation platforms such as the ASEAN Single Window, to foster supply chain connectivity and to allow businesses, especially SMEs, to continue operations amidst the crisis. It emphasised the need to improve long-term supply chain resilience and sustainability. Thus, digital connectivity and digital trade have received greater importance with Covid-19 and will be a key area for trade, investment and collaboration between ASEAN and India.

7. Issues in Digital Connectivity and E-Commerce

The challenges to digital connectivity and e-commerce in India and ASEAN can be broadly classified into: (a) regulatory challenges, (b) infrastructural and connectivity issues, (c) issues related to payment gateways/channels, and (d) limited participation in global forums. These barriers can adversely impact the ability of business to trade across border and they experience high logistics and transactions costs.

Regulatory Challenges

As mentioned in Section 5, there are regulatory gaps in India and in select ASEAN countries. The policies at times are without targets or may change frequently, leading to uncertain business environment. ASEAN is yet to be a single digital market. Also, policies are not always aligned with international standards.

Regarding free flow of data and data governance, India and some ASEAN economies have restrictive/piecemeal policies, which act as a barrier to trade. While there is need for some form of government control over sensitive data, restrictions that do not allow 'sharing of data with a trust' is a major impediment to cross border e-commerce trade. In many countries, there is a lack of research and evidence-based and data-driven policymaking. Thus, policies may not be aligned to business needs.

Infrastructural and Connectivity Issues

Section 2 shows wide diversity across ASEAN countries in terms of broadband penetration and speed, which are requisites for building a vibrant digital economy. India, too, lags behind in many indicators. There are issues related to telephone connectivity, quality, traffic, and access at reasonable prices. In many countries with low internet speeds, connectivity in the rural areas or remote areas have been a major roadblock for development (Chen, 2020).

Along with digital infrastructure, physical infrastructure becomes equally important for growth of e-commerce. In this context, some ASEAN countries and India, face connectivity issues with respect to land and air cargo shipments. The north-eastern part of India is the closest to the ASEAN region, but lack of efficient transport connectivity and other infrastructural facilities such as warehouses, container depots, etc. acts as an impediment to fast movement of cargo (Kathuria *et.al*, 2020). There are issues related to direct flight connectivity, lack adequate handling and processing infrastructure, especially in small regional airports. There are delays in customs processes and gaps in implementation of trade facilitation measures.

Issues Related to Payment Gateways/Channels

In some ASEAN countries, adoption of online financial services is low. For example, less than one in two users of the internet have adopted digital payment services, with adoption rates at one in five in the Philippines and one in four in Vietnam (Google and Temasek, 2019) In Myanmar, there are policy restrictions on using domestic credit/debit cards for making international purchases. There are restrictions on accepting of dollar payments, and acceptance of international online payment providers, and these vary across countries. The penetration of online payments or digital wallets in India is also low. There are issues regarding security and reliability of digital payment modes, which is a major concern for businesses and consumers in India and ASEAN (KPMG and FICCI, 2019).

Limited Participation in Global Forums

Most of the ASEAN economies and India are net importers of digital products and e-commerce. Therefore, some of them and India have taken a defensive approach in participating in trade discussions (see Section 3). Thus, they miss the opportunity of putting forward their needs and requirements. Also, it slows down the process of cross-border trade and removal of barriers to such trade. Regulatory commitments and cross-border recognition of standards and regulations can facilitate trade as has been seen in the telecommunications sector after countries accepted the WTO's Reference Paper.

8. Way Forward: Scope for Greater India-ASEAN Collaboration

Today, India and ASEAN are at a difficult time when trade flows have reduced, and countries are facing economic growth slowdown and unemployment. As countries try to revive from the Covid -19, both the economies can leverage on their digital and e-commerce initiatives that they have implemented/are implementing to move towards a technology-driven economy. This chapter shows that the growth of digital connectivity, e-commerce and startups creates opportunities for digital integration across India and ASEAN, leveraging on their mutual strengths. There is a need for addressing the domestic regulatory gaps and there is scope for enhancing cross-border regulatory cooperation. Bilateral trade today is below potential. At both G2G and B2B levels, India and ASEAN can leverage on their mutual strengths and jointly enhance digital trade and investment flows. There is scope for regulatory cooperation, sharing of best practices and cross-border investment in startups/innovative firms, some of which are discussed below.

Address Regulatory Gaps and Enhance Cooperation

While each country has the right to have its own policy, there should be a framework for harmonisation of policies across India and ASEAN through discussions/consultations. There is need for more detailed discussion on digital connectivity and e-commerce during the review of the trade agreements, and through other forums. Regulations and policies should be non-discriminatory, technology neutral and should not be a non-tariff barrier to trade. Domestic companies may be supported through incentives rather than restricting trade. Any restrictions on business models such as restrictions on foreign direct investment in inventory-based e-commerce model should be reviewed as it restricts the ability of the foreign firms to create infrastructure for better logistics services and inventory management. Policies should be adopted in line with international standards and best practices to foster cross-border digital trade, especially for SMEs. The EU's Digital Single Market and General Data Protection Regulation (GDPR),³³ which helps in harmonising policies across the EU member states are examples of how digital policies can facilitate cross-border trade with certain regulatory controls. Policies should clearly demarcate between sensitive and non-sensitive data and state how data should be stored and shared. Sharing of data with a trust after proper due diligence will facilitate cross-border trade.

Adoption of Innovative Collaboration Models

There can be innovative ways of collaboration between the two economies. For example, both India and ASEAN can work together to develop an integrated e-commerce platform, which provides information and go-to-market strategy for businesses, especially SMEs (Majumdar *et al.*, 2020). Such platforms can be used to identify B2B connect for the businesses, help them in getting easier access to information on regulations, government incentives, events and fairs, training and certification requirements, etc.

Collaboration with Technology-based Start-ups and Companies

India and ASEAN member states are rapidly growing into startup hubs. There is need for government and businesses (both public and private) to collaborate with innovative firms for better delivery of goods and services and for improving efficiencies. Cross-border startup mobility, collaboration and investment can be encouraged through creation of joint startup hubs, joint funding and startup visas. While some initiatives are underway at the government level, there is need for more structured and targeted initiatives and regular monitoring of the initiatives.

Improvement in Infrastructure

There is need to invest in digital infrastructure, including broadband connectivity to support and enhance digital connectivity. Growth in e-commerce requires establishment of good connectivity networks and logistics infrastructure for smooth facilitation of goods. To leverage the growing opportunities in the e-commerce sector, investment should be made into establishing cross-border logistics hubs. Importance should be given in building well-planned road and railway connectivity networks, within the countries and across borders. Integrated logistics across countries can play a major role in enhancing the growth of e-commerce within the region.

Greater Participation in International Agreements/Forums

While some ASEAN countries such as Vietnam have signed several trade agreements, others and India have been defensive in digital and e-commerce trade negotiations. Countries such as India and Indonesia should do extensive internal consultations and participate in the process of developing the trade rules in areas such as e-commerce.

Greater Engagements in Regional Forums

There is need for deeper understanding of a country's strength and its requirements, and forums such as India-ASEAN summits and Indo-Pacific can be good platforms for collaborations and taking up joint initiatives needed to leverage digitalisation and e-commerce. In such forums countries can present their needs, discuss their concerns and learn from each other's best practices. Such forums can be utilised to support innovative business models, which can connect remote areas of the region and support SMEs to be a part of the global value chains.

Collaboration in Cross-Border Digital Payments

Growth of e-commerce requires establishing of secure payment gateways and channels. Collaborations should be established between India and ASEAN member states in developing efficient and secure cross-border digital payment systems, through applying best practices within the region. Innovative technology startups and multinational firms can be roped in this regard. Cooperation also needs to be established between the national governments in removing restrictions on online payment methods. Efforts should be taken to develop a single and unified payments gateway/system within the region.

To conclude, while India and many ASEAN countries are today importers of digital products and services, they are fast developing their capabilities which will enable them to export in the future. Jointly, they can target third country markets leveraging on their mutual strengths. Governments can support private sectors through right policy initiatives to grow, expand, export and improve efficiency and global competitiveness. The region has centers of technology and digital innovations and this will be the key driver to enhance GDP growth and create jobs in the post-Covid-19 period.

Endnotes

- 1. Refer, World Bank SME Finance, The World Bank.
- 2. Refer, Hoppe, et. al. (2018)
- 3. https://www.statista.com/outlook/296/119/digital-payments/india (last accessed June 16, 2020)
- 4. https://www.itu.int/en/ITU-D/Statistics/Documents/statistics/2019/Fixed_broadband_2000-2018_Dec2019. xls (last accessed June 16, 2020).
- 5. Refer, Hoppe et al. (2018)
- 6. Refer, WEF (2020).
- 7. https://www.itu.int/en/ITU-D/Statistics/Documents/statistics/2019/Fixed_broadband_2000-2018_Dec2019. xls (last accessed June 2020.
- 8. Refer, UNCTAD (2018).
- 9. https://www.startupindia.gov.in/ (last accessed June 16, 2020)
- https://www.crunchbase.com/hub/association-of-southeast-asian-nations-startups#section-overview (last accessed June 16, 2020)
- 11. https://asean.org/storage/2019/01/ASEAN-Digital-Integration-Framework.pdf (last accessed June 16, 2020)
- 12. https://digitalindia.gov.in/content/introduction (last accessed June 16, 2020)
- 13. Refer, AIPOA (2016-2020).
- The data on percentage of individuals using the internet has been compiled for the years 2016 and 2017 due to the unavailability of data for four ASEAN countries and India in 2018. Data for the other three indicators has been compiled for the years 2017 and 2018.
- 15. Index value ranges from 1-100, with 100 being the highest score.
- 16. 15+ denoted individuals aged 15 years or above.
- Secure Internet servers per 1 million people is normalised with this formula: Log (secure server penetration)-Log (maximum value) / Log (maximum value) Log (minimum value) *100.
- ITA aimed to have zero tariffs from cross-border trade in digital products. The ITA-I was signed in December 1996 as a tariff liberalisation measure in information technology products such as computers, telecommunication equipment, software, etc. The product coverage was increased through the signing of ITA-II. For details on the list of the products, see https://ustr.gov/sites/default/files/ITA-expansion-product-list-2015.pdf (last accessed June 17, 2020).
- 19. Refer, Joint Statement on Electronic Commerce, WTO (2019).
- 20. https://www.wto.org/english/tratop_e/serv_e/telecom_e/tel23_e.htm (last accessed June 17, 2020).
- 21. For more details see https://aanzfta.asean.org/chapter-10-electronic-commerce/ (last accessed on June 16, 2020).
- For details, see http://agreement.asean.org/media/download/20190306035048.pdf (last accessed on June 16, 2020).
- 23. Refer, Speech by Secretary (East), MEA (2017).
- 24. Refer, India-Vietnam Joint Statement, MEA (2018).

- 25. https://asean.org/?static_post=e-asean-framework-agreement (last accessed June 17, 2020).
- 26. http://agreement.asean.org/media/download/20190306035048.pdf (last accessed June 17, 2020).
- 27. https://unctad.org/es/paginas/newsdetails.aspx?OriginalVersionID=613&Sitemap_x0020_Taxonomy=UNCTAD%20Home; (last accessed June 17, 2020).
- http://consumeraffairs.nic.in/DraftRule/Draft%20e-commerce%20Rules.docx (last accessed on June 17, 2020).
- 29. https://commerce.gov.in/InnerContent.aspx?Id=74 (last accessed on June 17, 2020).
- 30. Refer, PWC (2020).
- 31. https://pib.gov.in/PressReleasePage.aspx?PRID=1614048 (last accessed June 22, 2020)
- 32. Refer, AEMR-26-Statement-on-Covid-19, ASEAN (2020).
- 33. https://gdpr-info.eu/ (last accessed June 17, 2020).

References

- ASEAN. 2020. Strengthening ASEAN's Economic Resilience in Response to the Outbreak of the Coronavirus Disease (Covid-19). AEMR-26-Statement-on-COVID-19, March 2020. Available at: https://asean.org/storage/2020/03/AEMR-26-Statement-on-COVID-19-FINAL-10.03.2020.docx.pdf (last accessed June 17, 2020)
- AIPOA. 2016-2020. ASEAN-India Plan of Action. Available at https://asean.org/wp-content/uploads/images/2015/August/POA_India/ASEAN-India%20POA%20-%20FINAL.pdf (last accessed June 16, 2020)
- Chen, L. 2020. *Improving Digital Connectivity for E-commerce: A Policy Framework and Empirical Note for ASEAN*. Economic Research Institute for ASEAN and East Asia (ERIA), Discussion paper Series, No. 327. Available at: https://www.eria.org/uploads/media/discussion-papers/Improving-Digital-Connectivity-for-E-commerce. pdf (last accessed June 24, 2020)
- Choe, J.M. 2016. The Benefits in the Adoption of Proper Forms of E-Commerce and the Moderating Effects of E-Commerce Capabilities. *Korean Management Science Review*, 33(1), pp.17-33. Available at: https://www.koreascience.or.kr/article/ArticleFullRecord.jsp?cn=GOGGCJ_2016_v33n1_17 (last accessed June 24, 2020)
- Google and Temasek. 2019. E-Economy SEA 2019. Swipe-up and to the Right: Southeast Asia's \$100 Billion Internet Economy. Available at: https://www.blog.google/documents/47/SEA_Internet_Economy_Report_2019.pdf (last accessed June 24, 2020)
- GSMA Intelligence. 2019. The State of Mobile Internet Connectivity Report 2019. Available at: https://www.gsma.com/mobilefordevelopment/wp-content/uploads/2019/07/GSMA-State-of-Mobile-Internet-Connectivity-Report-2019.pdf (last accessed June 24, 2020)
- Hoppe, F., May, T. and Lin, J. 2018. *Advancing Towards ASEAN Digital Integration*. BAIN & COMPANY. Available at: https://www.bain.com/contentassets/37a730c1f0494b7b8dac3002fde0a900/report_advancing_towards_asean_digital_integration.pdf (last accessed June 14, 2020)
- ICT Data. until 2018. International Telecommunications Union (ITU). Available at: https://www.itu.int/en/ITU-D/Statistics/Pages/stat/default.aspx (last accessed June 14, 2020).
- International Trade Centre. 2015. Traceability in Food and Agricultural Products. Bulletin No. 91/2015. Available at: http://www.intracen.org/uploadedFiles/intracenorg/Content/Exporters/Exporting_Better/Quality_Management/Redesign/EQM%20Bulletin%2091-2015_Traceability_FINAL%2014Oct15_web.pdf (last accessed June 24, 2020)
- Kathuria, S. Grover, A., Perego, V.M.E., Mattoo, A., and Banerjee, P. 2020. Unleashing E-Commerce for South Asian Integration. International Development in Focus, Washington, DC: The World Bank. Available at: https://openknowledge.worldbank.org/bitstream/handle/10986/32718/9781464815195. pdf?sequence=4&isAllowed=y (last accessed June 24, 2020)
- KPMG and FICCI. 2019. India-ASEAN: Co-Creating the Future. 4th ASEAN Expo and Summit 2019, Ministry of Commerce and Industry. KPMG and Federation of Indian Chambers of Commerce and Industry. Available at: http://ficci.in/spdocument/23071/India-ASEAN-Co-creating-the-Future.pdf (last accessed June 24, 2020)

- Li, C., and Hall, S. 2020. This is How COVID-19 is Affecting the Advertising Industry. World Economic Forum. Available at: https://www.weforum.org/agenda/2020/06/coronavirus-advertising-marketing-covid19-pandemic-business/ (last accessed June 24, 2020)
- Majumdar, S.K., Sarma, A.P., and Majumdar, S. 2020. E-commerce and Digital Connectivity: Unleashing the Potential for Greater India–ASEAN Integration. *Journal of Asian Economic Integration*, 2 (1), pp. 62-81. Available at: https://journals.sagepub.com/doi/abs/10.1177/2631684620910524 (last accessed June 24, 2020)
- Ministry of Electronics and Information Technology and McKinsey. 2019. India's Trillion Dollar Digital Opportunity. Digital India Initiative. Available at: https://meity.gov.in/writereaddata/files/india_trillion-dollar_digital_opportunity.pdf (last accessed June 24, 2020)
- MEA. 2017. Keynote Address of Secretary (East) at the Joint Inaugural Session (Business & Academic) of Delhi Dialogue IX. Ministry of External Affair, Government of India. Available at: https://www.mea.gov.in/Speeches-Statements.htm?dtl/28588/keynote+address+of+secretary+east+at+the+joint+inaugural+session+business+ (last accessed June 24, 2020)
- 2018. India-Vietnam Joint Statement during State visit of President of Vietnam to India. Ministry of External Affair, Government of India. Available at: https://pib.gov.in/PressReleasePage.aspx?PRID=1522421 (last accessed June 17, 2020)
- Mukherjee, A., Satija, D., Sarma, A.P., Sinha, S., Chauhan, B., and Shahi, R. 2019. *Streamlining Food Imports for Trade Facilitation and Ease of Doing Business in India*. Academic Foundation, Delhi. ISBN: 9789332705159.
- OECD. 2019. Southeast Asia Going Digital: Connecting SMEs. Organisation for Economic Co-operation and Development. Available at: https://www.oecd.org/going-digital/southeast-asia-connecting-SMEs.pdf (last accessed June 24, 2020)
- PWC. 2020. Impact of the COVID-19 outbreak on digital payments. Price Waterhouse and Coopers, May 2020. https://www.pwc.in/consulting/financial-services/fintech/dp/impact-of-the-covid-19-outbreak-on-digital-payments.html (last accessed June 22, 2020)
- Rahayu, R. and Day, J. 2015. Determinant Factors of E-commerce Adoption by SMEs in Developing Country: Evidence from Indonesia. *Procedia-Social and Behavioral Sciences*, 195, pp.142-150. Available at: https://www.sciencedirect.com/science/article/pii/S1877042815039026 (last accessed June 24, 2020)
- UNCTAD. 2018. UNCTAD Estimates of Global E-Commerce 2018. United Nations Conference on Trade and Development (UNCTAD). Available at:
- https://unctad.org/en/PublicationsLibrary/tn_unctad_ict4d15_en.pdf (last accessed June 16, 2020)
- 2019. Digital Economy Report Value Creation and Capture: Implications for Developing Countries. United Nations Conference on Trade and Development. Available at: https://unctad.org/en/PublicationsLibrary/ der2019_overview_en.pdf (last accessed June 24, 2020)
- WEF. 2020. 8 ways ASEAN consumer habits will change by 2030 shaped by COVID-19, tech and more. World Economic Forum. Available at: https://www.weforum.org/agenda/2020/06/8-ways-asean-consumer-habits-will-change-by-2030-shaped-by-covid19-tech-and-more/ (last accessed June 16, 2020)
- World Bank. SME Finance, The World Bank. Available at: https://www.worldbank.org/en/topic/smefinance#:~:text=With%20nearly%2010%20million%20SMEs,role%20in%20enhance%20SME%20financing (last accessed June 13, 2020)
- WTO. 2019. Joint Statement on Electronic Commerce. World Trade Organisation, 25 January 2019. Available at: http://trade.ec.europa.eu/doclib/docs/2019/january/tradoc_157643.pdf (last accessed June 17, 2020)
- 2020. E-Commerce, Trade and the COVID-19 Pandemic: Information Note. World Trade Organization. Available at: https://www.wto.org/english/tratop_e/covid19_e/ecommerce_report_e.pdf (last accessed June 24, 2020)

Appendix 1

Appendix Table 1: Examples of Cross-Border Investments in ASEAN and India in the Digital Sectors

Company	Origin	Presence	Sector	Year	Type
Varroc Group	India	Vietnam	Electronics	2018	Setting up a manufacturing facility
Tata Communications	India	Malaysia, Singapore	Digital solutions, cloud infrastructure services	2016	Joint venture
OYO Hotels	India	Indonesia	Hospitality	2018	Wholly owned subsidiary
Singapore Telecommunications Group (Singtel)	Singapore	66 countries (including India, Vietnam, Malaysia, Thailand and the Philippines) Indian subsidiary- (Bharti Airtel)	Telecommunications services - mobile, data, internet, TV, ICT and digital solutions	2018 (acquired stakes in Bharti Airtel to make it its whollyowned subsidiary)	Subsidiary, sub-subsidiary, associates and joint ventures
Globe Telecom (a unit of Bridge Alliance)	The Philippines	Indonesia, Malaysia, Singapore, Thailand, India	Regional mobile infrastructure, common service platforms, cross-country cable systems		Joint ventures
Axiata Group	Malaysia	11 countries (including Malaysia, Cambodia, Indonesia, Myanmar, Singapore, Thailand, India) India subsidiary- Vodafone Idea Limited	Telecommunications services	2017 (acquired stake in Indian subsidiary)	Subsidiaries and joint ventures

Source: Compiled by the authors from various companies' websites.

ASEAN-India Trade Corridors: Current Status, Challenges and Way Forward

1. Introduction

ver two decades have passed since India undertook the Look East Policy (LEP) and the Act East Policy (AEP) in an effort to strengthen economic and strategic linkages with Southeast and East Asian countries. India's proactive role in building a connected market with an ambitious but realistic connectivity programme is the key focus of AEP. While India's footprints in Southeast and East Asia have increased considerably over the past two decades, the partnership requires new momentum. Trade between India and Southeast and East Asia has declined in recent years amidst global slowdown due to Coronavirus pandemic. Cooperation on the non-economic front has also continued to create concern. With a broken supply chain due to lockdown and closing up of transportation networks, the weak connectivity of India's North East Region (NER) with the rest of India and neighbouring countries have remained a serious deterrent to India's engagement with the East. Re-engaging with the East is, therefore, necessary in post-Covid-19 period.

India and Southeast Asia are home to about 1.8 billion people and have an economic size of about US\$ 4 trillion till 2019 and a substantial share of world resources, economic and otherwise.¹ With a free trade agreement (FTA) in goods in 2010, ASEAN and India have created a large economic area, the first major step towards creating an ASEAN-India regional trade and investment region. Building a common market may be achieved, provided trade liberalisation is adequately complemented by effective trade facilitation and connectivity. At the 16th ASEAN-India Summit, held in Bangkok on 3 November 2019, leaders agreed to:

"11. We emphasised the importance of further strengthening ASEAN-India connectivity cooperation to advance the implementation of the Master Plan on ASEAN Connectivity 2025 (MPAC 2025), including by promoting synergies between MPAC 2025 and regional frameworks as well as connectivity strategies under India's Act East Policy and SAGAR (Security and Growth for All in the Region) vision, under the "Connecting the Connectivities" approach, and looked forward to more cooperation in sustainable infrastructure and digital innovation initiatives in order to further strengthen trade, tourism and people-to-people connectivity. We also looked forward to India's participation in the ASEAN Smart Cities Network."

The recently accepted ASEAN-India Plan of Action (2021-2025) has outlined the next course of activities of the transportation sector between ASEAN and India. The POA has commented:

- "34. Forge closer cooperation to enhance transportation infrastructure, networks and operations, including air, maritime, road and rail to improve ASEAN-India trade and tourism-related transport connectivity, including through supporting the implementation of the Kuala Lumpur Transport Strategic Plan (ASEAN Transport Strategic Plan) 2016-2025;
- 35. Deepen cooperation on technical, economic and regulatory matters of aviation, including the convening of ASEAN-India Working Group Meeting on Regional Air Services Arrangement;
- 36. Promote maritime transport cooperation between ASEAN and India, and encourage potential private sector participation in the development of seaports, maritime logistics network and maritime services in order to create greater efficient linkages;"

In view of the above, this chapter presents the emerging connectivity scenario between India and Southeast Asia. In particular, this chapter reviews India's broad proposals on connectivity projects with ASEAN against the backdrop of AEP as well as policy recommendations in ASEAN-India POA (2021-2025) for strengthening connectivity between India and ASEAN. Rest of the chapter is organised as follows. Section 2 presents selected major connectivity projects between ASEAN and India. Section 3 presents progress in trade facilitation between ASEAN and India in this Covid-19 period. Policy implications are then discussed in Section 4. Concluding remarks are given in Section 5.

2. India's Major Connectivity Projects with Southeast Asia

The ASEAN-India POA (2021-2025) has mandated following:

"69. Work closely to promote physical connectivity in the region by completing the missing links between South and Southeast Asia, including, but not limited to, expediting the completion of relevant sections of the India-Myanmar-Thailand trilateral highway and supporting steps to build an economic corridor along it and its extension to Cambodia, Lao PDR, and Vietnam; and encouraging private sector participation in the development of roads and railways and relevant logistics networks;"

This section deals with the current status of India's major connectivity projects with Southeast Asia. The corridors for linking the NER of India with Southeast Asia considered in this section are (a) the Trilateral Highway and its extension, and (b) the Kaladan Multimodal Transit Transport Project.

2.1 The Trilateral Highway and Its Extension to Cambodia, the Lao PDR, and Vietnam²

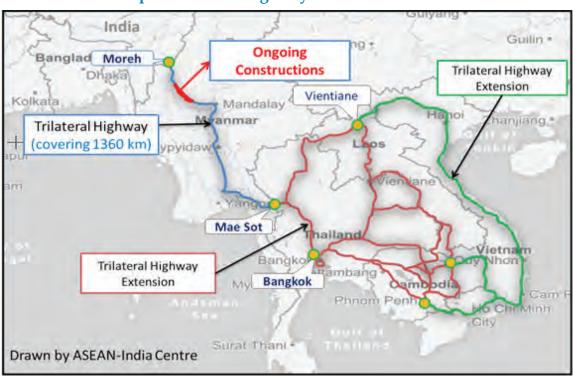
The ongoing connectivity project of the TH between India, Myanmar, and Thailand and the proposed extension of the TH towards Cambodia, the Lao PDR, and Vietnam (CLV) would enable an increased exchange of goods, services, and the movement of people between India and ASEAN. Besides, connecting India's NER with Southeast Asia would contribute to higher trade and investment, strengthen regional value chains, create jobs, and increase people-to-people contact, among others, and the NER would further strengthen the relationship with Myanmar for enhancing ASEAN–India connectivity.

2.1.1 Trilateral Highway

The Trilateral Highway (TH) is aimed to build connectivity from Moreh in India to Mae Sot in Thailand via Myanmar (Map 1). The India–Myanmar–Thailand TH project involves the construction of a 1,360 km highway connecting Moreh in Manipur to Mae Sot in Thailand through Myanmar. The cost of the construction of the Trilateral Highway is estimated at US\$ 140 million. The TH road is further proposed to be extended to Cambodia, Lao PDR, and Vietnam.

Tamu-Kalewa-Kalemyo Road

The Tamu – Kalewa - Kalemyo road, or the India-Myanmar Friendship Road, was inaugurated in 2001. The road, built entirely by India, was a gift to Myanmar and is a part of the Asian Highway. The Tamu – Kalewa - Kalemyo Friendship Road has been built by the Border Roads Organisations (BRO) and was transferred to the Government of Myanmar in 2009. The related agreements between India and Myanmar suggest that India would widen and repave the existing roads in the area, while Myanmar would upgrade the single-lane bridges along the route. Myanmar, however, was unable to carry out the upgrading work. In 2012, India agreed to repave the existing highway and upgrade all 70 weak/vintage bridges along the road, of which only one has been repaired by Myanmar till date. The remaining 69 bridges in the Tamu – Kyigone – Kalewa section (149.70 km) of the highway and upgrading the Kalewa-Yagyi section (120.74 km) are being undertaken by India. It is a part of the Trilateral Highway, which is likely to be completed by 2021³. The route of the TH is as follows (Map 2): Moreh (India) – Tamu – Kalewa – Yargi – Monywa – Mandalay – Meiktila bypass – Taungoo – Oktwin – Payagyi – Theinzayat – Thaton – Hpaan – Kawkareik – Myawaddy – Mae Sot.



Map 1: Trilateral Highway and Its Extension

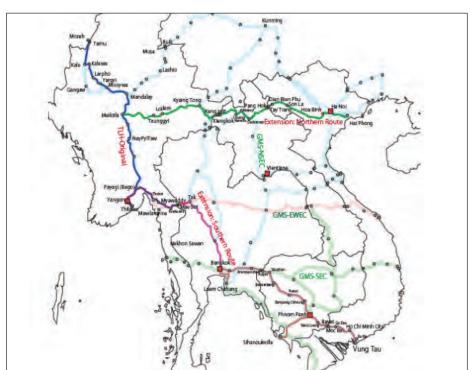
Source: ASEAN-India Centre (AIC) at RIS.

Route Stretch Status India Moreh Moreh-Tamu-Kalewa 2017 2 Kalewa-Yagyi 2021 Yagyi-Chaungma-3 201? Monywa Mandlay 4 Monywa-Mandalay 201? Myanmar Mandalay-5 2010 Meiktila bypass Meiktila bypass-6 2010 Taungoo-Oktwin-Payagyi Taungoo Thailand Payagyi- Thein Za Yat -Oktwin 2017 Thaton Thaton-Mawlamyine-2020 Kawkareik 9 Kawkareik-Myawaddy 2015 10 Myawaddy-Mae Sot 2018

Map 2: India-Myanmar-Thailand Trilateral Highway Route

Source: AIC at RIS.

Map 3: Potential Routes of Extension of Trilateral Highway



Note: EWEC = East - West Economic Corridor, GMS = Greater Mekong Subregion, NSEC = North-South Economic Corridor, SEC = Southern Economic Corridor, TLH = Trilateral Highway

Source: ERIA (2020)

The Punj Lloyd and Varaha Infra joint venture has received the contract for the construction of a two-lane highway in the Kalewa – Yargi section of the TH. The 122 km road is estimated to cost Rs 11.20 billion. The project is funded by the Ministry of External Affairs, Government of India. Out of a total 122 km road length, about 20–25 km of road falls in the hilly terrain. The project commenced on 28 May 2018 and is expected to be completed by 2022. The contractors under the NHAI's supervision would carry out the maintenance of the road until 2028. So far, they have made 17 per cent progress on the project. The project is primarily focused on improving the curves that would reduce the length by 50 km and also reduce the travel time by 1–2 hours from the present 6–7 hours and also increase the speed of the truck by 80 km per hour.

Box 1: Recommendations of ERIA Study

- Complete ongoing construction or upgrading projects for transport infrastructure along the original alignment of the TLH according to the schedule.
- Resume projects stalled by litigations and disputes immediately (e.g. bridges along the Tamu Kyigone Kalewa road, upgrading of the Thaton Eindu road).
- Move forward infrastructure projects that are in the preparatory stages (e.g. the arterial highway between Bago and Kyaikto, the Sittuang bridge, and the Yangon–Mandalay Expressway one of the initial pipeline projects of ASEAN).
- Set up National Transport Facilitation Committees (NTFCs) of member countries to facilitate cross-border transportation and trade.
- Consider multiple options and hybrid models for transport facilitation arrangements, using a mix of multilateral and bilateral arrangements.
- Formalise border administration, facilitating movement of goods and people through better border administration. Develop logistics infrastructure along the TLH and spatial development of logistics hubs such as Guwahati and Mandalay.
- Create a mechanism to ensure sustainable funding sources for the construction and maintenance of road infrastructure.
- Connect the TLH effectively with other transport networks of ports, railways, airports, dry ports, and depots.
- Enhance collaboration with the private sector, logistics service providers, and local governments.
- Support small and medium-sized enterprises in the border areas to meet the new business opportunities to be opened by the TLH.
- Development and coordination of the eastward extension plan.
- Set up a coordination cum facilitation body of all member countries and multilateral agencies to facilitate the TLH and its eastward extension.

Source: ERIA (2020).

2.1.2 Extension of TH to Lao PDR, Cambodia, and Vietnam

ERIA has recently completed a study on extension of Trilateral Highway to Cambodia, Lao PDR and Vietnam (ERIA, 2020). Map 3 presents the alignments of Trilateral Highway and possible extension to CLV.

(1) Original alignment: Moreh – (India/Myanmar border) – Tamu – Kygone – Kalewa – LarPoh – Yargyi – Monywa – Mandalay – Nay Pyi Taw –Bago (–Yangon) – Thaton – Eindu – Hpa – An – Kawkareik – Myawaddy (Myanmar/Thailand border) Mae Sot

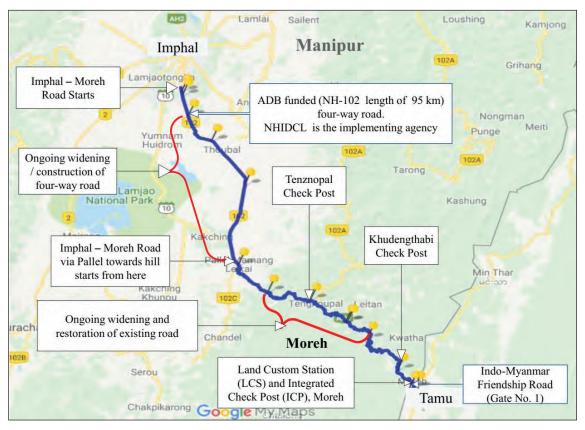
- (2) Northern route for eastward extension: Meiktila Loilem Keng Tong Tarlay Keng Lap (Myanmar/Lao PDR border [Myanmar Lao PDR Friendship Bridge]) Xieng Kok Muang Sing Louang Namtha Nateuy Oudomxay Muang Khua Pang Hok (Lao PDR/Vietnam border) Tay Trang Dien Bien Phu Son La Hoa Binh Ha Noi Hai Phong
- (3) Southern route for eastward extension: Mae Sot Tak Nakhon Sawan Bangkok (– Laem Chabang) Hinkong Kabinburi Aranyaprathet (Thailand/Cambodia border) Poipet Sisophon Battambang Pursat Kampong Chhnang Preach Kdam Phnom Penh (– Sihanoukville) Neak Loung Bavet (Cambodia/Vietnam border) Moc Bai Go Dau Ho Chi Minh City Ba Ria Vung Tau

According to ERIA, except for one small section between Xieng Kok and Luang Namtha via Muang Sing in the Lao PDR, all sections of the suggested northern route are already designated as parts of the Asian Development Bank (ADB), United Nations Economic and Social Commission for Asia and the Pacific (UNESCAP), and Master Plan on ASEAN Connectivity (MPAC) 2025 transport corridor projects (ERIA, 2020). All sections of the southern route of the eastward extension overlap with the East-West Economic Corridor, North-South Economic Corridor, and the Southern Economic Corridor of ADB. The development of TH's eastward extension, therefore, requires close cooperation with international projects executed by ASEAN, ADB, AIIB, UNESCAP, and the World Bank. Besides, ERIA Study has also provided a set of recommendations for the eastward extension of the TH (Box 1).

2.1.3 Imphal - Moreh Highway

The Government of India and ADB signed a US\$ 125.2 million loan that has been used to upgrade the roads in northeast India. National Highway and Infrastructure Development Corporation Limited (NHIDCL) is implementing the ADB-funded highway project between Imphal and Moreh. The total estimated cost is Rs 11.88 billion. About US\$ 160 million is the loan agreement amount between ADB and the Government of India. The length of the road (NH 102, which was previously known as NH 31) is 110 km. Construction of the first phase (Point 330 to Point 350) is under the tendering process. Construction of the second phase (Point 350 to Point 395) is undergoing construction. For the construction of the third phase (Point 395 – Moreh Border), the loan has not yet been sanctioned. The construction of the second phase is likely to be completed by October 2021, whereas the first and third phases are likely to be completed by 2022. Gurgaon-based GR Infrastructure has been awarded the construction of the second phase of the highway.

There are issues regarding the ongoing construction of the project; for example, land acquisition in some of the places between Imphal and Pallel. Another example is the old bridge (known as Lilong Bridge), which is a single lane at Lilong Bazar and is heavily congested and has to be reconstructed. Similarly, the bridge at Thoubal (Thoubal Bridge) and Wangjing is too narrow and has to be widened. The second phase of the ADB project starts from this place (Map 4). Road construction under the ADB project from Kaching to Pallel Bazaar is ongoing. The hill starts from Pallel, and the bridge at Pallel Bazaar needs replacement. While on the hill between Pallel and Moreh there used to be seven check posts, now there are only two check posts in operation. The first vehicle check post is located at Tengnoupal, and the second check post is located at Khudengthabi. At the second check post, Assam Rifles has introduced a cargo scanner for the goods to be imported through Moreh and transported to Imphal. Under this project, there is a plan to build a bypass of 2 km in Moreh to avoid the congested part of the Moreh town. The bypass will connect NH 102 straight to the India – Myanmar Friendship Bridge. The Imphal–Moreh road connects the ICP at Moreh, which is close to the Indo-Myanmar Friendship Road at Gate No.1. The current speed of vehicles is 40 km/hour in the valley and 20 km/hour on hills. Once the project is completed, the speed will be enhanced to 100 km in the valley and 65 km on hills for passenger vehicles.



Map 4: Project Status of the Imphal - Moreh Highway

Source: AIC at RIS.

2.1.4 Trilateral Motor Vehicle Agreement (T-MVA)

The Trilateral MVA (T-MVA) is important for facilitating trade, economic cooperation, and people-to-people contact through enhanced regional connectivity, including through facilitation of regional cross-border road transport. Without the MVA, the TH will be non-operational. Box 2 illustrates the salient features of T-MVA. This Agreement will allow vehicles and passengers to move seamlessly for regional and international trade transportation purposes along the Trilateral Highway. In general, the MVA protocols allow the safe and secure movement of vehicles along the TH. The MVA will provide a series of procedures that would facilitate movement of cargo and passengers along the corridors such as operating procedures (OP) for vehicles, customs procedures, etc. and facilitation measures. The MVA will also provide the transit and transportation rights and obligations through Annexes and Protocols. This Agreement will have a critical role in realising seamless movement of passenger, personal and cargo vehicles along the Trilateral Highway. Three countries have to reach consensus and reaffirm their understanding that the T-MVA safeguards the rights and obligations of all parties under other international agreements (e.g. the World Trade Organisation (WTO) Trade Facilitation Agreement) and bilateral/regional agreements within the group. However, the reality is that progress in the negotiation of the MVA between India, Myanmar, and Thailand for the TH has been slow.

The objective of trade facilitation at the Moreh border should be to transform the cross-border clearance ecosystem through efficient, transparent, risk-based, coordinated, digital, seamless, and technology-driven procedures that are supported by state-of-the-art land border crossings, roads, and other logistics infrastructure; and also to bring down the overall cargo release time. Given that all three TH countries have ratified the WTO TFA, they may resume the MVA negotiations at the earliest possibility and complete the negotiations before the TH comes into operation. The T-MVA is achievable since Myanmar and Thailand have already signed an MoU in 2019 to facilitate transportation between Myanmar and Thailand.

Box 2: Why T-MVA?

- Smooth transportation on point to point basis with national treatment in vehicle transportation rules and regulations
- Electronic tracking of vehicles and cargoes
- · Protection and safeguards and access to insurance
- Safe and secure transportation
- Door-to-door transportation with no or minimum interference at international borders

Source: Authors'own.

2.2. Kaladan Multimodal Transit Transport Project

One of the objectives of the Kaladan Multimodal Transit Transport Project is to provide easy access from the Bay of Bengal to landlocked north-eastern India. India's Ministry of External Affairs entered into a Framework Agreement with the Government of Myanmar in April 2008 to facilitate implementation of the project. The components of this project include: (a) construction of an integrated port and inland water transport terminal (IWT) at Sittwe, including dredging; (b) development of navigational channel along the Kaladan River from Sittwe to Paletwa (158 km); (c) construction of an IWT-highway transshipment terminal at Paletwa; and (d) construction of six IWT barges (each with a 300-tonne capacity) for transporting cargo between Sittwe and Paletwa, and (e) building a highway (109 km) from Paletwa to the India-Myanmar border (Zorinouri) in Mizoram. Table 1 presents the status of the project. Except for the road, rest components of the Kaladan project were completed.

Table 1: Status of Kaladan Project

(A) Waterways Component:	Construction of Port & IWT Terminal & Back-up facilities at Sittwe & Paletwa	Completed
	Dredging at Sittwe Port	Completed
	Dredging of river on Sittwe-Paletwa stretch (158 km)	Completed
	Construction of 6 IWT vessels and handing over to Myanmar	Completed
(B) Road Component:	Construction of 109 km double lane Highway from Paletwa to Zorinpuri (India-Myanmar border)	Ongoing

Source: Authors' own.

The Framework Agreement and two protocols (Protocol on Transit Transport and Protocol on Maintenance) were signed by India and Myanmar on 2 April 2008. Construction of the integrated port-IWT jetty at Sittwe is substantially completed. In 2015, the Government of India approved the revised cost estimate (about Rs. 29 billion) for construction of the Kaladan multi-modal transit transport project. Construction work of the IWT terminal at Paletwa was started in April 2013 and completed in 2019. The construction of the India-Mizoram border at Zorinpuri to NH 54 (Lawngtlai) road on the Indian side in Mizoram is in progress under India's Ministry of Road Transport and Highways, which is also termed as National Highway 502A (NH 502A). About 66 per cent of the new 99.83 km NH 502A, starting from NH 54 at Lawngtlai to Zorinpui in Mizoram, is completed.⁶ However, the 109 km road from Zorinpui on the India-Myanmar border to Paletwa in Myanmar is yet to be ready (see Map 5).



Map 5: Kaladan Mutli-Modal Transit Transport Project

Source: AIC at RIS.

2.3 Other Major ASEAN-India Connectivity Projects

2.3.1 Mekong-India Economic Corridor (MIEC)

Another important cross-border connectivity project is the Mekong-India Economic Corridor (MIEC), which involves integrating four Mekong countries, i.e. Myanmar, Thailand, Cambodia and Vietnam, with India. It will connect Ho Chi Minh City (Vietnam) with Dawei (Myanmar) via Bangkok (Thailand), Phnom Penh (Cambodia) and Chennai in India. The major part of the necessary investment is for the development of a port at Dawei and SEZ. While the construction of SEZ has been ongoing for quite some time, construction of the Dawei deep-water port is not yet started. This corridor, when completed, is expected to augment trade between Southeast Asia and India by reducing the travel distance and removing the supply-side bottlenecks. The emphasis of the corridor has been on expanding the manufacturing base as well as trade with the rest of the world, and particularly between ASEAN and India.⁷

2.3.2 Imphal-Mandalay Bus Service

The proposed Imphal-Mandalay bus service is expected to take 14 hours to cover 579 km distance between Imphal and Mandalay. The initial proposal for the bus service was submitted to the Ministry of Road Transport and Highways and the Ministry of Development of North Eastern Region (MDoNER) in 2009. The Imphal - Moreh section of the road is about 110 km, while the section from Moreh to Mandalay is about 469 km. The MoU for the bus service between India and Myanmar was amended in 2012, and in 2014, a technical committee meeting was held for the second time. A joint special team by members of both countries was formed, and it was found that although the road between Imphal to Moreh is in good condition, the route from Moreh to Yargi needs drastic improvement. There are three routes proposed for the bus service, of which the second route is not usable during the rainy season, whereas in the first route, there are about 70 bridges in the Yargi - Kalewa section which need to be replaced.8 In 2014, Route 1 from the three options was finalised, and the service was expected to begin in 2019.9 Finally, an MoU was signed between Yangon-based Shwemandalar Express and Imphal-based Seven Sisters Holiday on 14 February 2020 for the commencement of a bus service between the two neighbouring countries. 10 According to the MoU, the Shwe Mandalar Express will provide service from Mandalay to the border town of Tamu in Chin State, and Seven Sister Holidays will provide service from Tamu to Moreh and Imphal. The journey from Mandalay to Tamu will take about 11 hours, while the Tamu to Imphal journey may take about 2 hours and about an hour for security clearances at Tamu - Moreh, making a total 14hour trip. Once the road repairs are completed in India and Myanmar, the trip from Mandalay to Imphal will take only 5 hours. 11 Tour operators in Imphal have suggested that following Dhaka - Kolkata or Agartala - Kolkata bus services, immigration and check-in should be done on an end-to-end basis, which will drastically reduce the commuting time between the two cities.

2.3.3 Rail Connectivity

Establishing rail connectivity with Myanmar is important both in terms of increasing bilateral commerce and improving people-to-people contact. Rail links will significantly reduce journey times, especially for longer-distance cargoes and passengers. The study for a rail link from Jiribam in Manipur to Mandalay in Myanmar was conducted by Rail India Technical and Economic Service (RITES) limited in 2005. According to the study, the total length of rail line from Jiribam to Mandalay is 885.4 km, out of which the length of the Jiribam –Imphal – Moreh route is 219 km, and the length of Tamu – Kalay route is 127.4 km. This rail project is part of the southern corridor of the Trans-Asian Railway network.

Indian Railways is actively engaged in harmonisation and construction of railway tracks in NER. Projects for rail connectivity to the state capitals of Sikkim, Meghalaya, Mizoram, Manipur and Nagaland have been sanctioned by the Indian Railways. On 4 January 2014, the first Broad Gauge (BG) train from Guwahati to Tezpur via Rangiya started. The railway lines between Harmuti - Itanagar and Dudhnai - Mendipathar were completed in 2015. Broad Gauge railway train service from Agartala to rest of India has started operating. The Government of India has been constructing railway lines in Manipur. The Jiribam to Imphal rail link is currently under construction and is likely to be completed by 2022.

Within India, there is no rail link between Jiribam and Moreh, while on the Myanmar side, there is also no link between Tamu and Kalay. Connectivity between these points in the respective countries would contribute to increasing communication and commerce. The Jiribam – Tupul – Imphal broad gauge line is expected to be completed by 2022. The route involves several minor and major bridges and tunnels, of which a special feature is the construction of Bridge No.164, which has a pier height of 141 metres and is the tallest girder rail bridge in the world. ¹² Initial survey work on a broad gauge rail link between Imphal and Moreh was already completed by the North East Frontier Railway. ¹³

2.3.4 Delhi-Hanoi Railway Link

Railways account for bulk transnational movement of goods and services among India's neighbouring countries. The needs are fourfold: (a) to link India's Manipur with India's main railway corridor; (b) to link Imphal with Kalay in Myanmar (about 212 km); (c) to link Thanbyuzayat with the Three Pagoda Pass in Thailand (110 km); and (d) to re-establish and renovate railway networks in Myanmar. Harmonisation of railway tracks in the region is essential. Without having a compatible and strong railway system inside Myanmar, closer communication would be difficult. The Government of India's enterprise, called RITES, completed a preliminary study to establish Delhi-Hanoi railway link in 2006. Although railways are in service in major parts of these routes, there are about 238 km of missing links that have to be built in Myanmar in order to enable a Delhi-Hanoi railway operation. The renovation of railway network systems in southern Myanmar (Yangon to Dawei) and northern Myanmar (Mandalay to Kalay) Myanmar is essential. International donor agencies like the JICA and the Korea International Cooperation Agency (KOICA) have shown interests in improving the railway system in Myanmar.

On completion of Jiribam–Imphal–Moreh route, there could be possibilities for (i) India-Myanmar-Thailand-Malaysia-Singapore rail link, and (ii) India-Myanmar-Thailand-Hanoi rail link.

3. Trade Facilitation Performance in Post-Covid

The ongoing pandemic has triggered the rise of protectionism such as higher documentations, export licensing, export ban, etc., which are the direct threats to global trade. These short-run economic conditions can also have long-lasting impacts through fall in output and productivity. To tackle many social and economic dimensions of the ongoing crisis, the UN has identified a series of measures. ¹⁴ Improved connectivity and lower transaction and transport costs are felt important to overcome the barriers to trade and transportation in times of Covid-19. ¹⁵ Trade facilitation has become one of the priorities to mobilise essential goods such as PPE kits, medicines, foods, etc. OECD commented: "Rising trade costs – from transport, logistics and supply chain disruptions, as well as additional border controls and documentation requirements – act as additional brakes on both trade flows and the global economy". ¹⁶ In this uncertain time, improved trade facilitation is, therefore, critical to ensure the faster movement of goods and services. The need for paperless trade/contact-less trade has gained immense importance. This was reiterated at the Special AEM Meeting on Covid-19 Responses, held on 4 June 2020, adopted the Ha Noi Plan of Action on Strengthening ASEAN Economic Cooperation and Supply Chain Connectivity in Response to the pandemic.

In this pandemic time, while ASEAN countries and India have taken up several trade facilitation measures, they are also forced by the situation to introduce trade protection measures. Table 2 presents a number of such notifications issued and reported to the WTO by ASEAN countries and India during 1 January to 30 September 2020. During 1 January–30 September 2020, ASEAN countries together have issued 323 TF notifications, of which SPS and TBT together represent 67 per cent (Table 2). India, on the other, has issued a total number of 94 notifications in the same period, most of which is related to TBT, and SPS and TBT together represent 66 per cent of total notifications. Although ASEAN has outnumbered India in terms of TF notifications, both have followed a similar pattern to protect human health in this Covid-19 period.

At the same time, some common measures undertaken by ASEAN countries and India to cope up with the pandemic are (i) establishment of trade information portals to add further transparency and ease the trade by simplifying and explaining procedures and processes; (ii) expedited customs clearance and release of goods essential to combating the spread of the Coronavirus pandemic; and (iii) paperless/contactless trade. India is a classic example for introducing paperless trade even before the Covid-19 outbreak in the country.

Table 2: Trade Facilitation Notifications Issued during 1 January – 30 September 2020

Country	SPS	TBT	Anti-Dumping Practices	Import Licensing	Safeguards	Subsidies and Countervailing Measures	Rules of Origin	Market Access	Other Measures	Total
Brunei									1	1
Cambodia							1		3	4
Indonesia	6	11	1	1	13		2		2	36
Lao PDR										
Malaysia	4	4	1	2		2			1	14
Myanmar	7	1		1					6	15
The Philippines	31	21	3		8	1	1		1	66
Thailand	61	33	2	1	6	1		1	9	114
Vietnam	7	19	4		10	3	1	1	6	51
Singapore	7	6	2				1		6	22
ASEAN	123	95	13	5	37	7	6	2	35	323
India	8	54	8		8	7			9	94

Source: Authors' own based on WTO.

3.1 India in Handling Trade Facilitation¹⁷

In India, the Centre Board of Indirect Taxes and Customs (CBIC) under the Ministry of Finance is the custodian, which has been looking after the trade facilitation measures. India has started implementing trade facilitation measures as early as 20 February 2020 by restoring 24x7 custom clearance facility at all custom formations to avoid any supply chain disruption due to the unfolding Corona pandemic. The CBIC has undertaken various trade facilitation measures since 20 February, 2020 to facilitate trade and also secure essential goods in order to fight against the Corona pandemic (Figure 1).

Table 3: Major Trade Facilitation Initiatives by CBIC

Sr. No.	Subject	Measures Taken	Document Details
1	Exemption of customs duty	Ventilators, face masks and surgical	Notification no.
	on ventilators, personal	masks, personal protection equipment,	20/2020-Cus,dt. 09-
	protection equipment,	Covid-19 testing kits, and inputs for the	04-2020
	Covid-19 testing kits and	manufacture of these items - have been	
	inputs for these goods.	fully exempted from customs duty	
2	Measures to facilitate trade	Permitting the submission of	Circular no.
	during the lockdown period	undertakings in lieu of bonds for	17/2020-Customs
	under section 143AA of the	clearance of goods.	dt.03-04-2020
	Customs Act, 1962		
3	Clearance of goods under	Provisional clearance of goods while	Circular no.
	India's Trade Agreements	extending preferential treatment, without	18/2020-Customs
	without original Certificate of	the submission of original signed	dt.11-04-2020
	Origin.	certificates of origin.	

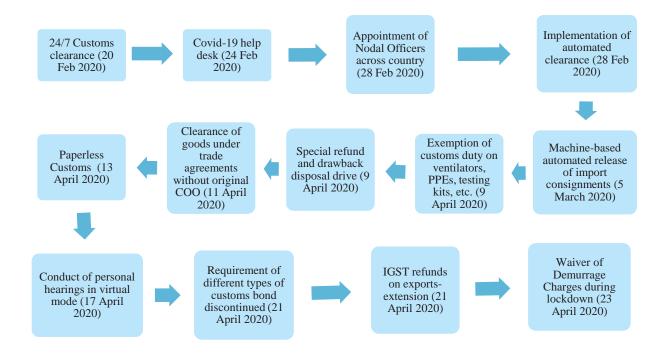
Table 3 continued...

4	Paperless Customs –	Enabling electronic communication of out	Circular no.
	Electronic Communication	of charge, bill of entry and gate-pass to	19/2020-Customs
	of PDF based Gate-pass and	importers/customs brokers.	dt.13-04-2020
	OOC Copy of Bill of Entry to		
	Custom Brokers/Importers.		
5	Special refund and drawback	Drive to expeditiously process all	Instruction no.
	disposal drive	pending customs refund and drawback	03/2020-Customs;
		claims in order to provide immediate	dt 09-04-2020
		relief to business entities, especially	
		MSMEs	

Source: De (2020) based on CBIC, Ministry of Finance, Government of India.

During 1 January to 15 July 2020, India took important measures to facilitate import of medical goods such as exemption of customs duty on ventilators, personal protection equipment, Covid-19 testing kits and inputs for these goods. Illustrated in Table 3, some other stimulating measures are clearance of goods under India's Trade Agreements without original Certificate of Origin (COO); paperless customs – Electronic Communication of PDF based Gate-pass and OOC Copy of Bill of Entry to Custom Brokers/Importers; special refund and drawback disposal drive, etc. Relief materials, both inbound and outbound, are also actively facilitated by customs. Besides, CBIC has coordinated with the port and airport authorities and other custodians to see that ample space is available for storing export and import cargoes in the customs area.

Figure 1: India's Major Trade Facilitation Initiatives



Source: De (2020) based on CBIC, Government of India

To support the work from home, particularly for the people of the software industry, customs released the consignments based on email requisitions. For example, computers and related accessories have been permitted by the customs to be transferred from the bonded premises to residence of employees of Software Technology Park of India to facilitate work from home during the lockdown period. CBIC actively coordinated with other Ministries for ensuring that customs operations are declared as an essential service during the lockdown period, which has allowed smooth operations at all the customs stations. In line with the aforesaid, further directives were issued permitting movement of customs brokers and transporters, and allowing functioning of warehouses during the lockdown period.

All customs formations have been asked to show greater sensitivity in dealing with cargo from affected areas, condone the delay in filing import declarations and waive the late filing fees in genuine cases. Special care has been taken in clearance of passengers coming from affected countries. Separate channels were created at the airports, port terminals and land customs stations for such passengers. Customs officers strictly followed instructions to use masks, gloves and sanitisers. Table 4 presents major initiatives undertaken by India during the Covid-19 period.

Table 4: India's Policy Initiatives during Covid-19*

1	Digital Trade Facilitation	
1.1	To honour its FTAs/PTAs, India issued preferential certificates of origin through online platforms and it will clear consignments provisionally with digitally signed certificates or physical certificates unsigned by the competent authority.	
1.2	CBIC has undertaken a number of measures to expedite and facilitate customs clearance process by making it contactless and paperless. These measures include contactless and paperless bill of entry amendment, acceptance digital copies, clear goods on the basis of undertaking on plain paper in lieu of bond, machine-based automated release of import consignments on all India basis, Out of Charge work replaced by e-gate pass to custom brokers/exporters for releasing consignments, etc.	
1.3	India launched a new DGFT platform for issuing certificate of origin and digital delivery of IEC related services to facilitate foreign trade.	
1.4	India provides facility to upload digitally signed licenses/permits/certificates/other authorisations (LPCOs) by eight new participating government agencies (PGAs) on e-SANCHIT (paperless processing under SWIFT) at all customs EDI systems (ICES).	
2	Business Facilitation and Support for MSMEs	
2.1	The Ministry of Finance (MoF) sanctioned a package of relief measures in five tranches for MSMEs to help them in strengthening infrastructure, logistics and capacity building.	
2.1		
	to help them in strengthening infrastructure, logistics and capacity building.	
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2.2	to help them in strengthening infrastructure, logistics and capacity building. MoF introduced relaxations relating to income tax due to Covid-19. The government initiated brand rate of duty drawback claims (processing and disposal of all pending refund and drawback claims) to provide immediate relief to the business entities and especially MSMEs. CBIC introduced several relaxations related to GST compliance and refund. Government also	
2.2 2.3 2.4	to help them in strengthening infrastructure, logistics and capacity building. MoF introduced relaxations relating to income tax due to Covid-19. The government initiated brand rate of duty drawback claims (processing and disposal of all pending refund and drawback claims) to provide immediate relief to the business entities and especially MSMEs. CBIC introduced several relaxations related to GST compliance and refund. Government also created a GST helpdesk for trade facilitation and to reach out to taxpayers.	

 $Table\ 4\ continued...$

3.2	To support the export industry, ECGC Limited has extended the time limit for all returns, extension requests, filing claims, default notification, expiry of specific shipment etc.
3.3	Government of India (GoI) and RBI announced Covid-19 regulatory package for mitigating the burden of debt servicing and to ensure continuity of viable businesses. The package includes term loans and working capital facilities.
3.4	RBI and GoI have extended the interest equalisation scheme on pre and post shipment export credit by fifteen months for exporters. It has also extended the realisation and repatriation of export of goods and services from nine months to fifteen months from the date of exports.
3.5	Deferment of revision of storage tariff as part of fiscal and monetary relief to alleviate financial distress caused by coronavirus pandemic.
3.6	MoF allowed accepting an undertaking in lieu of a bond required during custom clearance as measure to facilitate trade during lockdown period under section 143AA of the Customs Act, 1962. The facility was further extended with the extension of lockdown.
4	Transport, Logistics and Transit Facilitation
4.1	Ministry of Home Affairs issued Standard Operating Protocols (SOPs) for movement of Indian nationals stranded outside the country and transit arrangement for foreign nationals stranded in India. In addition, sign-on and sign-off of seafarers at Indian ports and their movement for the aforesaid purpose should be as per SOPs.
4.2	Air, rail and road transport was suspended. While transport services through all modes (Air, Road and Rail) were exempted from suspension to ensure smooth flow of supply chain of Essential Items during National Lockdown to fight Covid-19.
4.3	Special permission for transporting carriage of cargo (such as medical equipment, pharmaceuticals and essential goods) using passenger category aircraft during the Covid-19 lockdown period with stringent conditions and guidelines. Charter flights are facilitated by Directorate General of Civil Aviation for crew change in foreign ports.
4.4	Allowed movement of import/export cargo laden trucks between India and Bangladesh from Benapole Land Customs Station to Pertrapole Integrated Check Post.
4.5	24x7 import/export custom clearance services at all seaport/airports, ICDs, container freight stations, railway stations. 24x7 DPD clearance facilities.
4.6	No haulage charges for movement of empty containers and empty flat wagons by Indian Railways. Waiver of rail handling charges for empty containers.
4.7	Relaxation in Demurrage and Wharf age rules by Indian Railways, airport and cargo terminals at seaports.
4.8	Ships/Vessels arriving from ports of infected countries within 14 days of departure from the infected port, or having seafarers embarked on the vessel who have been in infected regions within 14 days of arrival at any Indian port shall comply with additional measures.
4.9	Cargo movements through ports were operational during the National Lockdown. All ports were allowed to continue regular freight traffic. Also, the Container Freight Stations Association of India (CFSAI) remained functional throughout lockdown.

Table 4 continued...

5	Simplification of Customs Procedures and Expedited Clearance	
5.1	Waiver of late fee charges for late filing of bills of entry, shifting charges, storage charges, dwell time charges, terminal container charges, auction charges, vessel related charges, penalties, demurrage, rentals, license fee related charges by shipping lines to facilitate clearance of import/export consignments and avoid disruptions in supply chain at all major ports.	
5.2	Waiver of bond on stamp paper for scanning of containers for Direct Port Delivery (DPD) mode of delivery (importers using own logistic/transport for evacuation of containers). The government also provided import free time by not levying container detention charges on all import shipments into India, Nepal and Bhutan.	
5.3	India facilitated export of mask, alcohol-based sanitisers, Active Pharmaceutical Ingredients (APIs) and formulations made from these APIs, paracetamol, and Personal Protection Equipments (PPE) medical coverall for Covid-19.	
5.4	GOI has extended foreign trade policy, AEO certificates, waiver of charges, fees, penalties at ports, import validity period, free days for export laden containers, export of goods by merchant exporters by 90 days. Extending validity of permits, license, RC etc. under the motor vehicle Act, 1988 and Central Vehicles Rules, 1989.	
5.5	Coronavirus Help Desk: Nodal officers in relevant Ministry/Department/Agency have been appointed by the government at zonal level to quickly resolve issues hampering trade and speedy clearance of import and export goods.	
5.6	Government exempted levy of custom duties on ventilators, face masks and surgical masks, PPE and Covid-19 testing kits.	

Note: *For the period 1 January 2020 to 15 July 2020.

Source: De (2020) based on several notifications issued by various ministries of the Government of India.

Digital Trade Facilitation

India has introduced online certificates of origin for trade partners having either PTA or FTA and clearance of consignments will be done with digitally signed certificates or physical certificates unsigned by the competent authority. India has also launched a new DGFT platform for issuing certificate of origin and digital delivery of IEC related services to facilitate foreign trade. Besides, CBIC has undertaken a number of measures to expedite and facilitate customs clearance process by making it contactless and paperless. These measures include contactless and paperless bill of entry amendment, acceptance digital copies, clear goods on the basis of undertaking on plain paper in lieu of bond, machine-based automated release of import consignments on all India basis, Out of Charge work replaced by e-gate pass to custom brokers/exporters for releasing consignments, etc. India also provides facility to upload digitally signed licenses/permits/certificates/other authorisations (LPCOs) by eight new participating government agencies (PGAs) on e-SANCHIT (paperless processing under SWIFT) at all customs EDI systems (ICES) across the country.

Business Facilitation and Support for MSMEs

The Indian Ministry of Finance (MoF) has sanctioned a package of relief measures in five tranches for MSMEs to help them in strengthening infrastructure, logistics and capacity building. The MOF has also introduced relaxations relating to income tax due to Covid-19. The government has also initiated brand rate of duty drawback claims (processing and disposal of all pending refund and drawback claims)

to provide immediate relief to the business entities and especially MSMEs. On the other, CBIC has introduced several relaxations related to GST compliance and refund. For example, a GST helpdesk for trade facilitation and to reach out to taxpayers is also set-up.

Trade Finance Facilitation

The Government of India has announced Covid-19 regulatory package for mitigating the burden of debt servicing and to ensure continuity of viable businesses. The package includes term loans and working capital facilities. To support the export industry, ECGC Ltd. has extended the time limit for all returns, extension requests, filing claims, default notification, expiry of specific shipment, etc. The Government of India and RBI have announced Covid-19 regulatory package for mitigating the burden of debt servicing and to ensure continuity of viable businesses. The package includes term loans and working capital facilities. The RBI and the Government of India have extended the interest equalisation scheme on preand post- shipment export credit by 15 months for exporters. It has also extended the realisation and repatriation of export of goods and services from nine months to 15 months from the date of exports. The Government of India has also allowed deferment of revision of storage tariff as part of fiscal and monetary relief to alleviate financial distress caused by the Coronavirus pandemic. Besides, the Ministry of Finance has allowed accepting an undertaking in lieu of a bond required during custom clearance as measure to facilitate trade during lockdown period under section 143AA of the Customs Act, 1962. The facility was later extended with the extension of lockdown period.

Transport, Logistics and Transit Facilitation

Indian Ministry of Home Affairs has issued Standard Operating Protocols (SOPs) for movement of Indian nationals stranded outside the country and transit arrangement for foreign nationals stranded in India. In addition, sign-on and sign-off of seafarers at Indian ports and their movement for the aforesaid purpose are also done as per SOPs. In general, air, rail and road transport was suspended during the lockdown period. While transport services through all modes (air, road and rail) are exempted from suspension to ensure smooth supply of essential items during the lockdown. Special permission is given for transporting carriage of cargo (such as medical equipment, pharmaceuticals and essential goods) using passenger category aircraft during the Covid-19 lockdown period with stringent conditions and guidelines. Charter flights are facilitated by the Directorate General of Civil Aviation (DGCA) for crew change in foreign ports. India has allowed movement of import and export cargo laden trucks between India and Bangladesh through Benapole LCS to Pertrapole ICP. In India, cargo movements through ports were kept operational during the lockdown. All ports were allowed to continue regular freight traffic. Customs clearance has been done on 24x7 at all seaport/airports, ICDs, CFSs, railway stations, etc. including 24x7 DPD clearance facilities.

The Government of India has extended no haulage charges for movement of empty containers and empty flat wagons by Indian Railways, and waiver of rail handling charges for empty containers. Besides, the government has extended relaxation in demurrage and wharf age rules by Indian Railways, airport and cargo terminals at seaports.

Ships/Vessels arriving from ports of infected countries within 14 days of departure from the infected port, or having seafarers embarked on the vessel who have been in infected regions within 14 days of arrival at any Indian port shall comply with additional measures.

Simplification of Customs Procedures and Expedited Clearance

The Government of India has taken initiatives for simplification of customs procedures and expedited clearance. For example, several initiatives were introduced such as waiver of late fee charges for late filing of bills of entry, shifting charges, storage charges, dwell time charges, terminal container charges, auction charges, vessel related charges, penalties, demurrage, rentals, license fee related charges by shipping lines

to facilitate clearance of import/export consignments and avoid disruptions in supply chain at all major ports. Besides, waiver of bond on stamp paper for scanning of containers for Direct Port Delivery (DPD) mode of delivery (importers using own logistic/transport for evacuation of containers) is also extended. The government has also provided import free time by not levying container detention charges on all import shipments into India, Nepal and Bhutan.

Besides, India has facilitated export of mask, alcohol-based sanitisers, Active Pharmaceutical Ingredients (APIs) and formulations made from these APIs, paracetamol, and Personal Protection Equipment (PPE) medical coverall for Covid-19. The Government has exempted levy of custom duties on ventilators, face masks and surgical masks, PPE and Covid-19 testing kits.

The Government of India has extended measures like extension of the Foreign Trade Policy, AEO certificates, waiver of charges, fees, penalties at ports, import validity period, free days for export laden containers, export of goods by merchant exporters by 90 days. At the same time, validity of permits, license, RC etc. under the motor vehicle Act, 1988 and Central Vehicles Rules, 1989 were extended.

Under the Coronavirus Help Desk, nodal officers in relevant Ministry/Department/Agency have been appointed by the government at zonal level to quickly resolve issues hampering trade and speedy clearance of import and export goods.

3.2 ASEAN Trade Policy Measures in Covid-19 Period¹⁹

ASEAN commented: "Through the Ha Noi Plan of Action, ASEAN has agreed to ensure the smooth flow of essential goods by, amongst others, refraining from imposing unnecessary NTMs during the pandemic, real-time information sharing on export prohibition or restriction, and strengthening the supply chain connectivity, including taking proactive action in enabling an effective trade facilitation, and building on existing trade facilitating platforms, to ensure the unimpeded flow of goods and services in supply chains, as well as leveraging on technologies to put in place a robust mechanism for regional sharing and coordination in responding to economic challenges such as the pandemic."²⁰

- In ASEAN, trade liberalisation is not so important since almost all tariff lines have been virtually eliminated.²¹ Trade facilitation, including reducing trade transaction costs and addressing NTMs have become the priority of the ASEAN. Some of the major initiatives taken by ASEAN are as follows:
- Full boarding of the 10 ASEAN countries on the ASEAN Single Window Live Operation for the
 exchange of the e-ASEAN Trade in Goods Agreement (ATIGA) Form D, and the ongoing work
 to expand to additional documentations and partners
- ASEAN-wide Self-Certification (ASC) has been implemented recently. This ASC allows certified
 exporters to self-certify the origin of their exports to enjoy preferential tariffs under the ATIGA
- ASEAN Solutions for Investments, Services, and Trade (ASSIST) is introduced, which is a nonbinding and consultative mechanism for expedited resolution for operation problems encountered by ASEAN-based enterprises in the implementation of ASEAN economic agreements; and
- ASEAN Customs Transit System (ACTS) offers simplified customs procedure, which has significantly reduced trade transaction costs.

4. Policy Recommendations

ASEAN countries and India have preferred simplification of customs procedures and faster clearance of goods for facilitation of both export and import along with digital trade facilitation in the times of Covid-19. The cross-border paperless trade and regional transport arrangements, set out by the UNESCAP, appear to be important catalysts to reduce the risks and protect the countries from the pandemic and in the post-pandemic recovery period. Futuristic programmes such as electronic tracking of goods and vehicles, digital freight corridors, electronic solutions of trade and transport facilitation measures, etc. shall be promoted.

Financing Connectivity in Post-Covid-19

Demand for improved connectivity between India and Southeast Asia will go up rapidly post-Covid. A recent study of the IMF indicates that increasing public investment by 1 per cent of GDP in advanced and developing economies would grow their GDP by 2.7 per cent, creating 7 million jobs directly, and between 20 million and 33 million jobs overall when considering the indirect macroeconomic effects in this Covid-19 period (IMF, 2020). The big challenge is to secure financing for large infrastructure needs to repair the infrastructure in Asia and elsewhere. A new study is recommended to assess the infrastructure investment required in the post-Covid-19 period.

At the 13th India-ASEAN Summit in Kuala Lumpur in November 2015, India offered a Line of Credit of US\$ 1 billion to promote projects that support physical and digital connectivity between India and ASEAN. ASEAN countries may utilise this special offer. Besides, ASEAN and India may consider setting up a special fund to beat the challenges particularly in the areas of maritime connectivity, digital linkages, tourism, public health, etc.

Completion of Ongoing Connectivity Projects in Physical and Digital Connectivity

There are three major tasks ahead in the completion of ASEAN-India connectivity: (a) the construction and improvement of two sections of the Trilateral Highway–Kalewa to Monywa via Yargyi–and the replacement of all vintage bridges along the highway, (b) the completion of the Kaladan Multimodal Transit Transport Project, and (c) completion of the ASEAN-India digital connectivity. Without the completion of 69 bridges, the TH cannot be made operational for cargo vehicles and passenger bus services between India and Myanmar. The finalisation of the proposed protocol of the India-Myanmar-Thailand Motor Vehicle Agreement (IMT MVA) will certainly spur the seamless movement of vehicles along the TH.

India has been implementing Digital-Villages project in CLMV. However, the progress of the high-capacity fiber optic network and the rural broadband network is rather slow. Besides, ASEAN-India Start-up Festival and Hackathon have been continuing.

The growth of e-commerce and inter-regional digital connectivity is below potential in the ASEAN region and India.²³ Therefore, promoting digital connectivity is the next big frontier in India-ASEAN connectivity. ASEAN and India should improve connectivity, reduce digital divide and implement supporting regulation and enabling framework, which supports fast track logistics, door-to-door delivery and improves the ease of doing business, especially for the MSMEs. Majumdar *et al.* (2020) have recommended an integrated e-commerce platform which would provide information and go-to-market strategy, and B2B connect to help identify partners. This platform will enhance India-ASEAN collaborations in Industry 4.0 and it will be a pioneering initiative in developing such a platform through government-private partnership. At the same time, ASEAN should fully tap into the potential of digital trade by expediting the entry into force of the ASEAN Agreement on Electronic Commerce.

Building a Stronger Coordination Mechanism

Regional connectivity has made progress within different regional frameworks in the recent past. ASEAN's dialogue partners are becoming increasingly involved and are contributing through their efforts to support the Master Plan of ASEAN Connectivity (MPAC). MPAC projects require US\$ 600 billion worth of financing. The ASEAN Infrastructure Fund is a potential source of financing. At this stage, five infrastructure projects, valued at US\$ 150 million, have been approved. Additional resources are therefore required to support the connectivity projects. ASEAN acknowledges the important role of dialogue partners in achieving greater connectivity in ASEAN members. The ASEAN Secretariat and ASEAN Connectivity Coordinating Committee (ACCC) hope to achieve a concrete outcome from engagement with a number of dialogue partners including India. Dialogue partners of ASEAN have been requested by ACCC to share their experiences with connectivity projects, and to present their plans and proposals on involvement and contributions in support of MPAC. A stronger coordination between ASEAN and India will be helpful in building cross-border connectivity.

Strengthening Trade Facilitation

ASEAN countries and India have achieved remarkable progress in trade facilitation in this Covid-19 period. Besides transport facilitation and logistics, many ASEAN countries and India have inducted simplification of trade procedures and digital trade facilitation, and many of them have also introduced new/revised protocols to deal with the trade woes.

There is a greater scope of regional cooperation between ASEAN and India in trade facilitation, particularly in the areas of customs cooperation. There are important lessons from other regions or subregions which would be useful in managing the trade between ASEN and India. ASEAN has introduced ASEAN-wide self certification scheme. For example, European countries have introduced e-transit regimes like the eTIR international system. ASEAN and India should also provide material assistance, share experience and technology, and strengthen multilateralism.

ASEAN countries and India may consider signing and ratifying UNESCAP's paperless trade, the need for which has been felt widely during the pandemic time.²⁵ In this regard, the Framework Agreement on Facilitation of Cross-border Paperless Trade in Asia and the Pacific serves as a unique platform for States members of the Economic and Social Commission for Asia and the Pacific (ESCAP) to accelerate the post-Covid recovery. There is no doubt that the digital and sustainable trade facilitation measures and practices can bring prosperity to ASEAN countries and India, and help strengthen supply chain resilience.

Improvement of Border Infrastructure

An ICP has been set-up in Moreh, and several border improvement projects, both behind and at the border, are ongoing or proposed. The trade infrastructure at Moreh has witnessed drastic improvements in recent years, but the same improvements in Tamu are missing. The current infrastructure at Moreh and Tamu is not adequately equipped to handle the future trade that we envisage when the TH comes in operation. To meet such a target, the priority should be to narrow down the infrastructure gap between Moreh and Tamu. Some of the projects worth considering are ratifying an SOP for the handling of goods and passengers, the interoperability of customs EDI systems, and the handling of container cargoes, etc. at the border.

There are several challenges associated with the Moreh LCS and the newly opened ICP. These include a shortage of staff, lack of constant electricity, absence of good quality internet, and the absence of accommodation for officials and other social infrastructure. During the time of the field survey, the cargo terminal of Moreh ICP was not operational. The Friendship Bridge near Gate 1 at the Moreh – Tamu

border has to be redeveloped so that cargo vehicles use the bridge and for direct shipments through Moreh ICP. Number of good hotels and homestay facilities at the Moreh border has to be increased. India may consider building a guest house for Buddhist travellers at Moreh.

Passengers and traders face harassment at the border, which must be stopped. A full-body cargo scanner (for containers) shall be introduced at the Moreh ICP for export and import consignments. At the moment, there has been no container movement at the Moreh–Tamu border between the two countries. In addition, the Moreh border requires facilities, such as border fencing, additional warehousing facilities for refrigerated goods, cargo vehicle yards, warehouses for seized items, plant and quarantine facilities, and a controlling office for drugs and narcotics, etc.

Land acquisition and encroachment have been major challenges to the development and construction of highways. Meanwhile, local businesses and people face unlawful activities from insurgent groups, particularly between Imphal and Jiribam and between Imphal and Dimapur.

The border at Moreh should be fenced with watchtowers, night-vision cameras, and radar cameras so that trade can take place with sufficient security and safety. Completion of the Imphal – Moreh road will help improve the tracking of the safety and security of vehicles with the help of digital technology, such as radio-frequency identification (RFID). An Electronic Data Interchange should also be introduced at Moreh customs, and human resources should be scaled up at Moreh ICP.

Building Partnerships between NER and Myanmar

There has been a strong and steady economic linkage between Manipur and Myanmar's Sagaing province. Not only do they share borders but people from Sagaing province visit Manipur for health care, tourism, and trade. Some of the sectors offer high business potential, such as the health care, tourism, education, infrastructure development, construction, and food processing sectors. Similarly, the NER's Mizoram, Nagaland, Tripura, and West Bengal states have cultural and economic linkages with Myanmar. Strengthening the NER-Myanmar partnership will then not only reinforce the bilateral foundation but also scale the relations to new heights. A new study may be conducted on the state–province level partnership between India, Thailand, and Myanmar.

5. Concluding Remarks

Over time, ASEAN-India connectivity has transformed to deal with complicated but focused connectivity programmes. Compared to what it was in 2010, a decade later the connectivity agenda between ASEAN and India covers not only hard multimodal connectivity but also the soft side of connectivity such as trade facilitation. In particular, maritime connectivity has gained immense importance in the backdrop of Indo-Pacific maritime domain.

Forgoing discussion in this chapter clearly shows India has made considerable progress in completing the Trilateral Highway. A set of projects to enhance digital linkages, maritime connectivity, air linkages and trade facilitation have been taken up and are under different phases of implementation.

In the post-Covid-19, restoring connectivity and resilience of supply chains will be key to ASEAN-India economic integration. The ASEAN-India POA (2021-2025) recommends transforming Trilateral Highway into an Economic Corridor. Supply Chain Resilience Initiative (SCRI) between India, Japan and Australia has been launched recently. The SCRI will add to the development of the economic corridor between ASEAN and India. It will also facilitate investments as well as spur economic growth in the region, which is vehemently needed at this post-Covid period. ASEAN-India connectivity could serve as a basis for Indo-Pacific infrastructure cooperation.

Endnotes

- Based on World Development Indicators (WDI), the World Bank
- 2. This part of the chapter is drawn upon De et al. (2020).
- 3. This deadline might get further extended due to slow progress of work because of Covid-19 pandemic. NHAI officials indicated that the deadline might be extended to 2022 excluding the 69 bridges
- 4. As of September 2020. Source: RIS Survey (2019)
- 5. See the Vision Report, CBIC, Government of India.
- 6. Refer, Indian Parliament question and reply by Gen. V K Singh, Minister of State (External Affairs) in April 2016.
- 7. To finance the construction of a 132-km connecting road from the Thailand-Myanmar border to the Dawei deepsea port, the Government of Myanmar has agreed to borrow Baht 4.5 billion from the Government of Thailand (Bangkok Post, 16 February 2017)
- 8. See Chaudhury and Basu (2015).
- 9. Ibid.
- 10. See Myanmar Times (2020).
- 11. Quoted in Myanmar Times (2020).
- 12. See Financial Express (2018).
- 13. See Chaudhury and Basu (2015).
- 14. Refer, United Nations (2020)
- 15. Refer, https://unsdg.un.org/resources/un-framework-immediate-socio-economic-response-covid-19
- 16. Refer, OECD (2020)
- 17. Based on De (2020)
- 18. Refer, https://www.cbic.gov.in/resources//htdocs-cbec/customs/cs-instructions/cs-instructions-2020/cs-ins-02-2020.pdf
- 19. Based on ASEAN (2020).
- 20. Ibid.
- ^{21.} ASEAN's tariffs on 98.6 percent of products have been fully eliminated under the ASEAN Trade in Goods Agreement (ATIGA). The ASEAN-6 has eliminated tariffs on 99.3 percent of their tariff lines, while the CLMV has eliminated tariffs on 97.7 percent of their tariff lines (ASEAN, 2020).
- An early study soon after the global financial crisis 2008 outbreak, the Asian Development Bank (ADB) and Asia Development Bank Institute (ADBI) study, *Infrastructure for a Seamless Asia*, estimated that Asia needed to invest approximately US\$ 8 trillion in overall national infrastructure between 2010 and 2020. In addition, Asia needs to spend approximately US\$ 290 billion on specific regional infrastructure projects in transport and energy that are in the pipeline (ADB and ADBI, 2009).
- 23. Refer, Majumdar et al (2020), available at http://aic.ris.org.in/sites/default/files/Basic%20page%20files/AIC%20commentary%202_new.pdf
- 24. See, for example, the speech by Mr. Adnan Jaafar, Deputy Permanent Secretary, Ministry of Foreign Affairs and Trade of Brunei Darussalam at the workshop on "Enhancing connectivity through multi-layered regional framework", Bangkok, 19 July 2013.
- 25. Refer, Sixth Meeting of the Interim Intergovernmental Steering Group on Cross-Border Paperless Trade Facilitation, held on 28 29 September 2019, and also the Results and implications of the United Nations Global Survey on Digital and Sustainable Trade Facilitation 2019 for Asia and the Pacific, available at https://www.unescap.org/sites/default/files/ESCAP%20PTA%20IISG%202020%201_Eng.pdf

References

- ADB and ADBI. 2009. *Infrastructure for Seamless Asia*, Asian Development Bank, Manila, and Asian Development Bank Institute, Tokyo.
- AIC-EEPC. 2020. COVID-19: Challenges for the Indian Economy Trade and Foreign Policy Effects. ASEAN-India Centre (AIC) Engineering Export Promotion Council of India (EEPC), New Delhi, available at https://www.eepcindia.org/eepc-download/617-Covid19_Report.pdf
- Bhattacharyay B., Nag, R. and Kawai, M. 2012. *Infrastructure for Asian Connectivity*. ADBI, Tokyo, and Edward Elgar, Cheltenham, United Kingdom.
- Central Board of Indirect Taxes and Customs, Government of India. Available at https://www.cbic.gov.in/resources//htdocs-cbec/customs/cs-instructions/cs-instructions-2020/cs-ins-02-2020.pdf
- De, P. 2014. *India's emerging connectivity with Southeast Asia: Progress and prospects*. Working Paper No. 507. Asian Development Bank Institute, Tokyo.
- De, P. and Majumdar, M. 2014. Developing Cross-Border Production Networks between India's North Eastern Region of India, Bangladesh and Myanmar: A Preliminary Assessment. Research and Information System for Developing Countries, New Delhi.
- De, P. P. Dash and D. Kumarasamy (2020). 'The Trilateral Highway and Northeast India: Economic Linkages, Challenges, and the Way Forward, in The India-Myanmar-Thailand Trilateral Highway and Its Possible Eastward Extension to Lao PDR, Cambodia, and Viet Nam: Challenges and Opportunities-Background Papers. ERIA Research Project Report FY2020 no.02b, Jakarta: ERIA, pp. B1-1--46. Available at https://www.eria.org/uploads/media/Research-Project-Report/2020-02-Trilateral-Highway-Report/2b-Background-Paper-1.pdf
- Djankov, S. and Panizza, U. 2020. Developing economies after COVID-19: An introduction. In Simeon Djankov and Ugo Panizza (eds.), *COVID-19 in Developing Economies*, The Centre for Economic Policy Research (CEPR), Washington, DC https://voxeu.org/content/covid-19-developing-economies
- ERIA. 2020. The India-Myanmar-Thailand Trilateral Highway and its Possible Eastward Extension to Lao PDR, Cambodia, and Viet Nam: Challenges and Opportunities. Economic Research Institute for ASEAN and East Asia. No.2a, 1-278. Available at: https://www.eria.org/uploads/media/Research-Project-Report/2020-02-Trilateral-Highway-Report/Trilateral-Highway-Integrative-Report.pdf
- Francois, J. F., Wignaraja, G. and Rana, P. 2009. Pan-Asian Integration: Linking East and South Asia. Palgrave Macmillan, New York.
- Irons, J. 2009. *Economic scarring: The long-term impacts of the recession*. Briefing Paper #243, Economic Policy Institute (EPI), Washington, DC. Available at: https://www.epi.org/publication/bp243/
- Kim, S. H. and Duval, Y. 2020. In the world's poorest countries, the move to digitalize trade procedures is needed now more than ever. Trade for Development News by EIF, May 4, 2020. Available at: https://trade4devnews.enhancedif.org/en/trade-facilitation
- Kimura, F. and Umezaki, S. 2011. ASEAN–India Connectivity: The Comprehensive Asia Development Plan (CAPD) Phase 2. Economic Research Institute of ASEAN and East Asia (ERIA), Jakarta.
- MEA. 2016. Indian Parliament question and reply by Gen. V K Singh, Minister of State (External Affairs) in April 2016. Ministry of External Affair, Government of India.
- Majumdar, S. K., Sarma, A.P., Majumdar, S. 2020. E-commerce and Digital Connectivity: Unleashing the Potential for Greater India-ASEAN Integration. AIC Commentary No. 2, February 2020. ASEAN-India Center. Available at: http://aic.ris.org.in/sites/default/files/Basic%20page%20files/AIC%20commentary%202_new.pdf
- OECD. 2020. Trade facilitation and the COVID-19 pandemic. Organisation for Economic Co-operation and Development (OECD), Paris. Available at: http://www.oecd.org/coronavirus/policy-responses/trade-facilitation-and-the-covid-19-pandemic-094306d2/
- PricewaterhouseCoopers. 2020. COVID-19 Outbreak Impact on Sri Lanka and Recommendations, Colombo. Available at: https://www.pwc.com/lk/en/assets/COVID-19-Impact-on-Sri-Lanka-PwC.pdf

- RIS. 2012. ASEAN-India Connectivity Report: India Country Study. ASEAN-India Centre, Research and Information System for Developing Countries, New Delhi.
- UNCTAD. 2020a. COVID-19 triggers marked decline in global trade, new data shows. United Nations Conference on Trade and Development (UNCTAD), Geneva. Available at: https://unctad.org/en/pages/newsdetails.aspx?OriginalVersionID=2369
- 2020b. COVID-19: A 10-Point Action Plan to Strengthen International Trade and Transport Facilitation in Times of Pandemic. Policy Brief, United Nations Conference on Trade and Development (UNCTAD), Geneva. Available at https://unctad.org/en/PublicationsLibrary/presspb2020d3_en.pdf
- UNESCAP. 2019. Review of Sustainable Transport Connectivity in Asia and the Pacific 2019: Addressing the Challenges for Freight Transport. United Nations Economic and Social Commission for Asia and the Pacific (UNESCAP), Bangkok. Available at https://www.unescap.org/publications/review-sustainable-transport-connectivity-asia-and-pacific-addressing-challenges
- 2020a. Policy Reponses to Covid-19: Transport Connectivity in Asia and the Pacific", Policy Brief, United Nations Economic and Social Commission for Asia and the Pacific (UNESCAP), Bangkok, available at https://www.unescap.org/resources/policy-reponses-covid-19-transport-connectivity-asia-and-pacific
- 2020b. The Impact and Policy Responses for COVID-19 in Asia and the Pacific. Special Report, United Nations Economic and Social Commission for Asia and the Pacific (UNESCAP), Bangkok. Available at https://www.unescap.org/sites/default/files/COVID%20_Report_ESCAP.pdf
- UNESCAP SSWA. 2020a. Strengthening Freight Transport Corridors of South Asia in the aftermath of COVID-19 United Nations Economic and Social Commission for Asia and the Pacific Subregional Office for South and South-West Asia (UNESCAP SSWA), New Delhi. Available at: https://www.unescap.org/sites/default/files/UNESCAP%20SSWA%20Policy%20Briefs%20No%206.pdf
- 2020b. Digital and Sustainable Trade Facilitation in South and South West Asia: Sub-Regional Report 2019. United Nations Economic and Social Commission for Asia and the Pacific Subregional Office for South and South-West Asia (UNESCAP SSWA), New Delhi. Available at: https://www.unescap.org/resources/digital-and-sustainable-trade-facilitation-report-sswa-2019
- UN. 2020. Shared responsibility, global solidarity: Responding to the socio-economic impacts of COVID-19. United Nation (UN), New York, March 2020. Available at: https://unsdg.un.org/sites/default/files/2020-03/SG-Report-Socio-Economic-Impact-of-Covid19.pdf
- World Bank. 2020a. The Global Economic Outlook during the COVID-19 Pandemic: A Changed World. World Bank, Washington, DC. Available at: https://www.worldbank.org/en/news/feature/2020/06/08/the-global-economic-outlook-during-the-covid-19-pandemic-a-changed-world
- 2020b. Pandemic, Recession: The Global Economy in Crisis, Washington, DC. Available at https://www.worldbank.org/en/publication/global-economic-prospects
- WTO. 2020a. Trade set to plunge as COVID-19 pandemic upends global economy. World Trade Organisation (WTO), Geneva, available at https://www.wto.org/english/news_e/pres20_e/pr855_e.htm
- —— 2020b. COVID-19 and world trade. World Trade Organisation (WTO), Geneva. Available at: https://www.wto.org/english/tratop_e/covid19_e/covid19_e.htm

ASEAN-India Energy Cooperation: New Frontiers of Opportunities

1. Introduction

In ergy security is the key factor for economic development as it helps to elevate poverty and uplift the poor. Countries envisioning towards strengthening value chains both at regional and global level need better and reliable access to electricity. In addition to food security, energy security is pertinent to address in medium to long term by targeting towards sustainable use of resources to achieve the Paris climate change target for energy consumption. For instance, India shares both land and maritime borders with ASEAN. Both have wide access to ocean, wind, solar and other forms of renewable energy sources. When the countries in ASEAN and India face common Sustainable Development Goals (SDGs) targets and have to achieve similar challenges in renewable energy, regional cooperation makes sense to generate wider benefits, particularly through sharing best practices, exchange of know-how, conduct of training and capacity building and cross border energy connectivity while dealing with the common challenges together.

In January 2018, the leaders of ASEAN countries and India issued the *Delhi Declaration* to mark the 25th Anniversary of ASEAN-India Partnership. They recommended: "Continue to enhance cooperation for ensuring long term food and energy security in our region through strengthening cooperation in agriculture and energy sectors; work together to promote the development of renewable energy technology through international platforms including the International Solar Alliance (ISA) where applicable."

The renewable energy has become the key focus of ASEAN-India energy cooperation.² Since renewal energy sources produce very negligible or zero global warming emissions, deeper cooperation in renewal energy may help countries moving towards low-carbon growth path. ASEAN aims to secure 23 per cent of its primary energy from renewable sources by 2025, whereas India aims to achieve 40 per cent of power capacity based on non-fossil fuels and reduce its emission intensity by 33–35 per cent by 2030.³ The leaders of ASEAN and India have, therefore, called for stronger collaboration to achieve energy security and to meet the SDGs for ensuring access to affordable, reliable, sustainable and modern energy for all.

The energy cooperation between ASEAN and India appears to be more promising if we consider the countries commitments under the SDGs. ASEAN countries and India are committed to achieve the SDG 7, which aims to ensure access to affordable, reliable, sustainable and modern energy for all by 2030 (Box 1). Therefore, to expand energy access, it is crucial to enhance energy efficiency and to invest in renewable energy. These targets may seem ambitious, but with better cooperation between ASEAN and India, it can become a reality. Strengthening the renewable energy cooperation, therefore, will help meet the twin targets - SDG as well as climate change.

Box 1: Targets for SDG 7

- By 2030, ensure universal access to affordable, reliable and modern energy services.
- By 2030, increase substantially the share of renewable energy in the global energy mix.
- By 2030, double the global rate of improvement in energy efficiency.
- By 2030, enhance international co-operation to facilitate access to clean energy research and technology, including renewable energy, energy efficiency and advanced and cleaner fossil-fuel technology, and promote investment in energy infrastructure and clean energy technology.
- By 2030, expand infrastructure and upgrade technology for supplying modern and sustainable energy services for all in developing countries, in particular, least developed countries, small island developing states and land-locked developing countries, in accordance with their respective programmes of support.

Source: UN SDG.

However, the Covid-19 pandemic has distracted the energy outlook on both supply-side and demand side. The consumption pattern of energy demand has experienced a significant change and also the energy supply has been severely affected due to lack of production activities, disruption on transportation and logistics, country lockdown and so on. The Covid-19 has also provided an opportunity for ASEAN and India to diversify the supply chain and to engage in cross-border connection for energy supply to reduce the price and also to meet energy shortage. Therefore, both ASEAN and India could harness the potential opportunities that are created by the Covid-19 situation.

The rest of the chapter is organised as follows. Section 2 discusses India's energy trade with neighbouring countries including ASEAN countries. Section 3 presents status in meeting the renewable energy targets, whereas the Section 4 highlights the scope and opportunities in energy cooperation between ASEAN and India. Finally, conclusions are drawn in Section 5.

2. India's Energy Trade with Southeast Asian Countries

India and ASEAN are endowed in vast energy resources. However, the resources are unevenly distributed, which require huge investment to extract the energy resources and generate cross border energy transmission to meet the supply and demand requirements. For instance, Indian Oil Corporation (IOC) is planning to set up a LPG storage and liquefied petroleum gas (LPG) import terminal in Myanmar. Numaligarh Refinery Ltd (NRL) in Assam has started supplying diesel to Myanmar and is looking at options to build fuel storage and retail distribution in Myanmar. India is planning to set-up a LNG terminal (by Petronet) in Myanmar and also setting up LPG storage facilities (by IOC). According to the Indian Minister for Petroleum & Natural Gas, "The Hydrocarbon Vision 2030 for North East India envisages a natural gas pipeline from Numaligarh towards Sittwe (in Myanmar) in different phases." These projects will then generate possibilities of gas exchange and grid connectivity between India and Myanmar.

Myanmar has an estimated hydropower potential of 39,720 MW, of which only about 2 per cent has been utilised. India and Myanmar have agreements for the development of the Sedawyagi and Yeywa hydropower projects. India had also shown interests in the Tamanti multipurpose project, which had a hydropower component of 1,200 MW in the first stage.⁷

India can extend the support to generate solar power in Myanmar. In addition, India can involve with Myanmar in building the long-distance transmission line to enhance national grid connectivity at

Myanmar border. There is a need for building political trust and engaging external regional partners in the power connectivity for minimising the geopolitical issues.

Table 1: India's Export of High-Speed Diesel, Top 10 Destinations

(US\$ Million)

Country	2010-2011	Country	2015-2016	Country	2017-2018	Country	2019-2020
Netherland	1,989.22	Saudi Arab	1,021.90	Singapore	4,054.27	Singapore	2,493.19
Brazil	1,821.21	Singapore	921.36	Israel	1,044.23	Netherland	1,603.27
Singapore	1,443.66	Turkey	828.91	Turkey	912.72	Mozambique	1,579.16
France	1,212.30	Israel	801.56	Malaysia	901.53	Israel	1,284.77
Israel	1,163.46	Kenya	724.43	Netherland	886.38	Nepal	931.22
UAE	691.11	Mozambique	713.89	Australia	795.09	Turkey	841.93
Tanzania	598.23	Gibraltar	651.4	Nepal	722.05	Malaysia	781.46
Belgium	558.82	Netherland	632.42	South Africa	629.75	Tanzania	681.9
Kenya	506.23	Australia	629.45	Tanzania	597.82	South Africa	543.53
South Africa	465.55	Tanzania	582.23	Mozambique	531.74	Belgium	497.43

Source: Calculated based on EXIM Databank, Ministry of Commerce and Industry, India.

For a long time, ASEAN countries such as Malaysia, Indonesia, Thailand and Brunei have been important sources of India's crude oil trade. However, in recent years, India's trade in energy products has undergone some major changes. While India has become a major importer of coal, India has also become a major exporter of refined petroleum products. As of now, petroleum products constitute the largest export item of India. India's major exports of petroleum products are directed to some other regions/countries such as EU, UAE, South Africa and ASEAN countries like Singapore and Thailand (Table 1). Both in terms of number of exporting destinations and value of exports to Southeast Asian countries have increased over the period from 2015-16 to 2019-20 (see Table 2).

Table 2: India's Export of High-Speed Diesel to ASEAN Countries

(US\$ Million)

Country	2015-2016	Country	2017-2018	Country	2018-2019	Country	2019-2020
Singapore	921.36	Singapore	4,054.27	Singapore	3,972.45	Singapore	2,493.19
Malaysia	39.91	Malaysia	901.53	Malaysia	1,482.29	Malaysia	781.46
Vietnam	20.69	Indonesia	157.13	Indonesia	178.02	Thailand	64.93
		Thailand	34.23	Myanmar	46.21	Indonesia	51.75
		The Philippines	31.63	The	30.21	Myanmar	0.02
		Myanmar	21	Philippines			
Total	981.96	Total	5199.79	Total	5709.18	Total	3391.35

Source: Calculated based on EXIM Databank, Ministry of Commerce and Industry, India.

India has been investing in the ASEAN countries such as Indonesia, Myanmar, Malaysia, Singapore and Vietnam for developing energy infrastructure. Most of the projects have been mobilised through development cooperation and construction of facilities such as power transmission. The major investments made by Indian firms in Myanmar are in oil and gas sector (98 per cent of India's total investment in Myanmar), of which, almost 90 per cent of the investment has been made by ONGC Videsh Ltd. (Table 3). The company has invested via JV and WOS with various firms in Myanmar. ONGC Videsh Ltd. (OVL) has also invested in oil and gas sector in Vietnam. OVL aims to support India's oil and gas security through overseas participation in oil and gas exploration and production activities. OVL has also invested in oil and gas sector Vietnam. OVL has won two on-land oil blocks in Myanmar in 2013. For example, OVL has stakes in the A-1 and A-3 gas discovery blocks and three other offshore acreages in Myanmar. The Ministry of Energy, Myanmar has awarded 13 blocks onshore blocks, out of which OVL received Blocks B-2 (Zebyutaung-Nandaw) and EP-3 (Thegon-Shwegu) for exploration.

The other major Indian firms of both public and private enterprises in oil and gas and power sector are Gas Authority of India Ltd. (GAIL), Jubilant Oil and Gas Private Ltd., Oil India Ltd., Petro Engineering and Construction Pvt. Ltd., The Tata Power Company Ltd., Adani Green Energy Limited, Jaybee Energy Pvt. Ltd., GVK Power & Infrastructure Ltd., etc. (see Table 3)

To conclude, India depends on crude oil imports to meet its energy demand. India imports almost most of its domestic crude oil requirements. India also sources a substantial part of domestic coal requirements from Indonesia, Australia, and South Africa. The increase in refining capacity has helped India to become a major exporter of petroleum products. However, the energy trade is yet to take off between India and ASEAN.

Table 3: Major Indian Firms Invested in Energy Sector in ASEAN: 2008-2019

(US\$ Million)

Country	Indian Firm	Foreign Firm	JV/WOS	Major Activity	Value
Indonesia	Welspun Steel Limited	Pt. Batubara Energy Indonesia	JV	Wholesale, Retail, Restaurants and Hotels	892.8
Indonesia	Confidence Petroleum India Ltd	Surya Gio Gas Indonesia	JV	Manufacturing	416.9
Indonesia	Tridem Port and Power Company Private Limited	Pt ISMT Resources	WOS	Agriculture and Mining	257.8
Indonesia	Gulf Oil Corpn. Ltd	Pt Gulf Oil Lubricants Indonesia,	WOS	Manufacturing	164.3
Indonesia	Sea 6 Energy Pvt Ltd	Pt Sea Six Energy Indonesia	WOS	Finance, Insurance and Business Services	135.1
Malaysia	Jaybee Energy Pvt Ltd	Umw Sher (L) Ltd	JV	Agriculture and Mining	250.4
Myanmar	ONGC Videsh Ltd.	Shwe Offshore Pipiline	JV	Agriculture and Mining	272.5
Myanmar	Gail (India) Ltd.	Shwe Offshore Pipiline	JV	Agriculture and Mining	253.1
Myanmar	Oil India Limited	Block Yeb	JV	Agriculture and Mining	228.7
Myanmar	Gail (India) Ltd	Petroleum Production Sharing Contract in Myanmar, Block A-1	JV	Manufacturing	227.2

Table 3 continued...

Table 3 continued...

Myanmar	Gail (India) Ltd	Petroleum Production Sharing Contract in Myanmar, Block A-3	JV	Manufacturing	227.2
Singapore	The Tata Power Company Limited	Trust Energy Resources Pte Ltd	WOS	Electricity, Gas and Water	48535.2
Singapore	Bhuruka Gases Ltd	Bhoruka Overseas Pte Ltd	WOS	Manufacturing	44357.7
Singapore	GVK Power & Infrastructure Limited	GVK Coal Developers (Singapore) Pte Ltd.	JV	Transport, Storage and Communication Services	40745.1
Singapore	Gupta Coal India Limited	Transasia Pacific GNR Pvt Ltd	WOS	Wholesale, Retail, Restaurants and Hotels	39367.7
Singapore	Ankur Scientific Energy Technologies Pvt Ltd	Helios Renewables Pte Ltd	WOS	Manufacturing	37847.2
Vietnam	ONGC Videsh Ltd.	Petroleum Production Sharing Contract in Vietnam	JV	Manufacturing	282.8
Vietnam	ONGC Videsh Ltd.	Block 128 Oil and Gas Exploration Project Vietnam	WOS	Manufacturing	210.2
Vietnam	ONGC Videsh Ltd.	Block 127 Oil and Gas Exploration Project Vietnam.	WOS	Manufacturing	68.4
Vietnam	Adani Green Energy Limited	Adani Phuoc Minh Solar Power Company Limited	JV	Electricity, Gas and Water	41.8

Source: Authors' calculation based on RBI.

3. ASEAN Approach to Energy Cooperation⁸

Region-wide energy cooperation in ASEAN started in 1976 when the ASEAN Council for Petroleum (ASCOPE) was established. In the initial phase, the focus was on oil and power grid cooperation. The objective of ASCOPE was to promote active collaboration and mutual assistance in the development of petroleum resources. The ASEAN level cooperation started in this regard in 1981 as it established a task force involving the Heads of ASEAN Public Utilities Authorities (HAPUA) with the objective of promoting cooperation on power grid connections. The main focus was on establishing mechanisms to avoid supply disruptions.

In another important development, the ASEAN Energy Cooperation Agreement (AECA) was signed in 1986 through which the member countries agreed to cooperate on a wide range of issues to foster efficient development and use of all forms of energy. Cooperation activities included planning, development of resources, conservation, security of supply, capacity building and exchange of information. In addition, an important milestone was achieved in the form of ASEAN Petroleum Security Agreement (APSA) in 1986, which was a binding agreement that put obligations on member countries. It established ASEAN Emergency Petroleum Sharing Scheme (AEPSS) to ensure mutual supply of oil by six countries in sudden shortfalls in supplies.

3.1 ASEAN Plan of Action of Energy Cooperation (APAEC) (2016-2025)

In terms of energy consumption, the ASEAN region is projected to double its energy usage between 2010 and 2035. Fossil fuels will remain the dominant source of energy, with oil consumption projected to double; while the use of natural gas expected to triple. Coal consumption is also projected to rise to over 80 per cent during the same period. Studies indicate that continued reliance on fossil fuels to meet energy demands will have serious environmental consequences, affecting air and water quality, water availability, land use, and even the global climate. Hence, there is a crucial need to ensure that energy sources will not only be affordable but also environmentally sustainable in the long run. Recognising the urgency of the ASEAN region's energy predicament, the ASEAN Plan of Action for Energy Cooperation 2010-2015 (APAEC) was prepared to serve as a blueprint on ASEAN cooperation on energy. APAEC is a series of policy documents to support the implementation of multilateral energy cooperation to advance regional integration and connectivity goals in ASEAN. ASEAN recognises the critical role of efficient, reliable and sustainable use of energy resources in stimulating regional economic growth and development.

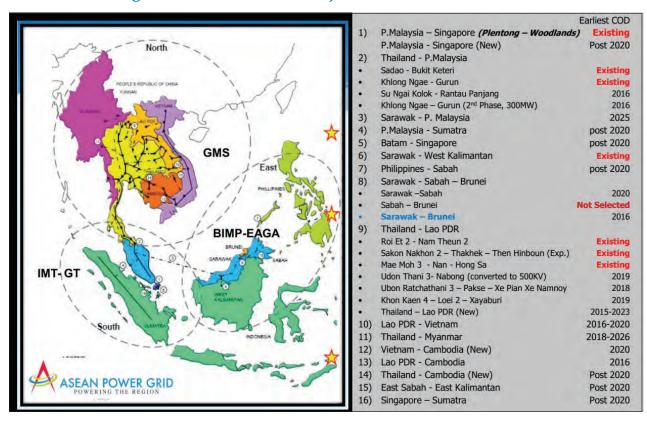


Figure 1: Interconnection Projects of ASEAN Power Grid

Source: Hermawanto (2016).

The fourth APAEC (2016-2025)¹¹ launched at the 32nd ASEAN Ministers on Energy Meeting (AMEM), held in September 2014 in Vientiane, Lao PDR endorsed the theme as "Enhancing Energy Connectivity and Market Integration in ASEAN to Achieve Energy Security, Accessibility, Affordability and Sustainability for All". The APAEC 2016-2025 is being implemented in two phases. Phase I covers the period 2016-2020 for the implementation of short to medium term measures to enhance energy security cooperation and to take further steps towards connectivity and integration.

ASEAN welcomes collaborative partnerships with development partners and international organisations to achieve the aspirations of the ASEAN Community Vision 2025. Engagement with development partners and international organisations will play a key role in meeting ASEAN's energy objectives and targets under the APAEC 2016-2025. The APAEC strategies are broad and flexible enough to meet the ever-changing global and regional energy environments and to support the goals of the ASEAN Economic Community Blueprint 2025. ASEAN has had strong support from development partners (Australia, China, EU, India, Korea, Japan, US, Russia) and international organisations (International Energy Agency (IEA), IRENA and International Atomic Energy Agency/IAEA), over a broad range of activities like joint research studies, capacity building workshops, and publications.

The key strategies of the seven programme areas of the APEC 2016-2025 phase I are summarised as following:

- (i) ASEAN Power Grid is a major initiative of multilateral electricity trade in at least one sub-region in ASEAN. To meet the electricity demand. ASEAN aims to connect cross-border power grid system at sub-regional level and finally the entire region. Through the interconnection project (Figure 1), the power exchange and purchase would almost triple from 3,489 MW in 2014 to 10,800 MW in 2020 and further increase to 16,000 MW post-2020.¹²
- (ii) Trans-ASEAN Gas Pipeline (TAGP) is another project to enhance connectivity for energy security and accessibility via pipelines and regasification terminals. The ASCOPE is responsible for the effective implementation of the TAGP Project through multiple physical pipeline interconnections and regasification terminals (RGT) (Figure 2). As of 2018, a total of 13 bilateral gas pipeline interconnection projects connecting six (6) countries bilaterally with a total length of approximately 3,673 km have been successfully commissioned.

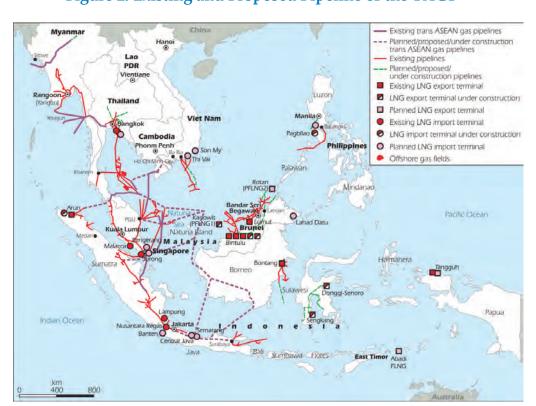


Figure 2: Existing and Proposed Pipeline of the TAGP

Source: IEA (2014).

- (iii) Coal and Clean Coal Technology has been promoted to enhance the image of coal through promotion of clean coal technologies (CCT). ASEAN Forum on Coal (AFOC) is responsible for promoting the development and utilisation of clean coal technologies and facilitating intra-ASEAN coal trade towards enhancing regional energy security and sustainable development. ASEAN will continue its effort to adopt the most appropriate, efficient and clean coal technologies in the region.
- (iv) Energy Efficiency and Conservation is promoted to reduce energy intensity by 20 per cent in 2020 based on 2005 level. To address the limited global reserve of fossil fuels and volatile energy prices, the ASEAN Member States (AMS) have been following a deliberate policy of diversification and efficient utilisation of energy sources. The Energy Efficiency and Conservation Sub-sector Network (EE&C-SSN) is responsible for the coordination of ASEAN's collective efforts on energy efficiency towards its target of reducing energy intensity.
- (v) ASEAN countries have undertaken programmes to increase the component of renewable energy to 23 per cent by 2025 in ASEAN Energy Mix.¹⁴ The AMS initially deployed renewable energy technologies based on oil consumption reducing policies, but later incorporated policies to mitigate environmental impacts of fossil fuel use, including the potential effects of climate change. The development of renewable energy in the AMS covers hydro, geothermal, solar photo-voltaic, solar thermal, wind, bio-energy (bio-ethanol, bio-diesel, biogas, bio-oil) and waste. Others, such as ocean energy (thermal, wave, and tidal), fuel cell, hydrogen and coal liquefaction/gasification are in the research, development and demonstration stages. Solar and wind energy are still considered capital intensive and not as affordable as conventional energy. The AMS also recognise that renewable energies are crucial for increasing the diversity of energy supply and reducing the environmental impact of energy use in the region.
- (vi) Regional Energy Policy and Planning (REPP) has been drawn to better profile the energy sector internationally. With the aim of enhancing ASEAN's engagement with development partners and international organisations, REPP-SSN's key achievement was the successful signing of the ASEAN-IEA MoU in 2011 on the sidelines of the 29th ASEAN Ministers of Energy Meeting (AMEM) in Brunei Darussalam. The MoU has enabled ASEAN to collaborate and benefit from IEA through Ministerial Dialogues and expertise in key areas of ASEAN's interest, including energy data collection/analysis, gas market industry dialogue, emergency preparedness, etc.
- (vii) Civilian Nuclear Energy has been promoted to build capabilities in policy, technology and regulatory aspects of nuclear energy. Civilian nuclear energy, as a clean source of energy, can help ASEAN meet its growing energy demand in the region. To enhance cooperation in areas such as public information/awareness, capacity building, including human resource development, education and training, nuclear safety, emergency preparedness and regulatory framework of civilian nuclear power plants (NPPs) in ASEAN, the Nuclear Energy Cooperation-SSN (NEC-SSN) collaboration with international organisations made several international agreements.

3.2 ASEAN Renewable Energy Targets¹⁵

According to the ACE, regional renewable energy can also enhance energy security as it reduces import dependencies. Energy security refers to the availability of energy at affordable prices. Figure 3 illustrates ASEAN country-wise renewable energy targets. As countries invest more in renewables, they would be less dependent on energy imports to fuel their nation's energy consumption needs. For example, ASEAN countries with similar energy security challenges can coordinate the development of renewable energy in the region. Overall, this would improve the energy mix and grow their energy security.

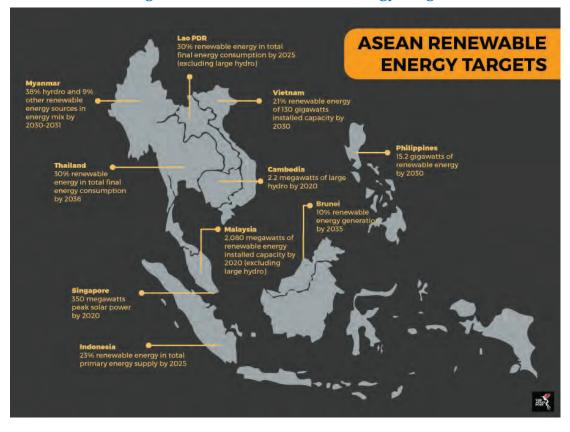


Figure 3: ASEAN Renewable Energy Targets

Source: ASEAN Energy Centre (ACE).

Regional cooperation is imperative if ASEAN wants to achieve their renewable energy target for 2025. One of the benefits of renewable energy cooperation among ASEAN states is that it would create space for dialogue and better coordination. India and ASEAN may consider setting up an ASEAN-India Energy Forum (AIEF) to exchange knowledge and expertise and put into practice examples of the implementation of renewable energy policies.

Also, ASEAN has been implementing the ASEAN Power Grid, which aims to enhance electricity trade across regional borders – complementing the rise in demand for electricity. The ASEAN Power Grid looks to integrate infrastructure that is both, clean and sustainable. One of the projects under the ASEAN Power Grid is the Lao PDR-Thailand-Malaysia-Singapore Power Integration Project. This project involves Malaysia purchasing up to 100 megawatts (MW) of hydro power from Lao PDR through Thailand's transmission grid. This is beneficial for Malaysia because it would also improve the share of sustainable energy in their total energy mix.

While there can be huge benefits from regional cooperation, there are also strong obstacles which could impede it. One of the biggest challenges is financial constraints. According to the ACE, the deployment and transfer of renewable energy technologies require large funding, which is not always easy to source.¹⁷ This poses a serious constraint if ASEAN wants to meet its target by 2025. Especially with IRENA reporting that the region's energy demand has grown by 60 per cent over the past 15 years and is only expected to keep on growing. Clearly, ASEAN governments must seriously consider utilising renewable energy sources.

3.3 ASEAN's Energy Cooperation Programme with Neighbouring Countries

ASEAN has been engaging in several bilateral and multilateral initiatives with the neighbouring countries on energy cooperation. Energy cooperation related issues are the focus areas among the ASEAN+3 energy ministers (AMEM)¹⁸ meetings to promote wider use of energy efficiency and conservation measures, diversification of types and sources of energy and development of indigenous petroleum. ASEAN+3 cooperation on energy security also encourages effective dialogue and cooperation between ASEAN+3 and major energy producing countries both within and outside of the region. ASEAN has also organised the Energy Security Forum in cooperation with China, Japan and Korea to work for formalising a mechanism for regional consultation and coordination strategies in case of emergency energy shortages within the region.

ASEAN and China have energy cooperation in planning nuclear energy programmes, promoting clean energy and providing support for capacity building on civilian nuclear energy. ¹⁹ Japan has initiated the Hiranuma Initiative at the 8th International Energy Forum in 2002 at Osaka to promote cooperative dialogue between energy producing and consuming countries. The initiative has listed five priority areas for Asian energy cooperation: (i) energy security network; (ii) oil stockpiling; (iii) studies on the oil market; (iv) promotion of natural gas usage and (v) renewable energy. ²⁰

The East Asia Economic (EAS) Summit held in 2007 (including India, Australia and New Zealand in addition to ASEAN+3 countries), has initiated the Cebu Declaration on East Asian Energy Security for promoting energy efficiency and conservation, voluntarily formulating energy efficiency goals and action plans. In support of Cebu Declation, Japan proposed Abe Initiative to help promote energy conservation, efficiently utilise biomass energy, develop clean coal technology and utilisation of energy for poverty eradication.

4. Prospects in India-ASEAN Energy Cooperation

From the previous sections, it is evident that ASEAN has introduced a comprehensive regional energy cooperation programme, whereas India's regional cooperation is mostly at the bilateral level. India is yet to explore the potential energy resources for accessing natural gas and hydro power with the ASEAN region. India has already engaged in energy infrastructure development in the ASEAN region, particularly in the CLMV countries such as building hydropower projects, power transmission lines and substations and oil and gas pipelines, etc.

Energy sector machineries, equipment and other goods can also open up possibilities for substantial trade. As discussed earlier, ASEAN has been developing a region-wide grid of natural gas pipelines and electricity transmission lines. India can possibly get connected through these two ASEAN-wide grids by developing transmission line and gas pipeline connections with Myanmar.

India is the fourth largest energy consumer in the world, next to China, the US, and Russia, importing 80 per cent of its crude oil and 25 per cent of its natural gas requirements.²¹ India is one of the top investing countries in renewable energy. In case of solar energy, India stands as a low-cost destination for grid-connected solar power. Further development of solar power in India would reduce emissions per unit of GDP by 20 to 25 per cent in 2020 and produce clean energy for the country.²² The Indian Ministry of New and Renewable Energy (MNRE) has set up a Solar Energy Centre to test solar thermal and solar photovoltaic materials, devices, and systems in addition to its applied research and training on solar power development. In addition, wind power dominates the renewable energy industry of India, representing 70 per cent of its total renewable energy capacity. This can be attributed to the considerable support from government by providing significant tax incentives that have induced substantial investments in wind energy projects.

India is projected to be a significant contributor to the rise in global energy demand. Around 750 million people in India gained access to electricity between 2000 and 2019, reflecting strong and effective policy implementation.²³ Figure 4 illustrates India's commitments under the SDG 7. The government's National Solar Mission has been playing an important role in the work towards renewable energy, and interventions in rural electrification and new ultra-mega power projects are moving India towards achieving universal energy access.

In exploration of renewable energy, particularly solar and wind energy, India has initiated International Solar Alliance (ISA), which is now having more than 121²⁴ prospective member countries. Most of the ASEAN countries are prospective members of ISA, among which Cambodia has signed whereas Myanmar has signed and ratified the ISA Framework Agreement. ISA's motive is to bring together a group of nations to endorse clean energy, sustainable environment, public transport and climate through solar power utilisation and move towards low-carbon growth path. India aims to achieve 100 GW solar energy, 175 GW renewable energy by 2022, and reduction in emission intensity by 33–35 per cent by 2030. The ISA has also been committed to invest US\$ 1 trillion in the exploration of solar energy.²⁵

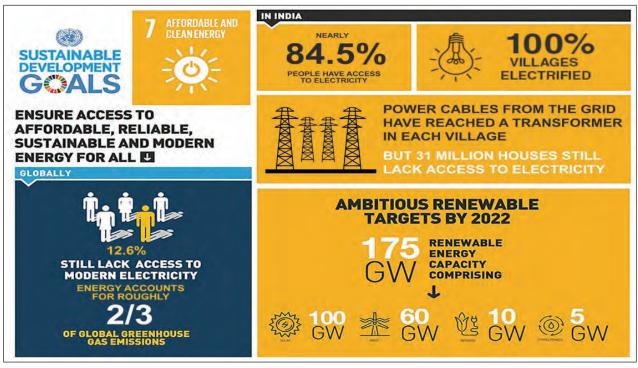


Figure 4: SDG 7 and India

Source: UN SDG.

ASEAN and India have been implementing the 3rd Plan of Action (2016-2020). This Plan of Action lays out priorities and measures to be undertaken by both sides to further deepen and enhance their political-security, economic and socio-cultural ties as well as to realise the full potential of the ASEAN-India strategic partnership in all areas of common interests including energy (see Box 2).

The ASEAN-India POA (2021-2025) has devoted on energy cooperation. It has following specifics:

- "31. Support the implementation of the ASEAN Plan of Action on Energy Cooperation (APAEC) 2016-2025;
- 32. Explore cooperation, including through the private sector, to promote energy security through regional power integration and the development of renewable and alternative energy sources as well as promotion of clean energy technologies and energy efficiency and conservation practices;
- 33. Promote best practices on energy regulatory frameworks and technical standards, consistent with the APAEC, including technology transfer and capacity building support for the programme area to realise multilateral power trade in the ASEAN Power Grid and greater integration of renewables into the grid;"

The official discussion on energy cooperation between India and ASEAN has focused widely on renewable energy. The first meeting on ASEAN-India renewable energy cooperating in 2012 emphasised on ways to complement each other on respective renewable energy policies to mutually address the energy needs. India has developed significant capability in electricity generation through wind energy. Similarly, Indonesia and the Philippines have developed capacity in geothermal energy, whereas

Box 2: Plan of Action to Implement the ASEAN-India Partnership for Peace, Progress and Shared Prosperity (2016-2020)

- 2.3.1. Support the implementation of the ASEAN Plan of Action on Energy Cooperation (APAEC) 2016-2025;
- 2.3.2. Further promote the ASEAN-India New and Renewable Energy initiative;
- 2.3.3. Initiate meetings between ASEAN Senior Officials on Energy (SOME) and Ministry of New and Renewable Energy of India to advance energy cooperation;
- 2.3.4. Promote cooperation to pursue energy security and to minimise environmental impacts through research, capacity building, development, production and use of renewable and alternative energy sources;
- 2.3.5. Increase private sector engagement cooperation in the development and utilisation of renewable and alternative energy sources;
- 2.3.6. Promote clean energy technologies and energy efficient technologies through institutional capacity building;
- 2.3.7. Promote the facilitation of trade and investment in the energy sector, including energy infrastructure and oil and natural gas related projects, pursue an integrated and coordinated development programme to establish compatibility of electricity grids, and work towards liberalisation of power trade among ASEAN Member States and India;
- 2.3.8. Develop and strengthen institutional linkages between ASEAN and India, including the ASEAN Centre for Energy (ACE), to cooperate on R&D into energy efficiency and conservation, renewable energy, energy security, policy and planning, and to establish programmes of cooperation;
- 2.3.9. Support the rural household electrification programmes of ASEAN Member States, including through solar, bio mass, bio gas, micro hydro and off-grid electrification to narrow development gaps in ASEAN.

Source: ASEAN Secretariat, Jakarta.

Singapore has been generating significant electricity from waste. India and Thailand have gained capacity and resources in solar power as well. India is the only country to generate nuclear power and use biofuel to generate significant quantity of electricity. These countries can help others in developing energy production capabilities in the respective sub-sectors. Therefore, both ASEAN and India have high prospect in renewable energy cooperation through information and knowledge sharing. ASEAN member states stand to benefit from India's expertise on wind and solar energy. In this case, ASEAN and India may consider establishing a coordinating mechanism through which energy experts from ASEAN and India will be able to share knowledge and expertise necessary in formulating sound, feasible, and practical policies on energy collaboration. At the same time, more energy market integration would take place if electricity exchange is expanded between India and ASEAN through Myanmar.²⁶

India is planning to set up an LNG plant of 50 MW in Port Blair in Andaman Islands. The supply of LNG may come from India, Thailand or Malaysia which are closer to Port Blair. This would give new dimension to the regional power supply. India has launched an online tender portal to supply LNG to this plant, where any country from the world can participate for bidding.

Indian oil companies are moving towards the low carbon emission facilities by using renewable energy. As of today, India has 79.6 GW of power from renewable sources. Over the last decade, the oil and gas companies have built the capacity of 942.5 MW solar and wind power. Wind power is mostly built by the PSU companies and few private companies engaged in the operation, which indicates that investment in renewable sources is coming from government companies and not from private companies at present. Investment is a key factor for decarbonising industrial activities, where the government must encourage private companions by providing loans at low interest rates. India has taken an initiative to promote compressed biogas, agriculture waste and other residue based oil supply. For instance, methanol based petroleum products are being blended with ethanol from sugar cane industries.

Growing energy demand also raises concerns about rising air pollution and carbon emissions. People are also concerned about energy justice, expecting highest standards and their requirement in terms of countability, transparency, inclusiveness and enhancing energy efficiency. In this regard, access to finance is important for energy production. The connectivity between India and Southeast Asian countries would facilitate a new phase of regional cooperation to support public-private partnership, strengthening international energy diplomacy. Both India and ASEAN should realise the common purpose of energy requirement and formulate practical policies and regulations.

India has energy trade for the different fuel, coal, petroleum products and electricity. India has huge potential for solar power, while, on the other side, we have country like Japan, which has contracted natural gas. There could be an agreement between supplying intermittent, storage backup power from Japan to the ASEAN region to India and supplying solar energy from India through same route. Southeast Asian countries should work towards enhancing regional dialogue forum with active political engagement at the borders or with immediate neighbours through diplomatic dialogue. India and ASEAN should enhance the regional dialogue forum, for which there is need for active political engagement with border region or immediate neighbours through diplomatic dialogue. There is also a need for market integration for the power sector. In addition, engagement of banks in facilitating private sector investment in the power sector should be encouraged in Power Purchase Agreement (PPA), followed by Nepal and Bhutan, has limited potential for power integration, thus, there is need for a fully functional power market, where spot purchases can be made. Also, expanding the concept of regional refinery and regional power plant for integrating the energy market is imperative.

The Asian region is the big player in energy transition and climate change issues. Asia is growing and the standard of living has increased, which makes the region a prominent energy consumer in the near future. About 43 per cent of the global energy demand has been contributed by China and India and by 2040 it is expected to reach 50 per cent. The energy demand of service based developed countries

is already high. Therefore, there is need for a different road map for developing countries in the South and Southeast Asian region, where 80 per cent of the world population consumes less energy. Thus, governments should focus on increasing energy demand by targeting the population living in this region to improve overall human life.

5. Energy Cooperation in the Covid-19 Period

The Covid-19 pandemic has distracted the energy outlook on both supply and demand. The pandemic altogether has changed the dynamics of economic strategy by creating opportunities for India and ASEAN to diversify the supply chain by being self-sufficient or by engaging in new production networks which will help in achieving sustainable goals and bring resilience to the energy system. Although it has created some opportunities such as diversifying the supply chain, where, ASEAN and India can take the lead. In addition, Covid-19 has given opportunity to many countries for formulating the stimulus package for economic recovery. Most of the stimulus packages focus on health sectors, employment creation, exploring opportunities to create new type of industries and also engaging in cross-border connection, particularly, connecting different electricity markets to bring down the electricity prices. In this regard, Southeast Asian countries should harness the potential opportunities that are created by the Covid-19 situation.

The disruption caused to China's global supply chain (which is the major supplier of solar panels, lithium-ion batteries and wind energy resources) due to Covid-19 has altered the economic strategy in the region. Now, India and ASEAN are looking forward to diversify resources either by producing itself or by engaging in production network for the new types of industries, which can help in creating new job opportunities and a cleaner and greener environment for the future generation.

South Asia and Southeast Asian countries have announced several stimulus packages targeting the health sector and industry recovery. Countries should also propose stimulus package to target long term impact to achieve sustainable goals including mainstream clean energy resources and bringing resilience of energy systems. Connecting through grid connectivity would possibly bring resilience energy system.

The post-Covid, economic growth would go down that result in low energy demand. Depending on the government stimulus package, economic would revive and the energy demand would increase. Besides, there would be a shortage of domestic finance in new energy infrastructure, because of the slow down in the economy which may affect prioritising the energy sectors to less carbon energy transition. Both South Asia and Southeast Asian countries should work together to take up the climate change plan of action and move forward with energy connectivity with a low carbon footprint.

The Covid-19 has caused volatility in oil prices in both South Asian and Southeast Asian region, which highly depends on fossil fuel and affects the energy market. Covid-19 has affected the energy transmission, resilience, sustainability, particularly, in the regional context, countries should address the sustainability issue. Besides, countries should also investigate the sustainable financial package for investors, both public and private to invest in the energy infrastructure.

India is the worst affected country due to climate change in comparison to any other country. India's energy demand still depends on coal-based of about 60 to 65 per cent and it will continue for 2040 unless any fundamental changes in the policy. Therefore, there is a need to emphasis on green sustainable goal. Singapore offer important lessons, where there is a whole government approach in integrating the energy ministry, logistic ministry and transport ministry to look at the energy sector through the interministerial approach.

The general opinion of energy and energy resources are the global commodity that leads to a global price for crude oil and LNG. However, the energy solution in one part of the region is different from other parts of the region. Therefore, we need to deglobalise energy sources. The country often uses local

energy resources, whether it is renewable or non-renewable in an optimistic way to meet the existing energy demand. Therefore, we need to look at the energy system not only at the national perspective but also at the nodal perspective, which means the focus should be on both energy sufficiency and energy efficiency. The Covid-19 situation has also made the country to move away from the supply chain. Countries should carefully be positioning themselves to secure the source of the energy system and ensure the energy supply and demand efficiency in the long-term perspective based on energy security, energy equity and energy sustainability.

Box 3: Recommendation of Energy Webinar Challenges and Prospects for Energy Connectivity in the Covid-19 Era 24 July, 2020

- Covid-19 has changed the supply and demand patterns of energy in the region, and the narratives of energy connectivity.
- Two scenarios are possible in the future: Green scenarios connecting the renewable energy through grids between North Eastern Region (NER) of India and ASEAN.
- Connecting through grid connectivity between South and Southeast countries would possibly bring resilience in the energy system. Besides, there is a need for proper grid connection within the region to supply the green stable surplus of hydropower.
- Pale scenario of LNG infrastructure connectivity, but scenario may improve once the current pandemic subsided.
- Targeted studies are required on comprehensive resource adequacy in India and solar supply chain development in ASEAN.
- Establish a Taskforce within energy related ministries to examine ASEAN-India cooperation to capitalise the opportunities available.

Source: Refer Annexure 1.

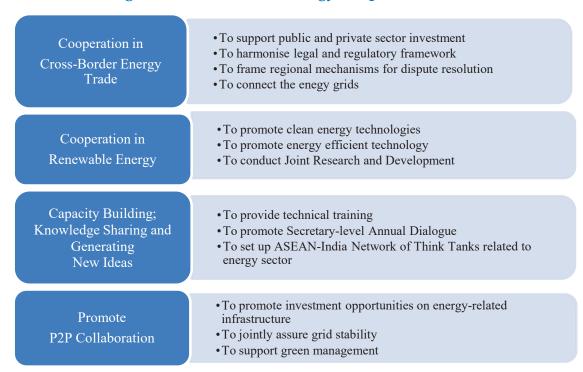
Connectivity is beneficial for energy security. For instance, Europe has experienced the supply security risk when they connected with Russia to import crude oil and natural gas and the connection benefited European countries for supply security. Similarly, India is larger than the ASEAN and ACMECS. If the countries of the region can connect with each other, it can improve access to electricity through enhanced electricity supply systems. Interconnection between the regions would benefit in terms of supply of surplus electricity to the deficit country. The interconnection would enable untapped electricity market for hydropower for India, Nepal, Bhutan and Myanmar. Connecting the grid system can also help to absorb more variable renewable energy such as wind, solar, etc. At the same time, countries are heading towards a decentralised energy system using renewable energies. This would lead to competition between technology and investment, where raise in energy technology would result in a reduction in the necessity for grid interconnection.

To initiate the regional connectivity, we need to connect the border areas of respective countries, particularly between India and Myanmar, which has one interconnection between India and Myanmar at Tamu and Moreh. Though the interconnection is small, it is a good example of regional connectivity which can make it quite unique. There are some hydropower projects in Myanmar, which has potential to exports power to India but no development so far. Myanmar also produces natural gas and signed several projects with international developers. Box 3 presents the policy recommendations to deal with the challenges due to Covid-19 pandemic.

6. Conclusions and Way Forward

Both ASEAN and India are committed to the Sustainable Development Goals. ASEAN and India have been working to ensure access to affordable, reliable, sustainable and modern energy for all by 2030 and aim to reduce global warming emissions by promoting different means of renewable energy source, which shows that there is need of deeper energy cooperation between ASEAN and India (Figure 5). The energy cooperation between ASEAN and India appears more promising if we consider the countries commitments under the ASEAN-India POA (2016-2020). ASEAN and India should engage in joint research and development in energy sector. Grid stability, cleaner deeper management and green management are the potential areas for cooperation. There are enormous business opportunities for private sector in both conventional and renewable energy sector in ASEAN and India.

Figure 5: ASEAN-India Energy Cooperation Outline



Source: Authors' own.

India can possibly engage in regional and sub-regional cooperation with SAARC, BIMSTEC and ASEAN. The gap in energy demand and supply in the SAARC and BIMSTEC regions offer a potential for regional cooperation. Some recommendations are as follows:

- Cooperation in renewable energy sector shall cover followings: (i) energy efficiency; (ii) technology cooperation; and (iii) joint research and development.
- While moving towards low-carbon growth path, trade in clean/green energy is essential. India and ASEAN shall work towards strengthening energy cooperation through trade in clean energy products.
- Thoughts on the One Sun One World One Grid (OSOWOG) vision, which is also aligned with green
 power cooperation and requires expansion of transmission lines for a more interconnected power
 grid in the region and beyond.
- India's leadership in solar energy can also serve as an important tool for spurring regional economic development.

- Development of Green Energy assets should be encouraged. Several countries have opted for Green Finance as an alternative mechanism to promote green energy.
- India's oil companies such as Indian Oil (and other oil companies) to improve their outreach in ASEAN.
- India may develop a structure for regional energy exchange along with their operational procedures and regulatory and commercial requirements for cross-border trade with ASEAN.
- Both ASEAN and India shall identify the technically and economically feasible cross-border interconnections. Besides, India and ASEAN shall improve investment environment in both electricity generation and transmission.
- ASEAN and India may consider harmonising legal and regulatory frameworks dealing with crossborder trade along with an Energy Charter Treaty for greater security for cross-border energy transfer related investments and transactions.
- Training and capacity building is another field, which offers immense learning opportunities, particularly in the renewable energy sector. India could play a vital role in providing training and building capacity in energy services for ASEAN countries.
- There are several investment opportunities in energy pipelines and energy-related infrastructure, showing scope of further P2P collaboration between ASEAN and India.
- ASEAN countries and India may undertake projects to support sustainable energy and livelihood.
 Energy cooperation between India and Myanmar in the border areas shall be taken up on priority basis.
- ASEAN and India may consider setting up an ASEAN-India Energy Forum (AIEF), starting Secretary-level annual dialogue in energy cooperation and also between the energy think-tanks of ASEAN and India. Also setting up of ASEAN-India Network of Energy Think-Tanks (AINETT) may pave the way in generating knowledge products and new ideas.

Endnotes

- 1. Refer, for example, Delhi Declaration (2018).
- 2. Refer, ASEAN Secretariat (2015).
- 3. Refer, for example, IRENA (2016).
- 4. Refer, https://sustainabledevelopment.un.org. Also refer, Gielen et al (2019)
- 5. Refer, for example, https://www.hydrocarbons-technology.com/news/india-plans-establish-lng-import-terminal-myanmar/
- 6. Delivered at the seminar on 'Assessing India's Connectivity with Its Neighbourhood', organised by VIF on 3 August 2018 in New Delhi
- 7. The project was later permanently shelved.
- 8. This section draws upon inputs received from the ASEAN Centre for Energy (ACE).
- 9. Refer, for example, EXIM Bank (2018)
- 10. Refer, ACE (2015)
- The first APAEC (1999-2004), the second APAEC (2004-2009) and the third APAEC (2010-2015) has been phased to support the energy cooperation agenda under the ASEAN Vision 2020.
- 12. Refer, ACE (2015)
- 13. Ibid.
- 14. Ibid
- 15. Based on the inputs received from the ASEAN Centre for Energy (ACE)

- 16. Refer, The ASEAN Post (2018)
- 17. Ibid.
- Post 1997-98 financial crisis, ASEAN countries started meeting regularly with Northeast Asian countries, which is known as ASEAN+3 grouping (ASEAN + Japan + South Korea + China).
- 19. Refer, ACE (2017).
- 20. Refer, Nicolas (2009) for more details.
- 21. Refer, for example, IEA (2020).
- 22. Refer, for example, Down To Earth (2017).
- 23. Refer, for example, IEA (2020).
- ^{24.} So far 86 countries have signed among which 66 countries have been ratified the ISA framework Agreement till March 2020. http://isolaralliance.org/MemberCont.aspx
- 25. Refer, for example, IRENA (2017)
- 26. Refer, for example, Venkatachalam et. al. (2019)

References

- ACE. 2015. ASEAN Plan of Action for Energy Cooperation (APAEC) 2016-2025. ASEAN Centre for Energy, ASEAN Secretariat, Jakarta
- 2017. ASEAN Energy Cooperation Report 2017. ASEAN Centre for Energy, ASEAN Secretariat, Jakarta.
- AIC-RIS. 2015. "Chapter 8: Energy Market Integration and Cooperation", in AIC-RIS (ed.) ASEAN-India Development and Cooperation Report 2015, Routledge, New Delhi
- ASEAN Secretariat. 2015. ASEAN-India Plan of Action (POA) 2016-2020 outlines the energy cooperation between ASEAN and India. Available at: https://asean.org/wp-content/uploads/images/2015/August/POA_India/ASEAN-India%20POA%20-%20FINAL.pdf
- Bhattacharya, A. and Bhattacharya, T. 2014. *ASEAN-India Gas Cooperation: Redefining India's "Look East" Policy with Myanmar*. ERIA Discussion Paper Series, No.19, Economic Research Institute for ASEAN and East Asia, Jakarta
- Gielenac, D., Boshella, F., Sayginb, D., Bazilianc, Morgan D., Wagnera, N., Gorinia, R. 2019. The role of renewable energy in the global energy transformation. *Energy Strategy Reviews*, Volume 24, April 2019, Pages 38-50
- Delhi Declaration. 2018. Delhi Declaration of the ASEAN-India Commemorative Summit to mark the 25th Anniversary of ASEAN-India Dialogue Relations. Ministry of External Affairs (MEA), Government of India. Available at: https://www.mea.gov.in/bilateral-documents.htm?dtl/29386/Delhi_Declaration_of_the_ASEANIndia_Commemorative_Summit_to_mark_the_25th_Anniversary_of_ASEANIndia_Dialogue_Relations
- Down To Earth. 2017. India Could achieve it 2030 climate targets. Available at: https://www.downtoearth.org.in/news/climate-change/-india-could-achieve-its-2030-climate-targets--59067
- ESCAP. 2013. Regional Cooperation for Energy Access and Energy Security in South and South-West Asia: Prospects and Challenges. UN ESCAP South and South-West Asia, Development Papers 1302. United Nations Economic and Social Commission for Asia and the Pacific, Bangkok.
- EXIM Bank. 2018. Strengthening ASEAN-India Partnership: Trends and Future Prospects", Export-Import Bank of India, Mumbai. Available at: https://www.eximbankindia.in/Assets/Dynamic/PDF/Publication-Resources/ResearchPapers/88file.pdf (assessed on 14 September 2019)
- Gielen, D., Boshell, F., Saygin, D., Bazilian, M.D., Wagner, N., and Gorini, R. 2019. The role of renewable energy in the global energy transformation. *Energy Strategy Reviews*, Vol. 24, pp. 38–50.
- Hermawanto, B. 2016. ASEAN Power Grid: Powering the Region. MoFA Korea and UNESCAP, Seoul, 15 December. Available at: https://www.unescap.org/sites/default/files/Session%204.1.%20Bambang%20Hermawanto_ASEAN.pdf (Accessed on 14 September 2019)

- IEA. 2014. The Asian Quest for LNG in a Globalising Market. The International Energy Agency (IEA), pp. 1-140. Available at: https://www.iea.org/publications/freepublications/publication PartnerCountrySeriesTheAsianQuestforLNGinaGlobalisingMarket.pdf (accessed on 12 September 2019)
- 2020. India 2020: Energy Policy Review. International Energy Agency Publications. Available at: https://niti.gov.in/sites/default/files/2020-01/IEA-India%202020-In-depth-EnergyPolicy_0.pdf
- IPPAI. 2011. New Paradigms for India's Regional Energy Trade. posted on 07 October 2011, Independent Power Producers Association of India Publications.
- IRADe. 2014. Cross-Border Trade in South Asia: Challenges and Investment Opportunities. South Asia Investor's Workshop on 'Cross-Border Electricity Trade' 24th–25th September 2014, New Delhi, India. Available at: https://irade.org/CBET-in-SA-Challenges-and-Investment-Opportunities-Sept-2014.pdf (assessed on 14 September 2019)
- IRENA. 2016. Renewable Energy Outlook for ASEAN. ASEAN Centre for Energy, ASEAN Secretariat, Jakarta, pp.1-108. Available at: http://www.indiaenvironmentportal.org.in/files/file/Renewable%20Energy%20 Outlook%20for%20ASEAN.pdf (assessed on 14 September 2019)
- 2017. REMAP: Renewable Energy Prospects for India. IRENA Working Paper, May. Available at: https://www.irena.org/-/media/Files/IRENA/Agency/Publication/2017/May/IRENA_REmap_India_paper_2017.pdf
- Kumar, A. 2018. Electricity trade in South Asian could grow up to 60,000 MW through 2045. *The Economic Times*, 9 November, 2018. Available at: https://energy.economictimes.indiatimes.com/news/power/electricity-trade-in-south-asian-could-grow-up-to-60000-mw-through-2045/66477793
- Livemint. 2018. India plans to set up LNG terminal in Myanmar. *Livemint*, 3 August. Available at: https://www.livemint.com/Politics/ckXNRIKEAXIkxEgx7cQ3nI/India-plans-to-set-up-LNG-terminal-in-Myanmar.html
- MEA. 2018. Delhi Declaration of the ASEAN-India Commemorative Summit to mark the 25th Anniversary of ASEAN-India Dialogue Relations. Ministry of External Affair, Government of India. Available at: https://www.mea.gov.in/bilateral-ocuments.htm?dtl/29386/Delhi_Declaration_of_the_ASEANIndia_Commemorative_Summit_to_mark_the_25th_Anniversary_of_ASEANIndia_Dialogue_Relations
- Ministry of Power. 2016. Report on the feasibility of Additional Interconnection between India and Bangladesh. Joint Technical Team of India and Bangladesh, Government of India, July 2016, India. Available at: http://164.100.60.14/reports/committee/scm/ner/agenda_note/annex3.pdf
- Nicolas, F. 2009. *ASEAN Energy Cooperation: An Increasingly Daunting Challenge*. The Institut Français des Relations Internationales (IFRI), pp.1-28. Available at: https://inis.iaea.org/collection/NCLCollectionStore/Public/42/050/42050163.pdf
- Sharma, S. V. 2014. Energy Trade Practices in India: Review of Tariff and Non-Tariff Barriers in Relation to ASEAN. In Han, P. and F. Kimura (eds.), *Energy Market Integration in East Asia: Energy Trade, Cross Border Electricity, and Price Mechanism,* ERIA Research Project Report FY2013, No.29. Jakarta: ERIA, pp.27-62.
- The ASEAN Post. 2018. The need for renewable energy cooperation. *The ASEAN Post*. Available at: https://theaseanpost.com/article/need-renewable-energy-cooperation
- TOI. 2018. India, Nepal open first cross-border pipeline in South Asia. *The Times of India* (TOI), 11 September 2018. Available at: https://timesofindia.indiatimes.com/india/india-nepal-open-first-cross-border-pipeline-in-south-asia/articleshow/71072041.cms
- The Tribute Online, Foreign Affairs. PM says 'historic' as India begins power export to Bangla. Available at: http://www.thetribuneonline.com/foreign-archives26.html.
- Venkatachalam, A., Kutani, I. and Lama, M. P. 2019. *Energising Connectivity between Northeast India and its Neighbours*. Economic and Research Institute for ASEAN and East Asia (ERIA), Jakarta.
- Wijayatunga, P. and Fernando, P.N. 2013. *An Overview of Energy Cooperation in South Asia*. South Asia Working Paper Series, No.19, Asian Development Bank (ADB), Manila.

Appendix 1









Webinar Challenges and Prospects for Energy Connectivity in the Covid-19 Era 24 July, 2020

KEY RECOMMENDATIONS

- The ASEAN-India Centre (AIC) at RIS jointly with the Confederation of Indian Industry (CII), New Delhi; Energy Studies Institute (ESI), National University of Singapore (NUS), Singapore; and Economic Research Institute of ASEAN and East Asia (ERIA), Jakarta organised a webinar titled "Challenges and Prospects for Energy Connectivity in the Covid-19 Era" on 24 July 2020. Panellists were from prominent think-tanks and universities of South Asia and Southeast Asian countries. More than 40 participants attended, viewed the webinar discussion and took part in the Q&A session.
- The Webinar has covered two major sessions: examining key energy trends in the South and Southeast Asia, and challenges and prospects for energy cooperation between India and Southeast Asia. Both the sessions discussed the crucial features of energy security and trends in energy connectivity in the South and Southeast Asian regions and the way forward. The major outcomes are as follows:
 - Energy cooperation is felt important to address energy poverty. Countries should work together
 to achieve Sustainable Development Goal (SDG) Goal 7, and ensure the access to energy at an
 affordable, reliable, sustainable and modern energy for all.
 - There is a need for international policy coherence, where an international organisation like the WTO should put its effort to encourage the developing nations to promote renewable energy. The policy coherence helps to promote solar, renewable, wind and other forms of energy by providing incentives to developing and least developed countries, which in turn would enable us to live in a lesser carbon footprint. To achieve the Paris climate change targets, efforts must also be made by both the public and private sectors.
 - Focus should be on both energy sufficiency and energy efficiency. The Covid-19 situation has also
 made the country move away from the supply chain. Countries should carefully be positioning
 themselves to secure the source of the energy system and ensure the energy supply and demand
 efficiency in the long-term perspective based on energy security, energy equity and energy
 sustainability. Countries should not only do just mitigations, but also aim for adaptations.
 - South Asia and Southeast Asian countries should harness the opportunities created by the Covid-19 situation. The energy cooperation between ASEAN and India is relevant as it would help share the best practices between South and Southeast Asia.

- Oil companies are moving towards the low carbon emission facilities by having renewable energy. Countries must facilitate investment which is a key factor for decarbonising industrial activities. India has taken an initiative to promote compressed biogas, agriculture waste and other residues based oil supply. For instance, methanol-based petroleum products are being blended with ethanol from sugarcane industries.
- Future lies in regional energy connectivity with proper energy mix that would reshape the
 overall power trade. In this regard, a pilot project can also be conducted either in Nepal and
 India or Bangladesh to look for an optimal energy mix with the modern, sustainable, affordable,
 reliable power system in the region.
- Both South and Southeast Asian countries should work together to take up the climate change
 plan of action and move forward with energy connectivity with a low carbon footprint. There
 is a need for proper grid connection within the region to supply the green stable surplus of
 hydropower.
- The connectivity between South and Southeast Asia would facilitate a new phase of regional cooperation to support public-private partnership and strengthen international energy diplomacy.
- There should be a fully functioning power market, where spot purchase can be done. Countries
 may expand the concept of regional refinery and regional power plant for integrating the energy
 market.
- South Asia did not have proper transmission connectivity. Connecting through grid connectivity between South and Southeast countries would possibly bring resilience in the energy system.
- To initiate the regional connectivity, we need to connect the border areas of respective countries, particularly between India and Myanmar, which has at present one interconnection at Tamu (Myanmar) and Moreh (India). Though the interconnection is small, it is a good example of regional connectivity, which makes it quite unique.
- India's involvement in the interconnection would help Myanmar for better connectivity. There is a need for political trust, and engaging external regional partners in the power connectivity would help minimise the geopolitical issues.
- Countries should learn from best practices in coordination. Country like Singapore, where the entire government has attempted to integrate the energy ministry, logistic ministry and transport ministry to work at the energy sector through the inter-ministerial approach.
- ASEAN and India shall aim for a single LNG market and view LNG as a tool for energy cooperation between ASEAN and India.
- Participants recommended that there is a need for inter-governmental meeting/taskforce to explore the unfolding opportunities.
- It is recommended that ERIA and partner organisations of today's webinar shall conduct a new study on energy sector as a whole that may help to enhance the future extraction of energy resources.
- Most of the energy studies have focused on ASEAN, but not much on South Asia. A detailed study in the South Asian region on the possible regional energy connectivity and cooperation will help strengthen energy linkages between them.
- Finally, following key conclusions arrived in from the webinar:
 - » Covid-19 has changed the supply and demand patterns of energy in the region, and the narratives of energy connectivity.
 - » Two scenarios are possible in the future: Green scenarios connecting the renewable energy through grids between North Eastern Region (NER) of India and ASEAN.

- » Connecting through grid connectivity between South and Southeast countries would possibly bring resilience in the energy system. Besides, there is a need for proper grid connection within the region to supply the green stable surplus of hydropower.
- » Pale scenario of LNG infrastructure connectivity, but scenario may improve once the current pandemic subsided.
- » Targeted studies are required on comprehensive resource adequacy in India and solar supply chain development in ASEAN.
- » Establish a Taskforce within energy related ministries to examine ASEAN-India cooperation to capitalise the opportunities available.

10

Dealing with Corona Pandemic: ASEAN-India Cooperation

1. Introduction

The world is experiencing an unprecedented health crisis due to the Coronavirus pandemic. ASEAN and India have been badly affected in terms of both human health and economic conditions. According to the World Health Organisation (WHO), as on 18 October 2020, about 39.77 million people have been infected and 1.11 million people died due to the Covid-19 virus. ASEAN with 8,29,778 total cases (more than 1,61,188 active cases) and 20,177 deaths; and India with 7.49 million total cases (more than 8,97,342 active cases) and 1,14,064 deaths rank among the top three affected countries/region in the world (see Table 1). ASEAN and India at various capacities have undertaken different measures and show preparedness to tackle the present challenges. Testing, tracking and treating (3Ts) are the common objective of ASEAN countries and India to overcome the Coronavirus-driven health crisis.

Besides lockdown, ASEAN countries have imposed strict travel restrictions and a ban on all mass gatherings. Brunei Darussalam, Cambodia, Lao PDR, Myanmar and Vietnam have few confirmed Covid-19 cases. Due to less number of cases in Lao PDR, a nationwide lockdown was gradually lifted than many other ASEAN countries, and most businesses have already resumed their activities, except mass gathering, which is still restricted. Vietnam has taken early steps to protect the country from pandemic in ASEAN region and has been successful in controlling the spread of the virus by imposing several strict measures. Till date, none died from the Covid-19 in Vietnam, Cambodia and Lao PDR. On the other hand, some countries have been struggling to cope up with the Covid-19 outbreak due to lack of resources. Countries like Indonesia, Malaysia, Singapore, and the Philippines have been experiencing different stages of pandemic and taken a series of measures to stop the spread of the virus and protect the economies from the ongoing crisis. India, on the other hand, has initiated several measures to control the Coronavirus spread including extended lockdown for more than three months, imposed travel restrictions (both domestic and international), closed public places like gyms, theatres, shopping malls, restaurants, and education institutions, etc. and has banned mass gatherings; and, at the same time, has also facilitated the remote work and businesses with help of the digital technology.

The objective of this chapter is to present the responses of ASEAN and India in dealing with Covid-19, and discuss the areas of cooperation between India and ASEAN.¹ Rest part of the chapter is organised as follows. Chapter 2 presents ASEAN Plus countries' engagement in response to Covid-19, followed by India's engagement in ASEAN in response to Covid-19 in Section 3. Section 4 presents the new strategy of India-ASEAN engagement. Section 5 discusses the areas of emerging cooperation between India and ASEAN, and Section 6 presents the way forward.

Country	Total	Total	Total	Total Cases	Deaths	Tests
•	Cases	Deaths	Recovered	(Per million population)		on)
India	74,94,551	1,14,064	65,97,209	5,415	82	68,080
Indonesia	3,57,762	12,431	2,81,592	1,304	45	14,651
The Philippines	3,54,338	6,603	2,95,312	3,221	60	39,391
Singapore	57,911	28	57,798	9,876	5	5,61,103
Myanmar	34,875	838	16,370	640	15	9,131
Malaysia	19,627	180	12,561	604	6	57,345
Thailand	3,686	59	3,481	53	0.8	13,999
Vietnam	1,126	35	1,031	12	0.4	12,772
Cambodia	283		280	17		9,638
Brunei	147	3	143	335	7	1,44,161
Lao PDR	23		22	3		8,136
ASEAN	8,29,778	20,177	6,68,590	1,607	17	87,033

Table 1: Covid-19 Scenario in India and ASEAN

Note: As of 18 October 2020.

Source: World Health Organisation (WHO).

2. ASEAN Plus Countries in Response to the Covid-19

ASEAN has been engaged with several meetings with its dialogue partners and has issued a joint statement in response to Covid-19 through video conferencing and telephonic conversations. The ASEAN and ASEAN Plus Three Health Ministers issued a joint statement on 7 April 2020 pledging coordinated efforts to combat the virus outbreak within the ASEAN as also work with the dialogue and development partners, respectively. On 14 April 2020, ASEAN, China, Japan, and Korea held the Special ASEAN Plus Three (APT) Summit on Coronavirus Disease through video conference and issued a joint statement, declaring their commitment to sharing technical, material, and financial support that are critical in sustaining strained national health systems. It has even created an 'APT reserve' of essential medical supplies. Similarly, the ASEAN Plus Three Field Epidemiology Training Network (ASEAN +3 FETN) has conducted three informal video-conferences (11 May, 26 May and 1 June 2020) to exchange experiences on the latest developments of national responses to Covid-19 outbreaks and how field epidemiologists played important roles in implementing these responses.²

At the bilateral level, ASEAN has initiated projects with China, India, Japan, Russia, EU and the United States on technical knowledge-sharing and multi-sectoral coordination for Covid-19 through an exclusive dialogue mechanism (see Box 1). China has committed to providing international aid over two years to support nations affected by the pandemic of about US\$ 2 billion, coordination with the UN to establish a global humanitarian crisis response hub in China and provision of any vaccine as a global public good.³ South Korea has initiated a project to enhance the diagnostic capacity by providing the test kits and training of Covid-19 to the ASEAN countries. It may include personal protective equipment, chemical reagent, diagnostic test kits and/or PCR (Polymerase Chain Reaction) along with on-site training.⁴ The United States has offered assistance to ASEAN member states to combat the spread of Covid-19, including the provision of over US\$ 35.3 million and also assured its commitment to providing international public health assistance and offered continued support in need of additional assistance. ASEAN and Japan have initiated the ASEAN-Japan Economic Resilience Action Plan by mobilising the collective knowledge with the view to contribute to both economies and overall efforts to strengthen economic resilience to

the pandemic. The European Union (EU) has offered €350 million (US\$ 378 million) to assist ASEAN countries in the battle against Covid-19. The funds will be allocated for, among others, addressing the health crisis, strengthening healthcare systems and alleviating economic and social impacts from the pandemic. ASEAN is open to both bilateral and multilateral cooperation in response to Covid-19 with all its dialogue partners. India has also extended major support and agreed on joint initiatives to fight against the pandemic and step up cooperation to revive the economy from the ongoing crisis.

3. India's Engagement in ASEAN in Response to the Covid-19

India and ASEAN have adopted the Plan of Action (POA) for 2021-25 that envisages greater cooperation in areas ranging from trade to maritime security and counter-terrorism. The plan of action will help the two sides to work towards the ASEAN 2025 vision for an economically integrated and rules-based grouping that narrows the development gap and enhances connectivity. Both sides will also cooperate on common challenges and enhance coordination at international forums.

India has reaffirmed the country's commitment to the neighbouring countries under the 'Neighbourhood First' Policy, to enhance cooperation and mutual support to control and contain the spread of the virus. India outreaches the SAARC countries and Island nations (Maldives, Mauritius, Madagascar, Comoros and Seychelles) via video conferencing and has provided medical assistance, essential medicines and food items. India has also extended its assistance eastwards to reinforce the Act East Policy (AEP). Indian Prime Minister had video conferencing with several leaders of the ASEAN member states on a potential regional and bilateral response to the Covid-19 (Table 2).

Philippines Cambodia Singapore Indonesia Myanmar Malaysia Thailand Lao PDR Vietnam Brunei Head to Head - Telephonic / V $\sqrt{}$ $\sqrt{}$ V Video Conferencing Repatriation of stranded V $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ (Vande Bharat Mission) Sharing information and $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ exchange of experts Distribution of Medical and $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ Pharmaceutical supplies India received support from $\sqrt{}$ **ASEAN**

Table 2: India's Engagement in ASEAN in Response to Covid-19

Note: As on August 2020. Empty cell presents data/information not available.

Source: Authors' own based on several secondary sources.

India has launched 'Vande Bharat Mission' in seven extended phases of major exercise to repatriate Indian citizens across the world. Through this mission, India has repatriated thousands of Indian citizens from ASEAN countries and also extended help to ASEAN countries to bring back their citizens from India (Table 3).

Box 1: ASEAN Engagements with ASEAN Plus in Response to Covid-19

- ASEAN Plus Three Senior Officials Meeting for Health Development (APT SOMHD) Mechanism Responding to Covid-19, 4 February 2020
- ASEAN and the European Union (EU) convened a ministerial-level video conference to discuss the Coronavirus Disease 2019 (Covid-19), 20 March 2020
- ASEAN-China enhance cooperation on Covid-19 pandemic response, 31 March 2020
- ASEAN Health Ministers and ASEAN Plus Three Health Ministers in Enhancing Cooperation on Covid-19, 7 April 2020
- Special ASEAN Plus Three Summit on Coronavirus Disease 2019 (Covid-19), 14 April 2020
- ASEAN Japan Economic Ministers' on Initiatives on Economic Resilience in Response to the Corona Virus Disease (Covid-19) Outbreak, 22 April 2020
- Special ASEAN-United States Foreign Ministers' Meeting on Coronavirus Disease 2019 (Covid-19), 23 April 2020
- The ASEAN Plus Three Field Epidemiology Training Network (ASEAN +3 FETN), 11 May; 26 May and 1
 June 2020
- ASEAN-China Economic Ministers' Joint Statement on Combating the Coronavirus Disease (Covid-19) and Enhancing ACFTA Cooperation, 29 May 2020
- ASEAN Plus Three Economic Ministers' Joint Statement on Mitigating the Economic Impact of The Covid-19 Pandemic, 4 June 2020
- The 20th ASEAN-India Joint Cooperation Committee Meeting, 12 June 2020
- ASEAN-Russia Foreign Ministers Meeting on Coronavirus Disease 2019 (Covid-19), 17 June 2020
- ASEAN, OECD Release Policy Insight on Boosting Resilience of MSMES Amidst Covid-19 Pandemic, 27
 June 2020
- Canada Donates Personal Protective Equipment to ASEAN for Covid-19 Prevention, 30 June 2020
- ASEAN EOC Network, France hold Video Conference on Covid-19 Policies, 2 July 2020
- Co-Chairs' Statement of the Special ASEAN-Australia Foreign Ministers' Meeting on Covid-19, 6 July 2020
- ASEAN, India to Further Strengthen Strategic Partnership, 17 July 2020
- Joint Statement of ASEAN and China Transport Ministers on Ensuring Smooth Transport and Logistics to Combat Covid-19 and Reactivate the Economy, 16 July 2020
- ASEAN Policy Brief, 24 July 2020
- ASEAN-Australia Health Experts' Meeting On Covid-19, 29 July 2020
- AEM, METI Adopt 52 Strategic Measures of the ASEAN-Japan Economic Resilience Action Plan, 29 July 2020
- ASEAN, ROK Commit to Further Strengthen Partnership, 26 August 2020
- ASEAN Plus Three Plan of Action on Mitigating the Economic Impact of the Covid-19 Pandemic, 25 August 2020
- ASEAN-ROK Economic Ministers' Joint Initiatives on Bolstering the Economic Connectivity between ASEAN-Republic of Korea in Response to the Covid-19 Outbreak, 29 August 2020
- ASEAN, ROK to hold Webinar on Smart Tourism Amid Covid-19, 3 September 2020
- Asia-Europe Meeting (ASEM) Statement on Coronavirus Disease (Covid-19), 5 September 2020
- ASEAN and the Pacific Alliance to Forge Closer Relations in the Midst Of Covid-19 Pandemic, 29 September 2020
- Chairman's Press Release of The Open-ended TROIKA Virtual Meeting Between ASEAN Foreign Ministers and The Foreign Secretary of the United Kingdom on Covid-19, 30 September 2020

Source: Authors' compilation based on ASEAN Secretariat for the period between February and September 2020.

Table 3: Vande Bharat Mission between India and ASEAN Countries

Phase	ASEAN	Number of Flights	Indian Cities Covered
1	Singapore	5	Amritsar
	Malaysia	5	Ahmedabad
	The Philippines	3	Bengaluru
	Indonesia	4	Bhubaneshwar
	Malaysia	5	Chennai
2	Myanmar	1	Coimbatore
2	Singapore	4	Delhi
	The Philippines	5	
	Thailand	1	Hyderabad
	Malaysia	11	• Kochi
2 Additional	Singapore	18	• Jaipur
and 2 ++	Thailand	1	• Mumbai
	Vietnam	1	• Madurai
	Singapore	6	Lucknow
	The Philippines	3	Trichy
2	Thailand	2	• Vijayawada
3	Cambodia	1	Vijayawada Vishakhapatnam
	Malaysia	1	Kolkata
	Vietnam	1	
	Singapore	23	• Guwahati
	Malaysia	15	
4	The Philippines	6	
	Vietnam	2	
	Thailand	1	
	Singapore	35	
	Malaysia	19	
5	The Philippines	5	
	Thailand	3	
	Myanmar	1	
	Singapore	44	
	Malaysia	16	
6	Thailand	6	
6	The Philippines	5	
	Cambodia	1	
	Vietnam	1	
	Singapore	42	
	Malaysia	16	
7	Myanmar	2	
,	Thailand	2	
	Cambodia	1	
	Vietnam	1	

Note: Phase 2 is executed as Phase 2, Phase 2 Additional, and Phase 2 ++, respectively; *As on end September 2020. *Source:* Authors' own based on Ministry of External Affairs of India (MEA), Government of India.

India is working with ASEAN partners in supplying pharmaceutical products, exchange of experts and sharing of information in the field of public health. For instance, India has supplied Hydroxychloroquine (HCQ) tablets to Malaysia. India has supplied masks, sanitizers, and medicines and medical equipment to the Philippines, Myanmar, Cambodia, Indonesia, Lao PDR and Thailand. India has also received assistance from Singapore such as testing kits and other essential equipment. Both ASEAN and India can further cooperate under the existing mechanisms in the area of health and pandemic preparedness and response (as per the Plan of Action (2016-2020)), including capacity building, laboratory networking, joint work to engage in research and development (R&D) to develop pharmaceutical products, traditional medicines, epidemiology, etc., encourage pharmaceutical trade and manufacturing capabilities for drugs and diagnostics. The ASEAN-India POA (2016-2020) outlines:

- "3.3.1 Work together to enhance ASEAN's preparedness and capacity in responding to communicable and emerging infectious diseases including pandemics and other potential public health and biological threats. Preparedness planning, prevention efforts and capacity building would include, among others, the strengthening of areas on surveillance, laboratory networking, human resource capacities and information networking;
- 3.3.2 Work towards developing affordable quality medicines and traditional medicines that is accessible to the people, and explore the development of a framework for cooperation in these areas as appropriate;
- 3.3.3 Promote sharing of information and exchange of experts in the field of public health, medicine, health education and promotion."⁷

ASEAN and India may initiate a Joint Statement or a Declaration on India-ASEAN Covid-19 Response to reaffirm the commitments to enhance their strategic cooperation and mutual support to stop the spread of Covid-19 and strengthen joint efforts toward post-pandemic recovery. Recently, ASEAN and India at the 20th ASEAN-India Joint Cooperation Committee (AIJCC) Meeting, held via video-conferencing on 11 June 2020, reaffirmed their commitment to further strengthen and deepen their cooperation. At this meeting, both parties also shared their commitment to complete the development of the new Plan of Action for 2021-2025 to further strengthen their strategic partnership over the next five years. Both ASEAN and India have agreed to enhance the cooperation in the areas of health emergency and medicine, transnational crime, trade and investment, environment, education, sustainable development, energy, smart cities, connectivity, people-to-people contacts as well as narrowing the development gap in ASEAN.

4. Charting out a New Strategy of India-ASEAN Engagement

The Covid-19 has far-reaching impacts and implications for the economic crisis across the world. The impact of the economic crisis is deep-rooted to different sectors of the economy and has affected both poor and rich. The vulnerable sectors such as health, transport, tourism, hospitality industry, SMEs, etc. have faced the hardest hit by this crisis. Every country has been trying to deal with the socio-economic impact of the Covid-19 and revive the economy by giving various stimulus packages. Both ASEAN countries and India have announced several stimulus packages. For instance, India, Indonesia, Thailand and Vietnam have allotted more than 10 per cent of GDP and Malaysia and Singapore allotted more than 20 per cent of GDP as an economic stimulus package. Both ASEAN and India have also focused on MSMEs. In particular, ASEAN countries have focused primarily on four sectors, namely, travel, tourism, MSME and agriculture. India has announced a comprehensive package, which extensively covers both formal and informal sectors, supports the migrant labours through various welfare schemes; provided subsidies, tax concession and granted bank loans with no collateral to revive the MSMEs. Table 4 illustrates policy measures in response to the Covid-19 by ASEAN and India.

	Stimulu	s Package	efits	he			o :or	
Country	(US\$ billion)	Share in GDP (%)	Welfare Benefits	Support to the Health care Sector	Ease of Tax	Support to MSMEs	Assistance to Priority Sector	Regulatory Measures in Banking
India	376.39	13.38	√	√	√	√	√	√
Brunei	0.32	2.66	√	√	√	√		
Cambodia	2.21	8.27	√	√	√	√		√
Indonesia	115.78	10.94	√	√	√	√	√	√
Lao PDR	0.03	0.16	√		√	√		√
Malaysia	80.78	22.73	√	√	√	√	√	
Myanmar	0.098	0.13	√	√	√	√		√
The Philippines	21.45	5.38	√	√	V	√	√	√
Singapore	92.12	26.2	√	√	√	√		√
Thailand	84.09	15.96	√	√	√	√	√	√
Vietnam	26.50	10.12	√	√	√	√	√	√

Table 4: Policy Measures in Response to Covid-19 in ASEAN and India

Note: Priority sectors include agriculture, tourism, transportation sector. Empty cell presents data/information not available. *Source*: Authors' own based on ADB, IMF Policy Tracker of Covid-19 and media sources.

Differing perceptions and perspectives require inputs and participation of civil society, business and non-governmental organisations, and media to have a better understanding. Media plays a vital role in shaping a country's perception vis-à-vis others. Presently, India-ASEAN relations are more of intergovernmental interactions, and the civil society business groups are not involved as much as it should be in their engagements. Strengthening media cooperation and dissemination of right information could be very helpful in mitigating perception gaps. Further, India and ASEAN should look at each other's strengths and experiences and turn their relationship and interactions to be more productive and meaningful without giving too much thought to what a third party can impinge in their relationship. India will have to be proactive in finding an alternative route to get access to the value chains in the region. The onus for this is not just on India, but also on ASEAN countries, which will have to come out of their comfort zones of the current situation and be little more receptive to India's concerns. After all, it takes two to tango.

The current scenario has also created new opportunities in the areas of Information Technology and IT-enabled Services (ITeS). The significance of digital connectivity has been realised in education, medical, legal and other consultancy-based services. Both bilateral and multilateral level diplomatic engagements have been happening via video-conferencing. ASEAN and India can work together to strengthen digital connectivity, where e-learning, e-commerce, on-line meetings and official interaction in the virtual platform, etc. are going to be the new normal. ASEAN countries can also explore utilising the US\$ 1 billion special fund, offered by India to support infrastructure and digital connectivity, thereby reaffirming the outcomes of the 20th ASEAN-India JCCM. Besides, India may extend technological and financial assistance to the CLMV countries in the areas of tele-education and tele-medicine. Both ASEAN and India are rich in ancient knowledge of traditional medicines. Digital archiving and joint research and development (R&D) initiatives would help reviving the traditional medicine linkage and exchange.

The pandemic has also created an opportunity to promote trade and investment through realigning the supply chain by attracting foreign direct investment (FDI), which may likely to move out from China. Multinational corporations have also realised to look for sustainable supply chains by diversifying the plants and investments across countries, instead of relying on one single country. Therefore, ASEAN and India can leverage the emerging scenario and support each other to build new and stronger supply chains. Some of the ASEAN countries are already well integrated with the global value chains, which will help regaining the faith of the global investors. New supply chains may offer new business opportunities to MSMEs, which are presently suffering from the lack of orders.

India may consider joining the Chiang Mai Initiative (multilateral currency swap arrangement) at this time when currency swapping is an important step to stabilise the macroeconomic situation, thereby facilitating trade and investment. As an alternative, bilateral swapping may be taken up instead of waiting for a multilateral mechanism to respond.

The new normal in the post-pandemic world has been posing anti-globalisation and anti-multilateralism challenges that may distort the global supply chains or derail the emergence of new supply chains. Therefore, ASEAN and India should work together to not only to strengthen and protect the multilateralism and reform the multilateral system but also to promote a more inclusive, responsive and participatory international governance architecture.

The nature of trade flows in post-Covid-19 may likely be technology- and health- oriented. Both ASEAN and India may focus on sectors like healthcare, education, green energy, traditional medicine for collaboration. ASEAN is one of the largest recipients of Indian tourists. ASEAN and India may adopt a road map to revive the tourism sector, which is deeply hurt due to the Covid-19. Besides, there are huge business opportunities for SMEs and Start-ups in the post-Covid-19, particularly, in digital connectivity, e-commerce, cross-border delivery services, logistics business, etc. Also, ASEAN and India can explore the value chain linkages in the pharmaceutical sector.

5. Areas of Emerging Cooperation between India and ASEAN

What are the areas that need to be focussed in the current situation to provide new impetus to India's Act East Policy (AEP)? Supply chain management (SCM), public health, education and skill development, and grey areas in the security and strategic affairs need greater attention.

In his opening remarks by the Deputy Prime Minister and Minister of Foreign Affairs of Thailand at the inaugural Session of the 6th ASEAN-India Network of Think Tanks (AINTT) on "ASEAN-India: Strengthening Partnership in the Post Covid Era" on 20 August 2020, has practically given a future road map identifying five areas, brilliantly put forth eloquently in the acronym, SHARE – Supply chain, Health, Academics, Regional, Environment. To quote the Deputy Prime Minister: "the ASEAN-India Strategic Partnership should be taken forward at this critical time, threaded together by a simple yet powerful word spelt S-H-A-R-E, or SHARE." Supply chain management (SCM) enables enterprises to source the materials necessary to create a product or service and deliver that product or service to customers. India and ASEAN need to deepen their collaboration to diversify and make their supply chain resilient. As India is seeking to become a stronger, more self-reliant country under the 'Atmanirbhar Bharat' initiative, ASEAN stands ready to work with India in supporting our key industries and integrating them into the global supply chain.

Disruption in the physical channel of collaborations has resulted in a rise of digital platforms and significant growth in digital-related businesses. India and ASEAN, therefore, need to allocate more resources to enhancing the digital infrastructure and to create a digital ecosystem conducive for new

growth. Together with digital connectivity, it is imperative to complete ongoing physical connectivity projects as well to ensure seamless movements of goods and passengers across borders. One of the foremost challenges that India faces in implementing AEP is a credibility deficit at both institutional and popular levels in Southeast Asia. The Covid-19 crisis provides a window for India to fix some of this deficit.

Strengthening collaboration in the field of public health is another vital area for India-ASEAN cooperation. India enjoys an important position in the global pharmaceuticals sector, having a large pool of scientists and engineers who have the potential to steer the industry ahead to an even higher level. India is the largest provider of generic drugs globally with the Indian generics accounting for 20 per cent of global exports in terms of volume. It is expected that Indian pharmaceutical companies will be in the forefront of producing Covid-19 vaccines. India is already collaborating in ongoing research on Covid-19 vaccine. Once available, India has the capability to produce vaccine at an affordable price, as it has done in the case of other vaccines and can leverage it to build cooperation with the countries of ASEAN in the public health sector and contribute to the welfare of the people.

Given the enormity of the health crisis that India and ASEAN countries are facing currently and are likely to face in the future from another variant of virus, India must broaden the scope of its Covid-19 outreach eastward to strengthen its Act East Policy (AEP). As mentioned earlier India has also supplied HCQ tablets to Malaysia, and received assistance from Singapore. The Indian Mission in ASEAN countries have supplied masks, sanitizers, and medicines to the government officials, university students, and regular citizens. As ASEAN and BIMSTEC have emerged as core areas of interest for India in the past decade within the broad framework of its AEP and the Neighbourhood First Policy, spirited engagement with both regional formations through multi-sectoral initiatives in the areas of both traditional and non-traditional security, these should now receive a much greater priority and be furthered within the context of the Covid-19. Joint action and shared learning during a crisis can create complementarities, pursuance of which helps to forge common bond and shaping public and institutional memories in partner countries. The pandemic, thus, offers India an opportunity to shore up "its public diplomacy in Southeast Asia, and show its willingness — and wherewithal — to undertake mutually-beneficial collaborations, broadening and deepening the scope of AEP and secure greater legitimacy for future regional projects," to quote two young researchers from the Institute of Peace and Conflict Studies (IPCS) in a recent article.

6. ASEAN-India Coping with New Normal: Way Forward

ASEAN and India have been effectively fighting against the Covid-19. Both are facing similar challenges and risks. In such a situation, learning from the best practices would help the countries to effectively control the spread of Covid-19 virus and rebound the economy subsequently. Singapore, Taiwan and Korea have been following a model based on the 3Ts (test, trace and treat), which offer good lessons to ASEAN and India. Health and economic crisis have already generated several non-traditional security (NTSs) issues. Greater cooperation in the area of NTSs in times of Covid-19 may generate larger dividends while minising the risks. Another rewarding area of cooperation between ASEAN and India would be the digital economy such as e-commerce, Fintech, etc.

ASEAN and India shall encourage the exchange of knowledge of traditional medicines, health professionals, testing kits, PPEs, medicines, etc. For example, the ASEAN-India Network of Traditional Medicines (AINTM) may be activated to take forward the cooperation in traditional medicine. Health ministers and officials of ASEAN and India may interact with each other regularly in order to provide collective assistance to fight against Covid-19 and the needed political direction. India may also explore offering Quick Impact Projects (QIPs) to the ASEAN countries related to public healthcare.

Under the ASEAN-India POA (2016-2020) sourcing the ASEAN-India Science and Technology Development Fund, ASEAN and India may undertake joint projects in science, technology and innovation, including through joint research activity, and development on cross-sectoral areas such as health, communicable and emerging infectious diseases, and mitigation measures.

Good health is the priority for all. The Section 26 of the Delhi Declaration 2018 provides the regional cooperation direction of health cooperation, which outlines: "Encourage health cooperation in areas relevant to the ASEAN Post-2015 Health Development Agenda, particularly in the area of strengthening health system and access to care, as well as safe and good quality medical products and affordable quality medicines, including traditional and complementary medicines." Therefore, ASEAN and India shall work together for a sustainable health and community building. Perhaps, building a green strategic partnership between India and ASEAN may pave the way to better meet the SDGs.

Finally, disaster management is another area which requires utmost attention. ASEAN and India shall conduct regular consultations between the ASEAN Committee on Disaster Management (ACDM) and India's National Disaster Management Authority (NDMA) to facilitate synergy among multilateral cooperation mechanisms on disaster management.

Endnotes

- 1. This chapter draws upon the discussion at the Webinar on "ASEAN-India: Coping with Covid-19 Challenges and Way Forward", organised by the ASEAN-India Centre (AIC) at RIS, held on 12 May 2020. Refer Appendix 1 for the major outcomes of the webinar.
- 2. ASEAN+3 FETN is one of the subsidiary bodies of the ASEAN Health Cluster 2 on Responding to All Hazards and Emerging Threats. Contact points of the network consists of Field Epidemiology Training Programmes (FETP) of the ten ASEAN Member States together with China, Japan and Republic of Korea (i.e. Plus Three Countries).
- 3. Refer, Idrus (2020).
- 4. Refer, ASCC (2020).
- 5. Refer, The Jakarta Post (28 April 2020).
- 6. Refer also, ASEAN Secretariat (2015).
- Refer, ASEAN-India POA (2016-2020).
- Refer, Shakuja (2020).
- 9. Refer, ASEAN Secretariat (2020).

References

- ASCC. 2020. Enhancing the detection capacity for Covid-19 in ASEAN countries. 16 June 2020. Available at https://www.aseanrokfund.com/our-works/project-enhancing-the-detection-capacity-for-covid-19-in-asean-countries
- ASEAN Secretariat. 2015. ASEAN-India Plan of Action (2016-2020). Available at https://asean.org/wp-content/uploads/images/2015/August/POA_India/ASEAN-India%20POA%20-%20FINAL.pdf
- 2020. ASEAN-India strengthen cooperation. Jakarta, 12 June 2020. Available at https://asean.org/asean-indiastrengthen-cooperation/
- Idrus, P.G. 2020. China 'ready' to include ASEAN in \$2B Covid-19 aid. Anadolu Agency, 29 May 2020. Available at: https://www.aa.com.tr/en/asia-pacific/china-ready-to-include-asean-in-2b-covid-19-aid/1857846#
- The Jakarta Post. 2020. EU Donates €350 million to help ASEAN countries battle COVID-19. The Jakarta Post, April 28, 2020. Available at: https://www.thejakartapost.com/news/2020/04/28/eu-donates-350-million-to-help-asean-countries-battle-covid-19.html
- Shakuja, V. 2020. ASEAN-India Cooperation in Handling Corona Pandemic. AIC Commentary #5, ASEAN-India Centre (AIC), RIS, New Delhi, May 2020. Available at: http://aic.ris.org.in/sites/default/files/Basic%20page%20 files/AIC%20Commentary%20No.5%20May%202020.pdf

Appendix 1







Webinar ASEAN-India: Coping with Covid-19 Challenges & Way Forward 12 May 2020

KEY RECOMMENDATIONS

ASEAN-India Centre (AIC) at RIS jointly with the Asian Confluence (ASCON) organised a webinar titled "ASEAN-India: Coping with Covid-19 Challenges and Way Forward" through online video conferencing on 12 May 2020. Panelists were from prominent think-tanks of ASEAN member states. All ASEAN member states were well represented at this webinar. About 60 participants attended, viewed the webinar discussion and took part in the Q&A session. Ambassador Mohan Kumar, Chairman, RIS delivered the Special Remarks and chaired the webinar. Mr. Sabyasachi Dutta, Director of Asian Confluence gave the Welcome Remarks. Dr. Prabir De, Professor, RIS and Coordinator, ASEAN-India Centre (AIC) delivered the Opening Remarks. Mr. Sabyasachi Dutta extended the Vote of Thanks at the end. The major recommendations are as follows:

Dr. Mohan Kumar, Chairman, Research and Information System for Developing Countries (RIS), New Delhi

- Coronavirus has taken over our normal lives and posed a serious challenge. ASEAN and India can cooperate and share their best practices to fight against the Covid-19.
- India and ASEAN countries shall jointly address the Covid-19 impacts, which would help strengthen the future relations between them.
- Think-tanks of ASEAN and India should come forward to do joint research and come out with an appropriate policy plan.
- ASEAN and India have to find a way to safeguard multilateralism.
- Despite ASEAN-India FTA, India has been experiencing a trade deficit with several ASEAN countries.
 Therefore, ASEAN must address the Non-Tariff Barriers and regulatory obstacles faced by India in ASEAN market.

Dr Amin Abdul Aziz, Senior Professor, Institute of Policy Studies, Universiti Brunei Darussalam, Brunei

- ASEAN and India should promote investment in education technology and enhance digital connectivity to facilitate education and work from home in the new normal scenario.
- ASEAN and India shall create further awareness for the sustainable environment and better quality
 of living in post-Covid-19.
- India should further enhance its engagement with ASEAN countries for peace and prosperity of the region.

Amb. Pou Sothirak, Executive Director, Cambodia Institute of Cooperation & Peace (CICP), Cambodia

- ASEAN and India should initiate a Joint Statement or a Declaration on India-ASEAN Covid-19
 Response to reaffirm the commitments to enhance their strategic cooperation and mutual support
 to stop the spread of Covid-19 and strengthen joint efforts toward post-pandemic recovery.
- India should focus on providing assistance to ASEAN member states, especially developing countries,
 to revitalise their constrained public health care system and address the capacity and efficacy of
 the health care sector so as to better prepare them to withstand the impacts of Covid-19 and future
 epidemic. There is urgent need of assistance in the preventive measures that can lead to more testing,
 thereby stopping the spread of the virus.
- Since Covid-19 has become a new fertile ground for major powers to settle their differences, a new
 normal of anti-globalisation anti-multilateralism is expected to gain firm ground post-pandemic.
 In such an unfolding situation, ASEAN and India should assess properly the political-security
 ramification and stand prepared to work closely together to rectify any negative impacts that might
 affect their existing excellent relations.

Dr Yose Rizal Damuri, Professor and Head, Centre for Strategic and International Studies (CSIS), Indonesia

- ASEAN and India should work together to deal with immediate impacts of Covid-19 and address
 the macroeconomic situation to stabilise the economies by engaging in initiatives like Chiang Mai
 Initiative (multilateral currency swap arrangement). India may consider joining the CMI at this
 particular time when currency swapping is an important step to facilitate trade and investment.
- Given that most of the countries are leaning towards protectionism, ASEAN and India should not
 accede to it, but promote and strengthen the trade and economic relationship.
- The next phase of ASEAN-India cooperation shall focus on strengthening the digital connectivity, where e-learning, e-commerce, on-line meetings and official interaction in the virtual platform, etc. are going to be the new normal.

Dr Tin Htoo Naing, Vice-chairman, Myanmar Economic Association (MEA), Myanmar

- There is an urgent need to step up the ASEAN-India cooperation for the MSME sector.
- ASEAN and India should encourage and support the private sector by providing stimulus packages for reviving and engaging in trade.
- ASEAN and India should promote investment in digital technology such as e-learning to fight against Covid-19.

Dr Shankaran Nambiar, Senior Research Fellow, Myanmar Institute of Economic Research (MIER), Malaysia

- Covid-19 challenges have brought together ASEAN and India. Challenges are the same and so also responsibilities. Malaysia has suffered heavy health and economic losses till date.
- India should be more active in ASEAN through its presence through dealing with the Covid-19 challenges.
- Covid-19 has also generated new opportunities of cooperation in the areas of healthcare, pharmaceuticals, education, etc.

Dr Phouphet Kyophilavong, Associate Professor and Vice-Dean, Faculty of Economics and Business Management, National University of Laos, Lao PDR

- ASEAN and India should revisit the existing global value chain networks and must find a way to distribute and strengthen the network for sustainable trade.
- Given India's strength in digital technology, ASEAN countries should work closely with India in
 the area of digital connectivity to cope up with the demand in new normal. A Task Force or HighPowered Committee may be set up to take forward the agenda.

Dr Carlos Tabunda Jr., Director, ASEAN Studies Centre, New Era University (NEU), The Philippines

- ASEAN and India should enhance deeper collaboration between public and private sectors' engagements to deal with the non-traditional security threats.
- India may consider providing medical assistance to fight against the pandemic in some of the ASEAN countries.
- Health ministers of ASEAN and India should meet regularly to provide collective assistance for slowing down and halting the pandemic upraise.
- There is an opportunity to further advancement of ASEAN-India relations by strengthening pandemic resilience, bringing socio-economic stability, generating employment and ensuring livelihood. A new regional mechanism must be designed and implemented by ASEAN and India.

Dr. Jayant Menon, Visiting Senior Fellow, Institute of South East Asian Studies (ISEAS), Singapore

- ASEAN and India can learn from each other to control the spread of Covid-19 virus. Singapore is following the model based on the 3Ts (test, trace and treat), which can be followed in other countries as well
- Lockdown may not work well all the time. Countries have to adopt a realistic approach to save the economies from unfolding economic crisis.

Dr Suthiphand Chirathivat, Professor Emeritus, Chulalongkorn University, Thailand

- Thailand in ASEAN has managed the spread of Coronavirus quite well. Besides a national stimulus package, Thailand has also extended health assistance to ASEAN member states.
- ASEAN and India must protect multilateralism. A strong multilateralism is needed for regionalism to work effectively.
- ASEAN and India shall work closely to strengthen the value chain linkages.
- ASEAN and India should take forward the Indo-Pacific initiative.

Dr Nguyen Huy Hoang, Associate Professor, and Dy. Director, Institute of South East Asian Studies (ISEAS), Vietnam Academy of Social Science (VASS), Vietnam

- India should leverage the Indo-Pacific strategy and enhance the relation with ASEAN.
- The value chain linkages with China are heavily disrupted. In this regard, India should leverage the
 opportunity and establish a production supply chain with ASEAN by strengthening both physical
 and digital connectivity.
- ASEAN and India should exchange information on Covid-19 and promote joint research to fight against the pandemic.

11

India's Development Partnership: ACMECS and CLMV

1. Introduction

The Act East Policy (AEP) has intensified India's engagements with Southeast and East Asian countries. India's proactive role in building a common and connected market with an ambitious but realistic connectivity programme is the key focus of AEP.¹ The AEP has received greater momentum through the Mekong-Ganga Cooperation (MGC), which was initiated in the year 2000 based on the civilisational rivers of Ganga and the Mekong. MGC has been celebrating 20 years of establishment in 2020. Later, Thailand initiated the Ayeyawady-Chao Phraya-Mekong Economic Cooperation Strategy (ACMECS) in 2003, which is a cooperation framework among the five countries in the Mekong sub-region, namely, Cambodia, Lao PDR, Myanmar, Thailand and Vietnam to utilise the diverse strengths of the member countries and to promote balanced development in the sub-region. The MGC is nothing but ACMECS member countries plus India. To further strengthening the ACMECS partnership, Thailand has invited India, South Korea, Japan and China to join as development partners of ACMECS. India has accepted the invitation and joined as a Development Partner of ACMECS on 29 July 2019. India's decision to join ACMECS as Development Partner is an appropriate move since India has been actively engaged with the Mekong countries and already been initiated several projects in the Mekong sub-region.

In view of the above, this chapter attempts to identify the linkages between ACMECS and MGC. In particular, this chapter looks at the specific projects from the list of ACMECS priority projects for joint implementation, focusing particularly on projects that can also complement joint projects already being undertaken by India with the ACMECS countries under both bilateral and regional frameworks such as the MGC, the Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC) and ASEAN-India Strategic Partnership.

The rest of the chapter is arranged as follows. Section 2 presents the profile on ACMECS. Section 3 discusses India's engagement with ACMECS in economic and socio-cultural areas. Section 4 reviews the complementarities between ACMECS and MGC and their respective engagement in terms of project implementation in the Mekong sub-region, and identifies the areas for joint implementation, collaboration and pooling the resources for effective operation. Section 5 discusses India's engagement with ACMECS in response to Covid-19. Section 6 attempts to identify the potential areas of cooperation between India and ACMECS. Finally, Section 7 concludes and presents the policy recommendations.

2. Background of ACMECS

The Ayeyawady-Chao Phraya-Mekong Economic Cooperation Strategy (ACMECS) initiated by Thailand, also known as the Economic Cooperation Strategy (ECS), is a cooperation framework among Cambodia, Lao PDR, Myanmar, Thailand, and Vietnam to utilise the diverse strengths of the member countries and to promote balanced development in the sub-region.

2.1 Brief Profile of ACMECS Countries

ACMECS countries located in Southeast Asia are natural resource rich countries, having a significant proportion of semi-arid farmlands, mountains, hills and valleys. ACMECS countries are strategically located between India, China and other Southeast Asian countries. Approximately 237.20 million people reside in ACMECS sub-region over an area of 1938.76 sq. km (Table 1). Thailand is the largest economy in ACMECS, followed by Vietnam. The combined GDP in current prices is about US\$ 962 billion in 2019.

Trade has been at the forefront of the ACMECS; both Thailand and Vietnam are having high trade openness, whereas Cambodia, Lao PDR and Myanmar show wide gap with Thailand and Vietnam (Table 1). Total trade of ACMECS countries has exceeded US\$ 1.08 trillion in 2019, in which both Thailand and Vietnam have trade surplus and other three countries show trade deficit. In 2019, Thailand's total export to ACMECS countries was the highest in the sub-region (US\$ 27.4 billion), followed by Vietnam (US\$ 11.2 billion), Myanmar (US\$ 3.5 billion), Lao PDR (2.8 billion) and Cambodia (US\$ 1.3 billion) respectively.

Indicators	Cambodia	Lao PDR	Myanmar	Thailand	Vietnam
Total land area ('000 sq. km)	176.52	230.80	653.08	510.89	310.07
Total population (Million)	16.49	7.17	54.05	69.63	96.46
GDP at current price (US\$ Billion)	27.09	18.17	76.09	543.65	261.92
Exports (US\$ Billion)	14.09	5.88	17.44	246.24	264.27
Imports (US\$ Billion)	22.09	5.99	18	236.64	253.90
Total trade (US\$ Billion)	36.18	11.87	35.44	482.88	518.17
Trade (% of GDP)	133.56	65.31	46.58	88.82	197.84

Table 1: Basic Economic Indicators of ACMECS Countries, 2019

Sources: ASEAN Stats, ASEAN Secretariat and World Development Indicators, the World Bank.

2.2 Objectives of ACMECS

ACMECS has been working as a sub-regional forum to facilitate economic cooperation among the member countries. Under the overarching theme of connectivity, the focus of ACMECS has been on development of border zones, smart and sustainable development and synchronised economy. ACEMES has a vision of "Building ACMECS Connect by 2023", and aims to achieve (i) seamless ACMECS through seamless multidimensional connectivity (physical, digital, institutional, and people-to-people); (ii) synchronised ACMECS through integrated and synchronised Mekong economies; and (iii) smart and sustainable ACMECS through investments in human resources development and innovation; multi-faceted security including water, food and energy security as well as inclusive and sustainable development.

It is noted in ACMECS development plan, "ACMECS aims to build upon existing regional cooperation programmes and complement bilateral frameworks with a view to transform the border areas of the five countries into zones of economic growth, social progress and prosperity, and to blend local, national and regional interests for common benefits, shared prosperity, enhanced solidarity, peace, stability and good neighbourliness." It has four major objectives:

- To increase competitiveness and generate greater growth along the borders;
- To facilitate relocation of agricultural and manufacturing industries to areas with comparative advantage;
- To create employment opportunities and reduce income disparity among the four countries; and
- To enhance peace, stability and shared prosperity for all in a sustainable manner.

2.3 Areas of Cooperation

Initially, the ACMECS had only five areas of cooperation. Later, in 2005 and 2010, two more areas of cooperation were added. The areas of cooperation under ACMECS are: (i) Trade and Investment Facilitation, (ii) Agricultural and Industrial Cooperation, (iii) Transport Linkages, (iv) Tourism Cooperation, (v) Human Resources, (vi) Public Health, and (vii) Environment.

Each country coordinates at least one field. Thailand coordinates joint efforts in trade, investment and health care; whereas Vietnam directs workforce development, industry, energy, and coordinates with Cambodia in environment. Cambodia coordinates tourism collaboration, while Lao PDR and Myanmar direct transportation and agriculture, respectively. Through these areas of cooperation, ACMECS aims to promote trade and investment by reducing trade barriers, improving productivity and market access, develop and utilise transport linkages, and developing human resources. Projects under the ACMECS have been adopted on the following bases: (i) compatibility and reinforcement to the existing bilateral and regional cooperation; (ii) practicality with concrete results based on comparative advantages; (iii) realisable and agreeable; (iv) voluntarily and equally shared benefits; and (v) consensus decision-making. Over time ACMECS has adopted several projects. The Plan of Action (POA), which was a key document in the implementation of many of ACMECS projects, divided all projects into short (2003-2005), medium (2006-2008), and longterm (2009-2012). The plan was set for review every two years.

2.4 Structure of ACMECS

ACMECS has followed the structure of ASEAN in many ways. The working groups of the ACMECS at the ambassadorial level meet every two months in Bangkok. Senior officers' meetings (SOM) take place every six months. Each member country is designated to coordinate a sectoral working group: Thailand (trade and investment facilitation); Myanmar (agricultural and industrial cooperation); Lao PDR (transport linkages); Cambodia (tourism cooperation); and Vietnam (human resources development). The Ministerial Meeting takes place once a year, while a Summit, which is the highest level of meeting between the ACMECS' leaders, is scheduled every two years.³ Although there is no secretariat office, Bangkok acts as the main coordinating point for ACMECS activity since most of the meetings are conducted at the ambassador level in Bangkok. In Thailand, the Ministry of Foreign Affairs (MoFA) also takes the responsibility of coordination with other ACMECS countries.

In 2018, ACMECS came out with the Master Plan of Connectivity (2019-2023). Vision is "Building ACMECS Connect by 2023". ACMECS received great political support in 2018 at Bangkok when it has the 8th Summit, which has underscored the importance of cooperative implementation of three main pillars of the ACMECS Master Plan (2019-2023) as the followings.⁴

- Seamless ACMECS to promote seamless connectivity from multi-modal transports links (roads, rails, bridges, ports, air, inland waterways, and maritime connectivity) including but not limited to infrastructures designed for sub-regional digital connectivity and energy infrastructure interconnection.
- Synchronised ACMECS to promote software connectivity, namely, i) trade, investment and industrial
 cooperation emphasising on ACMECS policy cooperation in the harmonisation and simplification of
 rules and regulations to facilitate movement of people, free flow of goods, services, and investment;

- and ii) financial cooperation including the establishment of the ACMECS Fund and the ACMECS Infrastructure Fund and Trust.
- Smart and Sustainable ACMECS to promote the development of human capital in strategic areas
 including entrepreneurship, agriculture, tourism, medical services and education, while continue to
 promote environmental cooperation, renewable energy, climate change, disaster-risk management
 and so on.
- This Master Plan serves as a guideline for clear and well-coordinated work plans among ACMECS countries, and also complementing the Master Plan on ASEAN Connectivity 2025 and the 2030 Agenda for Sustainable Development Goals (SDG).
- The Master Plan identifies the role of Development Partners. ACMECS countries welcome the longstanding commitments of its Development Partners and other external partners to implement the Master Plan. India has been considered as a Development Partner for Digital Infrastructure; Medical Service; and Vocational and University Education.
- ACMECS countries agree to promote overall and closer coordination (finance and assistance both in cash and kind) between ACMECS and its development partners through existing Mekong programmes and frameworks, namely, Greater Mekong Subregion Cooperation (GMS), Mekong-Japan, Mekong-Lancang, Mekong-ROK, Mekong-Ganga Cooperation (MGC), and Lower Mekong Initiative (LMI), Friends of the Lower Mekong (FLM).
- ACMECS countries realise the importance of coordination and improvement of resource mobilisation to avoid overlapping activities.
- ACMECS countries agree to explore possibility to streamline the organisational structures of all Mekong sub regional frameworks such as organising ACMECS Summit back-to-back with other Summits of Mekong sub regional frameworks (GMS, Mekong-Japan, Mekong-Lancang).

3. India's Engagement with ACMECS Countries

India and ACMECS countries have strong civilisational and cultural links. Prior to the formation of ACMECS, Mekong-Ganga Cooperation (MGC) was initiated on 2000 (MGC = India + ACMECS), based on the civilisational rivers of Ganga and the Mekong. Civilisational and cultural links between India and the Mekong countries date back thousands of years. Both Ganga and the Mekong are civilisational rivers, and the MGC initiative aims to facilitate closer contacts among the people inhabiting these two major river basins. Probably no other country has such strong links with the Mekong sub-region as much as India by way of religion, language, culture and civilisation. The cultural influence flowed both ways, and Southeast Asia has also contributed in enriching India's culture and traditions. On one hand, Mekong countries and India inhabit a shared geographical and cultural space, while, on the other, each country retains its distinctiveness and unique identity. MGC is such a multidimensional initiative dealing not just economic aspects of regional cooperation but a host of cultural issues which are important for building an inclusive and prosperous society.

3.1 ACMECS and MGC in Comparison

ACMECS countries and India inhabit a shared geographical and cultural relation, and also each country retains its own distinctiveness and unique identity. Both were formed to draw larger gains from regional cooperation and integration in not only economic areas but also non-economic areas such as public health, agriculture, education, etc. Between them, there are some common areas of cooperation such as trade and investment, transportation, tourism, and health (Table 2).

India and Mekong countries have been collaborating for regional cooperation in four areas such as tourism, culture, education and transport and communications. It has further extended to SME

cooperation, Conservation of Rice Germplasm, Setting up a Working Group on Health, Establishment of a Common Archival Resource Centre (CARC) at the Nalanda University and India-Cambodia-Laos-Myanmar-Vietnam Quick Impact Projects during the 7th MGC Ministerial Meetings in 2016. MGC has witnessed 10 ministerial meetings since its establishment in 2000. The 10th MGC Ministerial Meeting was held in Bangkok on 1 August 2019, which further reinforces the MGC partnership.

Table 2: ACMECS and MGC

	ACMECS	MGC
Countries	Cambodia, Myanmar, Lao PDR, Thailand	Cambodia, India, Lao PDR, Myanmar,
	and Vietnam	Thailand and Vietnam
Year	2003	2000
Motivation	Ayeyawady, Chao Phraya and Mekong	Mekong and Ganga
Objectives	The promotion of the prosperity in the sub-region in a sustainable manner and reduction of the economic gap	Enhancement of trade and investment cooperation in the sub-region.
	Trade and Investment FacilitationAgricultural and Industrial Cooperation	Traditional Areas of Cooperation • Tourism
	Transport Linkages	Culture
	Tourism Cooperation	Education
	Human Resources	Transport and communications
Areas of	Public Health	New Areas of Cooperation (added in 7th MGC Ministerial Meeting on 2016)
Cooperation		SME cooperation
		Conservation of Rice Germplasm
		Setting up a Working Group on Health
		Establishment of a Common Archival Resource Centre (CARC) at the Nalanda University
		India-Cambodia-Laos-Myanmar- Vietnam Quick Impact Projects
	Broadly to complement and enhance existing bilateral and regional economic cooperation, especially the ADB GMS	Trilateral Highway (On-going, connecting India, Myanmar and Thailand)
	programme. Some of the projects under ACMECS are:	Proposed Extension of Trilateral Highway connecting Vietnam, Lao PDP and Graphy die
	rehabilitation of existing roads	PDR and Cambodia
Major Projects	construction of road links between Vietnam, Lao PDR and Myanmar	Kaladan Multi Model Transit Transport Project (KMMT)
	establishment of wholesale and distribution centres	
	facilitation of contract farming	
	productive transfer of knowledge	
	establishment of training centres	
	promotion of eco-tourism	

Table 2 continued...

Development Cooperation	 Thailand has offered close to US\$ 25 million to promote infrastructure development in CLMV countries Creating platform for the public and private sectors as well as financial institutions Generating Investment in cooperation projects 	 India has extended over US\$ 1 billion Line of Credits (LoC) to CLMV countries Capacity Building Programme MGC Scholarship Scheme SMEs cooperation Business fair Connectivity projects (TH, KMMT) Digital connectivity
Ministerial Meetings	As on 2018, it had eight Summit level meetings. The last one held at Bangkok, Thailand on 16 June 2018.	As on 2019, it had ten MGC Ministerial meetings. The last one held at Bangkok in 1 August 2019.

Source: AIC's compilation from different sources.

Table 2 summaries India's various development cooperation initiatives in MGC countries. India assists MGC countries through development cooperation projects such as physical and digital connectivity (e.g. Trilateral Highway, Kaladan Multimodal Transit Transport Project, GPON digital links, etc.); soft connectivity such as the Trilateral Motor Vehicle Agreement (Trilateral MVA), etc., which play a critical role in realising seamless movement of passenger, personal and cargo vehicles along roads linking India, Myanmar and Thailand; people-to-people connectivity (e.g. scholarships and fellowships, restoration of temples, visual and performing arts, etc.), science and technology (e.g. satellite launching station), training and capacity building (e.g. EDI centres, language training centres, etc.), business and networking (e.g. SMEs cooperation, business fairs, etc.). For instance, India has extended over US\$ 1 billion Special Fund to CLMV countries to promote projects that support physical and digital connectivity between India and ASEAN, and a Project Development Fund (PDF) with a corpus of US\$ 77 million to develop manufacturing hubs in CLMV countries. India also provides ITEC assistance to Mekong countries. Under the MGC Scholarship schemes, India offers 50 seats every year to the Mekong countries for pursuing higher studies. Recently, India has offered scholarships to Mekong countries to do PhD programme at IITs.

Road Connectivity

Road connectivity covers the Trilateral Highway (TH) routed through Northeast India; Kaladan Multimodal Transit Transport Project linking Kolkata, via sea route to Sittwe, and then to Paletwa in Myanmar, and by road to Zorinpuri in India; Rih-Tiddim Road, and extension of Trilateral Highway to Cambodia, Lao PDR and Vietnam. In particular, the ongoing Trilateral Highway is aimed to connect Moreh in India to Mae Sot in Thailand via Mandalay in Myanmar. The India-Myanmar-Thailand Trilateral Highway project involves construction of a 1,360 km highway connecting Moreh in Manipur to Mae Sot in Thailand through Myanmar. The Trilateral Highway is further proposed to be extended to Cambodia, Lao PDR and Vietnam. The TH is presently is under construction and likely to be completed by 2022.

Ho Chi Minh Bangkok Yangon*/ **Thailand** Mandalay** Myanmar Vietnam **Indian Cities Direct Flight Direct Flight** Frequency Direct Flight Frequency Frequency per week per week per week √*****# √*****# Delhi $\sqrt{}$ 7 6 $\sqrt{}$ 7 Mumbai Bengaluru $\sqrt{}$ 7 $\sqrt{}$ 7 Chennai Kolkata $\sqrt{}$ 7 √* 7 7 7 Hyderabad Guwahati $\sqrt{}$ 1 7 Jaipur $\sqrt{}$ 7 Lucknow $\sqrt{}$ 1 Nagpur $\sqrt{}$ 7 Varanasi Gaya $\sqrt{}$ 7 √* 4

√**^

Table 3: Direct Air Connectivity between India and Mekong Subregion

*Note*s: # via Kolkata; ^ proposed route of Myanmar's private carrier Air KBZ to operate twice a week. *Source:* Authors' own.

Air Connectivity

Imphal

India has several flights with Thailand all through the week. Bangkok is connected with major tier-I and tier-II cities in India by direct flights (Table 3). Air connectivity between India and Myanmar is the only mode of transportation for religious tourism (Buddhist circuits) and medical tourism. For instance, people from Myanmar are interested to visit Bodh Gaya. Kolkata and Yangon and New Delhi to Yangon via Gaya are the only direct air connections between the two countries. Imphal and Mandalay is likely to be connected by air. There are direct flights between Kolkata and Ho Chi Minh City and Kolkata and Hanoi, which have started operating since 2019 (now temporarily closed due to Covid-19 outbreak). However, India is yet to be directly connected with Cambodia and Lao PDR by air.

Digital Connectivity

Myanmar has set up cross-border fibre optic networks with many of its neighbouring countries including India. The first cross-border fibre optic link between India and Myanmar was set up in February 2009, running from Moreh in Manipur to Mandalay in Myanmar, for a distance of 500 km. The 640-km-long link passes through Tamu, Kampatwa, Kyi Gone, Shwebo, Monywa and Sagaing. The optical fibre link is a high-speed broadband link for voice and data transmission. Besides, India has also offered over US\$ 1 billion Special Fund to CLMV countries to promote projects that support physical and digital connectivity and a Project Development Fund (PDF) with a corpus of US\$ 77 million to develop manufacturing hubs in CLMV countries, which can be utilised to strengthen digital connectivity between India and Mekong sub-region. India has set-up IT centres in Myanmar: India-Myanmar Centre for Enhancement of IT Skills (IMCEITS) and Centre of Information & Communication Technology Training (CICTT) in Yangon. However, there is ample scope to promote digital connectivity between India and Mekong countries, particularly in the areas of Industrial Revolution 4.0.

People-to-People Connectivity

It is Thailand which attracts most of Indian tourists. Outflow of tourists from India has been more than inflows. Of recently, passenger movement through Tamu (Myanmar) and Moreh (India) border posts has gone up due to Myanmar's liberalisation of visa for third country nationals. The year 2019 was celebrated as ASEAN-India Tourism year. With rising number of direct flights between India and Mekong countries, tourism is likely to grow fast.

The Seventh Meeting of ASEAN and India Tourism Ministers, held on 18 January 2019 in Ha Long City, Vietnam, has recommended several programmes to promote two-way tourism between India and ASEAN: (i) both AEAN and India agreed to further enhance ASEAN-India cooperation in tourism under the framework of the 2012 Memorandum of Understanding between ASEAN and India on Strengthening Tourism Cooperation with intensified efforts and activities; (ii) sharing best practices for the development of responsible and/or sustainable tourism, particularly in sharing information in the development of the ASEAN Sustainable Tourism Assessment Tools (ASITAT); (iii) sharing resources and facilities to provide mutual assistance in tourism education and training for quality tourism development, including the development of the Concept Paper on the ASEAN-India Tourism Training Programme, as well as the invitation from India for ASEAN countries to depute their tourism professionals to join short courses, workshops or seminars in India; (iv) crisis communications to protect the reputation and credibility of the relevant tourism organisations and/or tourist destination, particularly through the establishment of the ASEAN-India Crisis Communications Team; (v) exchange information pertaining to statistics and development strategies, investment opportunities and economic data, including the 5th India-CLMV Business Conclave, held in May 2018, as a platform for cooperation with all tourism related cross-sectors such as MSMEs, manufacturing, and information; and (vi) international Buddhist Conclave held on 22-25 August 2018, and the development of the Buddhist Tourism Story Book and website of Buddhist Tourism in ASEAN and South Asia.

3.2 India's Development Cooperation Initiatives in ACMECS

Aid and development cooperation have facilitated the expansion of economic and cultural relations in Mekong sub-region and vice versa. Mekong countries have been receiving country-specific bilateral aid, sub-regional and regional assistances through MGC and ASEAN, respectively. India has extended over US\$ 1.48 billion Line of Credit (LoC) to CLMV countries for the period 2003-04 to 2020-21, bulk of which went into Vietnam, followed by Myanmar, Lao PDR and Cambodia (see Figure 1). India also provides a substantial amount of ITEC assistance to developing countries across the world. Mekong countries are too recipients of ITEC assistance. Other Mekong countries have also been receiving such generous support. Under the MGC Scholarship schemes, India offers 50 seats every year to the Mekong countries for pursuing under graduate (UG), post graduate (PG) and PhD courses in India, which includes ICCR's MGC Scholarship Scheme, six CLMV scholarships for master's programmes at Nalanda University and 10 scholarships for courses in Museology and Conservation Techniques at National Museum Institute New Delhi (Table 4).

800
700
600
538.9
500
200
100
VietNam
Myanmar
Laos
Cambodia

Figure 1: India's Line of Credit (LoC) to ACMECS*

Note: *For the period 2003-04 to 2019-20.

Source: https://www.eximbankindia.in/lines-of-credit.

Table 4: Mekong-Ganga Cooperation Scholarship Scheme*

Year	Number of Seats Allotted	Number of Seats Utilised	Total Expenditure** ('000 US\$)
2006-07	50	31	50.64
2007-08	50	13	104.28
2008-09	50	28	140.46
2009-10	50	17	135.53
2010-11	50	23	195.10
2011-12	50	38	223.32
2012-13	50	33	262.74
2013-14	50	20	208.15
2014-15	50	17	186.78
2015-16	50	22	166.42
2016-17	50	21	163.11
2017-18	50	17	138.82
2018-19	50	18	149.39
2019-20	50	28	186.05

Notes: * Courses include under graduate, post graduate and PhD; ** Converted into US\$ from INR based on prevailing exchange rate. *Source:* AIC based on Ministry of External Affairs (MEA), Government of India.

Three types of development cooperation projects can be categorised: physical and digital connectivity (e.g. Trilateral Highway, Kaladan Multimodal Transit Transport Project, GPON digital links, etc.), people-to-people connectivity (e.g. scholarships and fellowships, restoration of temples, visual and performing arts, etc.), science and technology (e.g. satellite launching station), training and capacity building (e.g. EDI centres, language training centres, etc.), business and networking (e.g. SMEs cooperation, business fairs, etc.). Some of the iconic projects those India has supported in Myanmar are (i) renovation of Thanlyin refinery and upgradation of Thanbayakan refinery in 2016 (US\$ 40 million); (ii) setting up manufacturing plant of heavy turbo truck in 2012 (US\$ 20 million); and (iii) rice bio park at Yezin Agriculture University in 2018 (US\$ 2 million).⁷

India has been supporting CLMV countries under the Initiatives for ASEAN Integration (IAI), which includes projects on training of english language for law enforcement officers in CLMV countries and training of professionals dealing with capital markets in CLMV by National Institute of Securities Management Mumbai. To boost the people-to-people contacts, India has been organising various programme including training programme for ASEAN diplomats, exchange of parliamentarians, participation of ASEAN and Mekong students in the National Children's Science Congress, ASEAN-India Network of Think Tanks, ASEAN-India Eminent Persons Lecture Series, etc. India has been establishing four Centres of Excellence in Software Development & Training (CESDT) in CLMV countries, including the setting up of an IT Resource cum Study Centre at CDAC, Noida consisting of one existing Lab and one new Lab as well as the development of 12 e-learning courses in six identified areas. Overall, India has strong and progressive relation with ACMECS countries and has made several contributions in terms of trade, investment, connectivity projects, capacity building programmes and strengthening cultural linkages with Mekong subregion.

To restore the cultural and traditional textile affinities of the South and Southeast Asian region, an MGC Museum of Asian Textiles has been established in Siem Reap, Cambodia in 2014. Another milestone is the revival of Nalanda University. India has announced several dozens of ITEC scholarships for MGC countries in areas of culture, tourism, engineering, management, teachers training, and film directing, sound, lighting and stage management in addition to over 1000 scholarships already given every year. New Centres of Excellence in Software Development and Training were announced. Existing capacity building programmes in law enforcement, financial markets, ICT and space, to supplement the requirements of MGC partners was also announced. Three Quick Impact Projects in Lao PDR and two in Myanmar are under consideration in addition to nine in Cambodia and five in Vietnam already under implementation.

4. Synergy between ACMECS and MGC Plan of Action (POA)

Both MGC and ACMECS have undertaken several activities, which are reflected in their respective Plan of Action (PoA) such as ACMECS Plan of Action (2019-2023) and MGC POA (2019-2022). As a development partner, India can word together to build synergy of the MGC POA with the ACMECS POA in the possible areas for better implementation and also helping to mobilise the funding and human resources. Reduction of overlaps may help better utilise the financial and technical resources.

Sr. No. **Areas of Action ACMECS MGC** 1 Trade $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ 2 Connectivity $\sqrt{}$ $\sqrt{}$ 3 Soft Infrastructure $\sqrt{}$ 4 FinTech 5 $\sqrt{}$ Education 6 **Environment** V 7 Health $\sqrt{}$ $\sqrt{}$ 8 **Human Resources** 9 $\sqrt{}$ Culture $\sqrt{}$ 10 **Tourism** 11 Forum

Table 5: Areas of ACMECS and MGC Plan of Action (POA)

Note: see detailed table are given Appendix 1.

Source: Authors' own.

Table 5 illustrates the common areas in the POAs, suggesting where both India and Thailand can work together to better implement the respective POA. The common areas in ACMECS and MGC POAs are connectivity, soft infrastructure and development of human resources. ACMECS POA also has included FinTech to promote financial literacy and cooperation between banks and other financial service providers, whereas MGC POA has included larger areas such as education, environment, health, culture and tourism.

4.1 Assistance in Soft Infrastructure

In both the ACMECS and MGC POAs, there is a scope for building synergy and complementarities in terms of India's support as a developing partner to the ACMECS. For instance, India can support ACMECS countries in strengthening soft infrastructure in the areas of trade facilitation. India's successful implementation of customs single window system (SWIFT) exhibits how India has used digitalisation in the trade facilitation. India's experience in dealing ITeS and knowledge can be shared with the Mekong countries. Since India has offered over US\$ 1 billion Special Fund to CLMV countries to promote digital connectivity, India-ACMECS cooperation in soft infrastructure will strengthen the implementation of both MGC POA and ACMECS POA. Therefore, ACMECS countries should welcome India's digital leadership, and jointly harness advanced technologies to thrive in the digital age.

4.2 Financial Cooperation

India can offer lot more in terms of financial technology and financial inclusion in the Mekong subregion. India can lend its support to ACMECS in terms of financial technology and adoption of digitalisation in financial inclusion. India's success in implementing the Fintech related products such as UPI, mobile banking, linking Aadhaar to bank account for direct cash transfer to the beneficiaries, opening millions of bank account for the financial inclusion in the rural areas, etc. under the Digital India scheme offer many vital lessons to ACMECS countries. These are the initiatives which transform the livelihood of the people in MGC or ACMECS subregion.

4.3 Resources Mobilisation

India has initiated the Quick Impact Projects (QIP) scheme for the Mekong countries, which has well progressed since its inception in 2014. Till date, 24 projects have been completed. The QIP scheme has received overwhelming responses in the CLMV. So far, 10 such projects have been successfully completed in Cambodia and another five projects are being launched with Indian government assistance of US\$ 50000 for each project. In 2019, 18 QIPs were taken up for implementation in Cambodia, Vietnam and Lao PDR at a cost of US\$ 900,000. Myanmar is urged to identify projects of mutual interest under the QIP Scheme. Ongoing development partnership projects between India and Vietnam has been continued, and new projects have been initiated. Vietnam continues to be a large recipient of training programmes under the ITEC programme. Similarly, Thailand has also proposed to establish ACMECS Fund to promote innovative financing mechanism in support of funding of the projects under ACMECS POA. In this regard, India and Thailand can mobilise the resources for generating funds and human resources in order to effectively channelise the resources for the focused areas and provide training and capacity building. In this way, joint areas of cooperation will facilitate the implementation of POAs in an effective way.

5. India's Engagement in ACMECS in Response to Covid-19

India has reaffirmed the country's commitment to the neighbouring countries under the 'Neighbouring First' Policy, to enhance cooperation and mutual support to control and contain the spread of the virus. India has also extended its assistance to ACMECS countries to reinforce the Act East Policy (AEP). Indian Prime Minister had telephonic conversation with all the leaders of the ACMECS member countries on a potential regional and bilateral response to the Covid-19 (Table 6).

	Cambodia	Lao PDR	Myanmar	Thailand	Vietnam
Head to Head -Telephonic/ Video Conferencing	√	√	√	√	√
Repatriation of stranded (Vande Bharat Mission)	√		√	√	√
Sharing information and exchange of experts			√	√	√
Distribution of Medical and Pharmaceutical supplies	√	√	√	√	√

Table 6: India's Engagement in ASEAN in Response to Covid-19*

Notes: Empty cell presents data/information not available; * As on September 2020.

Source: Authors' own based on several secondary sources.

India has also launched 'Vande Bharat Mission' in three extended phases of major exercise to repatriate Indian citizens across the world. Through this mission, India has repatriated thousands of Indian citizens from ACMECS member countries and also extended the help to the member countries to bring back their citizens from India. For instance, India has arranged 16 flight trips to Thailand; 6 flight trips to Vietnam and 4 flight trips to Myanmar and 2 flight trips to Cambodia.⁸ India is also supporting in terms of supplying pharmaceutical products, exchange of experts and sharing of information in the field of public health. For instance, India has supplied masks, sanitisers, and medicines and medical equipment to some of the ACMECS countries such as Myanmar, Cambodia and Thailand.

6. Potential Areas of Cooperation for India as Development Partner

In the Mekong subregion, in addition to India and Thailand, countries such as South Korea, Japan, China and USA are also engaged in several projects and have been covering multiple areas for cooperation and development activities through technology sharing, funding, knowledge sharing and capacity building in various fields to upgrade the skills of CLMV countries. Thailand is the closest associate of the Mekong countries, which has formed the ACMECS. To further strengthen the ACMECS, Thailand has invited India, South Korea, Japan and China as development partners. In 2019, India accepted the invitation and joined as development partner. Since its establishment in 2000, India has been actively engaged with ACMECS countries and initiated several projects. In addition to the existing areas of cooperation, India may consider new areas such as blue economy, disaster management, climate change, renewable energy, education, skill development, etc. (Table 7).

6.1 Blue Economy

Oceans hold a place of prominence among the countries of Mekong subregion (except Lao PDR) and India from ancient times. India and Myanmar in the Mekong subregion share both maritime and land boundary with each other. Given the maritime and economic potentials, India and Mekong subregion can engage in dialogue and policy initiatives on Blue Economy for the sustainable use of ocean resources for economic growth, improved livelihoods and jobs, and ocean ecosystem health. India has endorsed the 'Blue Economy' as a new and central pillar of the country's economic activities. It encompasses both the coastal areas and the linked hinterland. Indian Prime Minister emphasised the 'SAGAR' (Security and Growth for All in the Region) at the *Shangri La* Dialogue in Singapore in 2018, which reaffirmed India's key role in strengthening the Blue Economy in the India-ASEAN region⁹. Blue Economy is one of the important areas of the India-ASEAN cooperation. In this regard, Mekong-India Blue Economy

programme could strengthen the regional and subregional cooperation in promoting maritime safety and security as well as sustainable exploration of ocean resources. India's support can be extended as the development partner in knowledge sharing and assistance such as Early Warning Centres, including for *Tsunami* warnings, HADR Exercises and SOPs (Standard Operating Procedures) for HADR, capacity-building and capability enhancement in the areas related to Blue Economy.

6.2 Disaster Management

India can also support the ACMECS in the area of Disaster Management. Natural disaster covers a wide range of events such as earthquakes, floods, landslides, cyclones, tsunamis, heat wave, pandemic like Covid-19 etc. Both India and ACMECS are disaster prone region. Disaster management and emergency response requires a people-centred multi-sectoral approach, building resilience to multiple hazards and creating a culture of prevention and safety. Disaster risk reduction can provide a mechanism to reduce poverty, safeguard development and adapt to climate change, with beneficial effects on broader global stability and sustainability. India's vast experience in dealing post-disaster operations would provide rich lessons to ACMECS countries. India and ACMECS countries may open a formal dialogue in disaster management.

Table 7: Major Initiatives by Countries in Mekong Subregion

Indicators	Thailand	India	Japan	USA	China
Initiatives	ACMECS	Mekong- Ganga Cooperation	Mekong- Japan Cooperation	Lower Mekong Initiative	Lancang- Mekong Cooperation
Countries covered in ASEAN	CLMV+T	CLMV+T+ India	CLMV+T+ Japan	CLMV+T+ USA	CLMV+T+ China
Development Partners (DP)	Japan, South Korea, USA, Australia, China, and India			Japan and South Korea, Australia	
International Organisations (IO)		ADB, ERIA	ADB, ERIA		
		Areas of Co	operation		
Connectivity	$\sqrt{}$		$\sqrt{}$	$\sqrt{}$	
Soft connectivity	$\sqrt{}$		√		
Industrial promotion	\checkmark	\checkmark	V		\checkmark
Tourism			$\sqrt{}$		
Human Resources and Capacity Building	V	√	V	√	√
Health			√	√	V
Education		√	√		
Water Resources		√*		√	

Table 7 continued...

People-to-People		7		٦
connectivity		٧		٧
Disaster	√*		ما	ا
Management	V		V	V
Agriculture	$\sqrt{}$		$\sqrt{}$	
Energy			$\sqrt{}$	$\sqrt{}$
Climate Change	√*	$\sqrt{}$		$\sqrt{}$
Blue Economy				
Science and	ما			
Technology	V			
Forestry and			ما	ما
Environment			V	V
Culture	V			V

Note: *No specific project or programme.

Source: Authors' own. Based on various Secondary Survey.

6.3 Renewable Energy

India and ACMECS countries have vast unmet potentials in renewable energy. Both have wide access to ocean, wind, solar and other forms of renewable energy sources. Energy cooperation is a plausible scope to share the technological knowledge and renewable energy resources. Since renewal energy sources produce very negligible or zero global warming emissions, deeper cooperation in renewal energy may help countries moving towards low-carbon growth path. India has initiated International Solar Alliance (ISA), which is now having more than 121 prospective member countries. Most of the ASEAN countries are prospective members of ISA, among which Cambodia has signed, where as Myanmar has signed and ratified the ISA Framework Agreement. Thailand and Lao PDR may consider signing the ISA. In addition, wind power dominates the renewable energy industry in India, representing 70 per cent of its total renewable energy capacity. In this regard, energy cooperation is the potential area through which India can extend its support and expertise to the ACMECS in terms of technology sharing and capacity building, leading to achieve the Sustainable Development Goals (SDG). To expand energy access, it is crucial to enhance energy efficiency and to invest in renewable energy. These targets may seem ambitious, but with better cooperation, it may help meeting the targets in SDGs as well as climate change.

6.4 Development of Physical and Digital Connectivity

India may continue with digital and physical connectivity projects in the Mekong subregion. The connectivity programme shall consider air, land and maritime connectivity as identified in the ACMECS Master Plan of Connectivity. Some of the projects worth mentioning: (i) extension of TH to Cambodia, Lao PDR and Vietnam; (ii) India-ACMECS cyber security dialogue; (iii) projects on Industrial Revolution 4.0, smart cities, start ups, Fintech, etc.

7. Conclusions and Way Forward

ACMECS acts as a catalyst to build upon existing regional cooperation programmes and complement bilateral frameworks with a view to transform the border areas of the five countries into zones of economic growth, social progress and prosperity. To further strengthen the ACMECS, Thailand has invited India as a development partner. India has overwhelmingly accepted the invitation and joined as a Development Partner in 2019. Since its establishment in 2000, India is actively engaged with ACMECS countries via MGC and initiated several projects.

This chapter has identified specific projects from the list of ACMECS priority projects for joint implementation, focusing particularly on projects that can also complement joint projects already being undertaken by India with the ACMECS countries both under bilateral and other multilateral frameworks such as the MGC, BIMSTEC and ASEAN-India Dialogue Relations.

MGC and ACMECS have been engaged in several activities through their respective of Plan of Action such as ACMECS POA (2019-2023) and MGC POA (2019-2022). Common areas in both POAs are connectivity, soft infrastructure and human resources. ACMECS POA also includes FinTech to promote financial literacy and cooperation between banks and other financial service providers. MGC POA has included areas like education, environment, health, culture and tourism. The MGC Plan of Action (POA) correctly reflects India's deeper engagements with the Mekong sub-region (Table 8).

Table 8: India's Agenda based on MGC POA (2019-2022)

Sr. No.	Short-term	Medium-term	Long-term
1	Assist to set-up MGC Asian Traditional Textiles Museum (ATTM) in Siem Reap, Cambodia	Complete India-Myanmar- Thailand Trilateral Highway	Further strengthen the cooperation in the education sector and capacity building and human resource development
2	MGC Conference on Heritage Conservation Techniques in Siem Reap, Cambodia in 2020.	Finalise India-Myanmar- Thailand Motor Vehicle Agreement (IMT MVA)	Work towards possible extension of the Trilateral Highway to Cambodia, Lao PDR and Vietnam.
3	Prepare Visitor's Guide for Mekong-Ganga Buddhist Pilgrimage Sites on the eve of the "India-ASEAN Tourism Year"	Call for proposal and utilise India's US\$ 1 billion Line of Credit (LOC) for connectivity projects in CLMV	Establish Centres for Excellence in Software Development and Training (CESDT) in Mekong countries.
4	Develop a joint calendar of important Travel Fairs and Cultural Festivals for information dissemination and promotion.	Utilise Project Development Fund (PDF) of US\$ 77 million to facilitate Indian investments in CLMV	Establish Common Archival Resource Centre (CARC) at Nalanda University.
5	Quick Impact Projects for poverty reduction and generate basic infrastructure facilities to improve the livelihood of the CLMV		Look for potential new areas of cooperation such as water resources management, climate change, disaster management, blue economy, energy cooperation to benefit CLMV

Source: Authors' own.

In addition to the India's engagement with the ACMECS via MGC and its ongoing MGC POA (2019-2022), India can lend its support as the development partner in the areas where India has comparative advantage in terms of technical knowledge and capability. India can also jointly implement the project in support of Thailand to mobilise the resources both financial and human skills, in which both ACMECS and MGC POAs have synergy. Some of the areas where India can offer its support are (i) assistance in soft infrastructure, (ii) supporting FinTech, and (iii) resources mobilisation. In addition to the existing areas of cooperation, India has potential to engage in other areas for cooperation such as blue economy, disaster management, climate change, renewable energy and physical and digital connectivity.

With a maturing ASEAN-India relation, India's foreign policy achievements in eastern neighbourhood are remained remarkable. India's joining ACMECS as a development partner will certainly boost up MGC and ASEAN-India partnership.

Endnotes

- 1. Refer, De and Suthiphand (2017) and De (2012).
- 2. Refer, http://www.mfa.go.th/acmecs/
- 3. Refer, De et al. (2020) for all ACMECS Summit.
- 4. Refer, for example, MFA, Thailand (2018).
- 5. Refer, www.globaltimes.com.
- 6. Refer, Chaturvedi (2016) for a discussion on aid and development cooperation in context of South-South Cooperation with particular reference to Mekong sub-region.
- 7. Refer, MEA website for more details
- 8. Refer, for example, De et al. (2020).
- Refer, Prime Minister's Keynote Address at Shangri La Dialogue (1 June 2018).
- 10. Refer, Gielen et al. (2018).

References

- ACE. 2017. ASEAN Energy Cooperation Report 2017. ASEAN Centre for Energy, ASEAN Secretariat, Jakarta
- AIC-RIS. 2017. ASEAN-India Air Connectivity Report. ASEAN-India Centre, Research and Information Centre, New Delhi.
- —— 2017. *Mekong-Ganga Cooperation: Breaking Barriers and Scaling New Heights*. ASEAN-India Centre, Research and Information Centre, New Delhi, pg. 1-163.
- Chaturvedi, S. 2016. The Logic of Sharing: Indian Approach to South-South Cooperation, Research and Information System for Developing Countries (RIS) and Cambridge University Press, New Delhi.
- De, P. 2012. ASEAN-India: Deepening Economic Partnership in Mekong Region. Research and Information System for Developing Countries (RIS), New Delhi.
- De, P. and Majumdar, M. 2014. Developing Cross-Border Production Networks between North Eastern Region of India, Bangladesh and Myanmar: A Preliminary Assessment. Research and Information System for Developing Countries (RIS), New Delhi.
- De, P. and Chirathivat, S. 2017. Celebrating the Third Decade and Beyond: New Challenges to ASEAN-India Economic Partnership, KW Publishers, New Delhi.
- De, P., Ghatak, S., and Kumarasamy, D. 2019. Assessing Economic Impacts of Connectivity Corridors in India: An Empirical Investigation. *Economic and Political Weekly*, Vol. 54, No 11.

- De, P., Kumarasamy, D. and Pan, S. 2020. ACMECS MGC Linkages and India as Development Partner: Potential Areas of Cooperation. (Working Paper No. 1, January 2020). ASEAN-India Centre (AIC), Research and Information System for Developing Countries (RIS), New Delhi. Available at: https://aic.ris.org.in/sites/default/files/Publication%20File/AIC%20Working%20Paper%20No.1%20January%202020_mini.pdf
- Department of State, USA. 2018. Master Plan of Action to Implement the Lower Mekong Initiative 2016-2020. Available at: https://www.lowermekong.org/about/lower-mekong-initiative-master-plan-action-2016-2020
- EXIM. 2018. Strengthening ASEAN-India Partnership: Trends and Future Prospects. Export-Import Bank of India, pp.1-100. Available at: https://www.eximbankindia.in/Assets/Dynamic/PDF/Publication-Resources/ResearchPapers/88file.pdf (Assessed on 14 September 2019)
- Gielen, D., Boshell, F., Saygin, D., Bazilian, M.D., Wagner, N., and Gorini, R. 2019. The role of renewable energy in the global energy transformation. *Energy Strategy Reviews*, Vol. 24, pp. 38–50.
- Global Times. 2017. Myanmar-Thai fiber optic network link put into operation. *Global Times*, June 17, 2017. Available at: http://www.globaltimes.cn/content/437648.shtml
- Lanchang-Mekong Cooperation, China Secretariat. 2018. Five-Year Plan of Action on Lancang-Mekong Cooperation (2018-2022). Available at: http://www.lmcchina.org/eng/hzdt_1/t1525364.htm
- MEA. 2018. Prime Minister's Keynote Address at Shangri La Dialogue. Ministry of External Affair, Government of India. Available at: https://www.mea.gov.in/Speeches-Statements.htm?dtl/29943/Prime+Ministers+Keynote+Address+at+Shangri+La+Dialogue+June+01+2018
- 2019. Mekong-Ganga Cooperation (MGC) Plan of Action (2019-2022). Ministry of External Affair, Government of India. Available at: https://mea.gov.in/bilateral-documents.htm?dtl/31712/Mekong+Ganga+Cooperation+MGC+Plan+of+Action+20192022
- MFA, Thailand. 2018a. ACMECS Master Plan (2019-2023). Ministry of Foreign Affair, Kingdom of Thailand. Available at: http://www.mfa.go.th/main/contents/files/information-20180618-142227-835103.pdf
- —— 2018b. Bangkok Declaration of the 8th Ayeyawady Chao Phraya Mekong Economic Cooperation Strategy Summit. Ministry of Foreign Affair, Kingdom of Thailand. Available at: http://www.mfa.go.th/main/en/news3/6886/90570-BANGKOK-DECLARATION-OF-THE-8TH-AYEYAWADY-%E2%80%93-CHAO-PH.html
- Mittal, P. Bhushan, R. and Daisy (eds.). 2015. Mekong-Ganga Axis. D.K. Print World, New Delhi.
- MOFA, Japan. 2018. Tokyo Strategy 2018 for Mekong-Japan Cooperation. Ministry of Foreign Affairs of Japan. Available at: https://www.mofa.go.jp/mofaj/files/000406731.pdf
- RIS. 2012. ASEAN-India Connectivity Report: India Country Study. Research and Information System for Developing Countries, New Delhi.
- 2014. *Transforming Connectivity Corridors between India and Myanmar into Development Corridors*. Research and Information System for Developing Countries, New Delhi.
- —— 2016. Mekong-Ganga Cooperation Report. Research and Information System for Developing Countries, New Delhi.
- —— 2019. *Mekong Ganga Policy Brief*, No. 8, August. Research and Information System for Developing Countries, New Delhi.

Appendix 1

Comparing Plan of Action of both ACMECS and MGC

Areas for Action	ACMECS	MGC
Trade		MGC Trade Fair either in India or any other MGC country in conjunction with a prominent trade exhibition focusing on MSMEs.
Connectivity	Promote multimodel transport connectivity links. Special emphasis will be on filling all the missing links in the subregion, particularly, railway network connecting the East-West Economic Corridor (EWEC) and Southern Economic Corridor (SEC)	 India-Myanmar-Thailand Trilateral Highway – ongoing. Proposal to extend the India-Myanmar-Thailand Trilateral Highway to Cambodia, Lao PDR and Vietnam, and its development as an economic growth corridor. Early conclusion of the India-Myanmar-Thailand Motor Vehicle Agreement (MVA) to facilitate seamless movement of goods and passengers across borders, thus leading to greater trade and tourism.
Soft Infrastructure	To promote software connectivity for harmonisation and simplification of rules and regulations to facilitate movement of people, free flow of goods, services and investment to leverage integrated value and supply chain	 Promote exchange of experiences and information on policies and management regulations of ICT industry, popularisation of public services, development of ICT infrastructure, e-governance, e-commerce, e-education and other related e-services. Enhance connectivity and cross-border ICT services to promote e-commerce as well as social and cultural exchanges. Organise workshops and training programmes in digital connectivity and ICT infrastructure development for government officials from MGC countries. India's initiative on Digital Connectivity with CLMV region
FinTech	To promote financial literacy, FinTech and cooperation between banks and other financial service providers.	

Appendix 1 continued...

Education		 Promote the 50 MGC scholarships offered by the Indian Council for Cultural Relations (ICCR) Promote training in traditional systems of medicine through exchange of faculty and students among national institutions. Offering 10 scholarships annually to MGC countries for students interested in pursuing under-graduate/post-graduate/ Ph.D in Ayurveda, Unani, Siddha, Homeopathy and Yoga. Launch a website dedicated to MGC which would contribute to branding of the regional grouping and provide useful information on the various joint programmes and activities.
Environment		Undertake collaborative projects in the areas of sustainable water management, water harvesting, water data collection, climate change adaptation and mitigation, integrated water resources management, groundwater management, transboundary basin management, water quality monitoring, flood and drought management and disaster reduction, etc.
Health		 By sending Indian Ayurveda specialists under the Indian Technical and Economic Cooperation Programme (ITEC) to Mekong countries upon request. Organise various workshop related to health and traditional medicine
Human resource	Develop human capacity in the areas of entrepreneurship (MSMEs/Startups), agricu-lture, tourism, medical services and education, and also promote environmental cooperation including sustainable water resource management and other strategic fields including agriculture, industry, tourism, health, renewable energy, climate change, disaster-risk management, and natural resources conservation.	 Organise workshop on agriculture and allied issues Conduct training programme on water management. Organise training and scholarship programmes in the areas of national accounts statistics and large scale socio-economic sample surveys. Facilitate knowledge sharing through exchange visits by experts from vocational training institutions and skill development authorities. Organise annual training programmes on the topics related to MGC areas of cooperation as well as other relevant issues which are in line with the SDGs under Thailand's Annual International Training Courses – AITC.

 $Appendix\ 1\ continued...$

Culture		 A textile exhibition along with cultural activities to showcase at the MGC Asian Traditional Textile Museum (ATTM) Promote capacity building and exchange best practices in preservation of historical and cultural monuments Establish a Common Archival Resource Center (CARC) at Nalanda University Cooperate in the field of radio and television broadcasting through exchange of content and programmes, exchange of personnel for training purposes, sharing of technical expertise and joint production of documentaries Develop a joint calendar of important Travel Fairs and Cultural Festivals in MGC countries for information dissemination and promotion. Invite craftsmen and cultural troupes from MGC countries to participate in prominent cultural fairs and
Tourism		 Encourage to visit Buddhist sites in MGC countries Organise food festival to showcase the rich culinary traditions Encourage exchange of students through offer of scholarships for diploma and certificate courses in tourism and travel management, hospitality management etc. To this end, Ministry of Tourism, Government of India will offer 5 scholarships (one to each MGC country) at Indian Institute of Tourism Management or Indian Institute of Hotel Management. Develop institutional contact between National Hospitality/ Tourism Management Institutes or related agencies through exchange of experts, training collaboration and exposure visits of students.
Funding	Thailand's initiative in proposing the establishment of an ACMECS Fund as innovative financing mechanism to address the need for funding of projects under the ACMECS Master Plan.	 Host an Innovation Forum in one of the MGC countries to promote social innovations in agriculture, transport, communication, industrial know-how transfer, e-commerce, information and communication technology (ICT), health, energy and environment, food, etc. India's pledge of Indian Rupees 5 billion (equivalent to USD 72.5 million) under a Project Development Fund to facilitate Indian investments in Cambodia, Lao PDR, Myanmar and Vietnam.
Forum	ACMECS CEO Forum	 MGC Business Forum focusing on MSMEs Organise an MGC Business Forum focusing on MSMEs on the sidelines of ASEAN-India Business Expo and Summit to be organised by Vietnam in 2020.

 $\label{local:eq:Note:Pormore details see MGC Master Plan of Action. Available at https://mea.gov.in/bilateral-documents.htm?dtl/31712/Mekong+Ganga+Cooperation+MGC+Plan+of+Action+20192022$

Appendix 2

Possible Areas of Cooperation with Potential Development Partners

1. Infrastructure	1. Software Connectivity	3.1 Smart Entrepreneur (SMEs/ Startups)		
1.1High-technology	2.1 Trade & Investment	(ROK,CHN, IND,JAP)		
hardware	2.1.1 Institutional Synchronisation and Interoperability of rules and regulation	3.2 E-Commerce		
infrastructure		(CHN, US)		
(CHN / JAP/ROK)		3.3 Smart Agriculture		
	(CHN / JAP)	(CHN/JAP)		
	2.1.2 Integrated value chain	3.4 Sustainable Energy		
	(CHN/ JAP / ROK/US)	(US/JAP/CHN)		
		3.5 Smart and Sustainable Tourism		
		(ROK/TH/JAP)		
		3.6 Medical Service		
		(IND/US/ JAP/ROK)		
		3.7 Vocational and University Education		
		(US / JAP/ IND)		
		3.8 Financial Literacy		
		(CHN/JAP/US)		
1.2 Digital Infrastructure	1.2 Financing Cooperation			
(US / JAP / IND)	1.2.1 ACMECS Infrastructure Fund and			
(03/)/11 / 11(D)	Trust			
	(TH/ CHN/ JAP)			
	1.2.2 Capital Market Cooperation			
	(TH / JAP / CHN)			
	1.2.3 Other Financial Connectivity			
	(US / JAP / ROK)			
1.3 Energy Infrastructure and				
Connectivity (US/JAP/CHN)				

Source: ACEMECS Master Plan, ACMECS.

12

Scaling up People-to-People Linkages between ASEAN and India: Education and Tourism

1. Introduction

Socio-cultural issues in ASEAN-India relations assume special significance. Socio-cultural scooperation is one of the important pillars of ASEAN-India Strategic Partnership, which include human resource development, people-to-people contacts, education, health, biodiversity, climate change and disaster management. At the Commemorative Summit held in January 2018, the Leaders of ASEAN countries and India underscored the importance of cultural relations in building an inclusive and progressive society. Shared historical ties, culture and knowledge have continued to guide the sustained interactions between India and Southeast Asia. Cultural links between India and Southeast Asia reflect the multi-cultural and multi-heritage tolerance society. Education is one of the important areas of cooperation between ASEAN and India, which can take the partnership to a new height. Noted in AIDCR 2015: "The promotion of India's strategic objectives could be more effective through the exercise of its soft power in terms of education, culture and democracy".

Current engagements between India and ASEAN in people-to-people linkages are quite extensive. Several projects on people-to-people linkages are held annually to promote people-to-people linkages between India and ASEAN. Projects which have been carried out on this front are: (i) ASEAN-India Network of Think Tanks, (ii) Exchange of Parliamentarians, (iii) ASEAN-India Media Exchange Programme; (iii) ASEAN-India Students Exchange Programme; (iv) ASEAN-India Eminent Persons Lecture Series; (v) Special Course for ASEAN Diplomats; (vi) Delhi Dialogue; (vii) ASEAN-India Youth Summit, etc.

India's active engagement in implementing of the Initiative for ASEAN Integration (IAI) Work Plans with the implementation of some of the IAI projects/activities, such as the Entrepreneurship Development Centres (EDC) and the Centres for the English Language Training (CELT) in Cambodia, Lao PDR, Myanmar and Vietnam.

Given above, this chapter discusses the emerging scenario in the areas of education and tourism - the two vital pillars of the people-to-people linkages between ASEAN and India. Rest part of the chapter is organised as follows. Section 2 presents the trends in educational exchange between ASEAN and India, and the Section 3 recommends steps for strengthening the educational partnership between ASEAN and India including presentation of an overview of the ASEAN-India University Network (AIUN). Section 4 presents the current profile of tourism exchange between ASEAN and India, followed by concluding remarks in Section 5.

2. Trends in Educational Exchange between ASEAN and India

There are two dimensions of educational links between India and Southeast Asia: the first one is investigation and research into various aspects of the educational linkages between India and Southeast Asia, to throw new light on existing knowledge about educational links and explore new areas; and the second one is the education as a tool to find commonalities in the contemporary context and promote political, economic and strategic cooperation.

Educational exchange is one of the key pillars of ASEAN-India Strategic Partnership. Indian students go abroad for higher educational purpose and the traditional destinations are the USA, Australia and New Zealand. Table 1 presents Indian students studying in foreign universities as on 2018. It shows that 33 per cent of India's overseas students have been studying in several Southeast and East Asian countries. In sharp contrast, students coming from Southeast and East Asia to study in India show a declining trend, except Korea, Malaysia, Indonesia, Thailand and Vietnam (Table 2).

Table 1: Indian Students Studying in Foreign Universities in Asia-Pacific, 2018

Country	No. of students	Share in total (%)		
Australia	87115	11.57		
Brunei Darussalam	24	0.00		
China	18171	2.41		
Hong Kong	500	0.07		
Indonesia	17	0.00		
Japan	1236	0.16		
Korea	1230	0.16		
Malaysia	1900	0.25		
New Zealand	30000	3.99		
The Philippines	11000	1.46		
Russian Federation	11000	1.46		
Singapore	2000	0.27		
Thailand	297	0.04		
USA	211703	28.12		
Total	752725	100		

Source: List of estimated Indian students pursuing studies in foreign Universities (based on inputs received from Indian Missions/Posts abroad as on 18 July 2018).

The trade in educational services takes place through Mode 1 (cross-border supply), Mode 2 (consumption abroad), Mode 3 (commercial presence), and Mode 4 (presence of natural persons). India has not committed in GATS in educational services but made GATS+ offer in bilateral FTAs such as with Singapore and Korea as well as India-ASEAN services trade agreement (except Thailand).

ASEAN is one of the favourite destinations of Indian students for higher studies at centres like Singapore, Malaysia and Thailand. Several Indian universities have already opened branches in ASEAN. Therefore, India's investment in ASEAN in the education sector has been growing (e.g. AMITY University's investment in Singapore or Manipal Group's investment in Malaysia). Similarly, many students from Southeast Asian countries have been studying in IITs and IIMs. There is a demand for the opening of campuses of IITs and IIMs in Indonesia and Singapore. Indian private universities like Amity, Shiv Nadar, O P Jindal, SRM, BITS, BML Munjal, etc. could be enlisted to receive students from

Southeast Asia to study in India. Besides, India's New Educational Policy (NEP) 2020 aims to facilitate top 100 foreign institutes to open campuses in India.² This is a significant step towards deepening India's educational cooperation with ovrseas countries including ASEAN. Therefore, the NEP 2020 provides an opportunity for leading ASEAN universities such as NUS, University of Malaya, NTU, Chulalongkorn University, etc. to open campuses in India.

Table 2: Trends of Students from Southeast and East Asia in India

	All levels*					CAGR (%)	
Country	2010-11		2015-16		2018-19		(2010-11 to
	Students	Share (%)	Students	Share (%)	Students	Share (%)	2018-19)
Brunei	3	0.01	2	0.004	3	0.01	0.00
Cambodia	41	0.15	55	0.121	19	0.04	-9.17
China	951	3.45	191	0.42	105	0.23	-24.08
Hong Kong	37	0.13	8	0.018	6	0.01	-20.34
Indonesia	176	0.64	118	0.26	189	0.41	0.89
Korea	56	0.2	150	0.33	162	0.35	14.20
Lao PDR	227	0.82	33	0.073	60	0.13	-15.32
Malaysia	29	0.11	1901	4.185	1024	2.22	56.13
Myanmar	830	3.01	268	0.59	405	0.88	-8.58
The Philippines	170	0.62	18	0.04	16	0.03	-25.58
Singapore	155	0.56	154	0.339	111	0.24	-4.09
Thailand	352	1.28	336	0.74	389	0.84	1.26
Vietnam	195	0.71	169	0.372	227	0.49	1.92
Total	27531	100	45424	100	46176	100	6.68

Note: *Higher education including diploma, graduation, post-graduation and PhD.

Source: MoHRD, Government of India.

The ASEAN-India students exchange programme has been gaining high popularity across Southeast Asia and beyond. India's recent offer of 1000 fellowships to study PhD programme in IITs has changed the contour of the ASEAN-India educational relation, and it assumes special significance. India has committed to offer over 1000 scholarships to students of the ten ASEAN countries to do integrated PhD at IITs, and already two batches of ASEAN students have got admitted in IITs (see Box 1). The funding covers the entire cost of study and living expenses for up to five years of their PhD programme.

Another major development in the educational sector between India and ASEAN is setting up of the Nalanda University. Nalanda University was established in 2010. It came into being by an act (Nalanda University Act 2010) of the Indian Parliament. Located in the town of Rajgir, in the State of Bihar, Nalanda University is mandated to be "international institution for the pursuit of intellectual, philosophical, historical and spiritual studies" (Act). Nalanda University has been designated as an "institution of national importance" (Act). In September 2014, the University started admitting overseas students. At present, the University offers the following courses: MBA in Sustainable Development and Management in the School of Management Studies; Master's and PhD in Historical Studies; Master's and PhD in Ecology and Environment Studies; Master's and PhD in Buddhist Studies, Philosophy and Comparative Religion; and Diploma and Certificate in Languages.

Besides, India has been actively contributing to the development of educational skills and technical training to a large number of people in the region through Indian Technical and Economic Cooperation (ITEC). Through this capacity building programme, India assists various countries officials in government, public and private sectors, universities, chambers of commerce and industry, etc. in improving their skills in the fields like Account, Audit, Banking and Finance; Environmental and Renewable Energy; IT, Telecommunication and English; Management; SME, Rural Development. These technical and specialised courses are provided by many premier training institutions of excellence of India. ITEC also provides training courses in the defence field i.e. Army, Navy and Air Force conducted by several defence training centres. Participants from ASEAN countries like Brunei, Cambodia, Indonesia, Lao PDR, Malaysia, Myanmar, The Philippines, Thailand and Vietnam have received benefits of these courses. Box 2 presents an overview of the ITEC programme. Citizens of several ASEAN countries have been attending the ITEC programmes regularly. In view of growing interests, ITEC slots may be increased for the ASEAN countries, particularly in the areas of science and technology cooperation, technical training, training in health sector, gig economy, etc.

Box 1: India's Offer of 1000 Integrated PhD Fellowships to ASEAN Students at IITs

In January 2018, Indian Prime Minister had announced at the 25th Anniversary ASEAN-India Commemorative Summit in New Delhi India's offer of upto 1000 integrated PhD Fellowships for ASEAN students in the prestigious Indian Institutes of Technology (IITs). In implementation of this commitment, this programme was formally launched on 16 September 2019. The IIT Delhi has been designated as the coordinating IIT for the fellowship programme. It has developed a web portal (http://asean.iitd.ac.in) to administer the application and admission process. ASEAN students can log in to the portal to apply for PhD programmes of their choice at various IITs.

Admissions under the programme are staggered over three academic years, i.e. 2019-2020, 2020-2021 and 2021-2022. As on July 2020, two rounds of admission selections were completed and offered admissions to a total of 40 ASEAN students.

The fellowship programme at a total budget outlay of INR 300 crore (approx. US\$ 45 million) is the single-largest capacity development initiative of India in its partnership with ASEAN.

Sources: MEA and http://asean.iitd.ac.in/index.html

Under the ITEC programme, India offers 1102 scholarships annually to the ASEAN countries of short-term training programmes in various sectors. Additionally, India also provides around 200 scholarships to ASEAN students every year for bachelors, masters and doctoral programmes in premier Indian institutes under the ICCR's scholarship scheme. So far, 294 space scientists from ASEAN countries have benefited from the training programmes at the Center for Space Science and Technology Education in Asia and the Pacific (CSSTEAP) in Dehra Dun, India.

ASEAN India also have been collaborating in the areas of science and technology by establishing ASEAN India S&T working group (AIWGST) in 1996. The projects under this collaboration were initially funded through the ASEAN India Fund (AIF). However, in 2008, a dedicated ASEAN-India S&T Development Fund (AISTDF) was established jointly by MEA and DST to support R&D projects and associated project development activities. ASEAN-India Science and Technology Programme has supported and implemented a number of projects and scientific activities, which includes ASEAN-India Collaborative R&D programme on Thermally Sprayed Ceramic-Based Coatings; R&D project on Extent of Transfer of Alien Invasive Organisms (Nuisance) in South/Southeast Asia Region by Shipping; Training Course on Analysis of Chemicals and Biological Contaminants in Raw and Processed Products

for ASEAN Countries.⁴ Besides, ASEAN-India Research and Training Fellowship (AIRTF) and ASEAN-India Innovation Platform (AIIP) are in place to support the S&T collaboration.

Agriculture is another good example of people-to-people contacts between ASEAN and India. Projects like Exchange of Farmers, ASEAN-India Fellowships for Higher Agricultural Education in India and ASEAN, Exchange of Agriculture Scientists, Empowerment of Women through Cooperatives, Training Course on Organic Certification for Fruits and Vegetables etc. have been initiated to further strengthen the ASEAN-India relations.

Telecommunications Consultant India Ltd (TCIL) has been implementing digital connectivity project in ASEAN to provide tele-education and telemedicine services. Of recently, India's retail payment operator and settlement system, National Payments Cooperation of India (NPCI) has tied-up with APIX, World's first Cross-border architecture API platform, of the ASEAN Finance Innovation Network (AFIN). India can help ASEAN countries, particularly CLMV to build digital success stories like Aadhaar, Direct Benefits Transfer (DBT) and UPI.

Box 2: ITEC Programme

The Indian Technical and Economic Cooperation (ITEC) Programme was instituted by a decision of the Indian Cabinet on 15 September 1964 as a bilateral programme of assistance of the Government of India. The ITEC Programme is essentially bilateral in nature. However, in recent years, ITEC resources have also been used for cooperation programmes conceived in a regional and inter-regional context such as Economic Commission for Africa, Commonwealth Secretariat, UNIDO, Group of 77 and G-15. In more recent years, its activities have also been associated with regional and multilateral organizations and cooperation groupings like Association of South-East Asian Nations (ASEAN), Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC), Mekong-Ganga Cooperation (MGC), African Union (AU), Afro-Asian Rural Development Organisation (AARDO), Pan African Parliament, Caribbean Community (CARICOM), World Trade Organisation (WTO) and Indian Ocean Rim - Association for Regional Cooperation (IOR-ARC) and India-Africa Forum Summit. The ITEC Programme, fully funded by the Government of India, has evolved and grown over the years. Under ITEC and its sister programme SCAAP (Special Commonwealth African Assistance Programme), 161 countries in Asia, Africa, East Europe, Latin America, the Caribbean as well as Pacific and Small Island countries are invited to share in the Indian developmental experience acquired over six decades of India's existence as a free nation. As a result of different activities under this programme, there is now a visible and growing awareness among other countries about the competence of India as a provider of technical know-how and expertise as well as training opportunities, consultancy services and feasibility studies. These programmes have generated immense goodwill and substantive cooperation among developing countries.

Source: MEA.

Since 2006, the Sushma Swaraj Foreign Service Institute (SS-FSI) has been conducting a special training course for ASEAN diplomats every year.

India has also been extending financial assistance to the Economic Research Institute for ASEAN and East Asia (ERIA) in Jakarta, which is involved in undertaking policy research on topics of interest to the ASEAN countries that can contribute to bridging the development gap within ASEAN.

2.1 ASEAN-India Network of Think-Tanks (AINTT)

The Roundtable of the ASEAN-India Network of Think-Tanks (AINTT) is an outcome of Indian Prime Minister's Statement at the 7th India-ASEAN Summit, where the establishment of an India-ASEAN Roundtable, comprising think-tanks to bridge knowledge gap was envisaged. One of the primary objectives of this Roundtable is, therefore, to provide policy inputs to the governments of India and the ASEAN countries on the future areas of cooperation. Another purpose of the interaction between think-tanks is to deepen the ASEAN-India partnership through policy research and advocacy. The last six roundtables of the AINTT were held at New Delhi (2012), Vientiane (2013), Hanoi (2014), Kuala Lumpur (2015), Jakarta (2018) and New Delhi (2020, through video-conference). Over the years, these successful events not only covered traditional issues of cooperation but also emphasised on new areas of cooperation to strengthen the ASEAN-India relations. One of the recommendations of AINTT was to set up an academic journal by think-tanks of ASEAN and India, which led to publish the Journal of Asian Economic Integration (JAEI). The idea of the journal was first discussed at the 14th ASEAN-India Summit, which was held in Lao PDR in 2016. The JAEI is an outcome of research collaboration between think-tanks of ASEAN and India (see Box 3).

Box 3: Journal of Asian Economic Integration

The Asian integration process has taken a new shape. Countries in Asia are part of several regional and sub-regional integration initiatives. A specialised journal is needed to reflect upon the Asian integration process. Journal of Asian Economic Integration provides detailed coverage of a wide range of topics in economics relating to Asia, including investigation of current research, international comparisons and country studies. It is a forum for debate amongst theorists, practitioners and researchers and publishes high-quality theoretical, empirical and policy-oriented contributions. It facilitates the exchange of information among researchers on a worldwide basis and offers a unique opportunity for economists to keep abreast of research on economics pertaining to Asian integration. The aim of the Journal of Asian Economic Integration is to become an intellectual voice on the current issues of international economics and economic policy, based on comprehensive and in-depth analyses, with a primary focus on Asia. This journal is a member of the Committee on Publication Ethics (COPE). Published by Sage, the journal is being published in collaboration between ASEAN-India Centre (AIC) at RIS, New Delhi and ASEAN Studies Center (ASC), Chulalongkorn University, Bangkok. This bi-annual journal is in operation since 2019 and till now it has published four issues. Further details are available at https://journals.sagepub.com/home/eci

Source: ASEAN-India Centre (AIC), RIS.

3. Strengthening Educational Partnership - Suggested Steps⁵

Today, ASEAN and India have been facing several challenges in the areas of education, and some of are as follows: (i) falling trends of ASEAN students coming to India; (ii) sustaining university to university partnership; (iii) accreditation of degrees and diplomas; and (iv) improve global rankings through quality education. However, the accreditation of degrees and diplomas between ASEAN and India has been identified as the key to enhance the educational exchange between ASEAN and India.

ASEAN and India should work together to strengthen the university to university partnership and accreditation of degrees and diplomas as well as improve their global rankings. The signing of mutual recognition agreements (MRAs) between regulatory bodies of ASEAN countries and India will pave the way for deeper partnership in higher education, particularly in Covid-19 period when a major chunk of

Indian students studying in China may like to relocate in ASEAN countries. To strengthen the partnership, ASEAN and India must design a comprehensive action plan with a particular focus on higher education.

ASEAN and India have been working to promote greater awareness and appreciation of both ASEAN and India through the implementation of educational and vocational training exchanges and people-to-people activities, especially among the youth. ASEAN and India should support more exchange programmes and involvement of youths. It is recommended to create more exchanges, increase involvement of youth, campuses, and institutes in ASEAN. ASEAN and India may design joint educational programmes, credit transfer system, twinning programmes, etc.; open courses on ayurveda, yoga, naturopathy; conduct skill development programmes, technical education, etc.; exchange of faculty; joint publications and disseminations; support annual dialogue on higher education policy; etc. in a calibrated manner.

Proposed Action Plan

- Support annual dialogue
 - Higher education policy dialogue (at ASEAN + level)
 - ASEAN-India VCs Conference
 - ASEAN-India Rectors' Conference
- Sign MoU between ASEAN University Network (AUN) and Indian universities, AIU and UGC
 - Join ASEAN+3 Unet
- Set up ASEAN-India University Network (AIUN)
- Set up ASEAN-India Open Universities Network (AIOUN)

ASEAN and India may consider to sign MoUs between ASEAN University Network (AUN), Association of Indian Universities (AIU) and University Grants Commission (UGC) to facilitate university to university (U2U) partnership and accreditation of degrees and diplomas between ASEAN and India. For India, it is important to set up the ASEAN-India University Network (AIUN), and sign MoU between AUN and AIUN. Besides, ASEAN and India may consider establishing the ASEAN-India Open Universities Network (AIOUN); ASEAN-India Business School Network (AIBSN); etc. India may also consider joining the ASEAN+3 University Network, which is being operated by ASEAN.

A series of dialogues may be conducted at different levels between India and ASEAN. For example, ASEAN and India may organise ASEAN-India Vice-chancellors Conference; ASEAN-India Rectors Conference; etc.

3.1 Suggested Outline of AIUN

The broad outline of AIUN could be as follows:

- To promote academic cooperation between ASEAN universities and Indian universities;
- To aim for academic mobility (student, faculty and staff mobility) and exchange;
- To conduct dialogues to design programme for mutual recognition of degrees and diplomas;
- To exchange opinions and design strategy on courses of mutual interests, such Southeast Asian studies in India and Indian studies in ASEAN; and
- To help the government to convene meetings, conduct joint researches, training and capacity building, etc.

4. Promoting Tourism Cooperation

Tourism is one of the key components of people-to-people connectivity between ASEAN and India, and one of the key generators of foreign exchange reserves. Tourism is also identified as a key pillar of India's soft power.⁷

ASEAN and India offer several forms of tourism such as cultural tourism, heritage, religious travel, conferences and seminars, Bollywood, Himalaya, Sea and beaches, medical and wellness, cruise, cuisine, etc. Barring the Covid-19 period, tourism between ASEAN and India has grown rapidly in recent years. India and ASEAN celebrated the year 2019 as the ASEAN-India Year of Tourism.

There are several factors which have contributed to the rise of tourism between ASEAN and India. India's diverse culture, its vibrant democracy, and a non-aligned foreign policy have helped India to attract ASEAN tourists. Besides, multiple tourist interests in ASEAN along with ease of travel, comfortable and economical stay, India's unilateral Visa on Arrival (VOA) facility to all ASEAN countries have contributed to the rise of tourists flow between ASEAN and India. Table 3 presents the tourists flow between ASEAN and India for the period 2011 and 2018. In 2018, about 4.7 million Indian tourists visited ASEAN, most of which travelled to Thailand and Singapore. In ASEAN, CLMV countries have witnessed a steep rise in inward tourists flow from India between 2011 and 2018, compared to other ASEAN countries. The only country in ASEAN which has witnessed negative growth in inward tourist arrivals is Malaysia. In comparison, India has received almost a million tourists from ASEAN in 2018, grown at 7.88 per cent between 2011 and 2018. Most of the ASEAN tourists visiting India are from Malaysia, Singapore and Thailand. In comparision, incoming tourists from Brunei, Cambodia and Lao PDR to India are still negligible.

Table 3: Tourists Flow between ASEAN and India

	ASEAN T	ASEAN Tourists Arrival in India			India Tourists Arrival in ASEAN		
Country	2011	2018	CAGR^ (%)	2011	2018	CAGR^ (%)	
Brunei	*	*		4616	8635	9.36	
Cambodia	*	*		15240	65882	23.26	
Indonesia	32530	46867	5.35	154237	595636	21.29	
Lao PDR	*	*		3227	4864	6.04	
Malaysia	208196	319172	6.29	693056	600311	-2.03	
Myanmar	25043	75773	17.14	12318	102702	35.39	
The Philippines	31151	53473	8.02	42844	121124	16.01	
Singapore	119022	183581	6.39	868991	1442277	7.51	
Thailand	92404	166293	8.76	916787	1596772	8.25	
Vietnam	9809	31427	18.10	16520	132371	34.62	
Total	521755	887088	7.88	2711316	4670574	8.08	

Notes: * Negligible or Not available ^CAGR for the period 2011 and 2018.

Sources: India Tourism Statistics 2013-14 and 2019-20 and ASEANstat.

ASEAN-India Tourism Cooperation8

Tourism is also one of the key drivers of connectivity between ASEAN and India. The Plan of Action (POA) to implement the ASEAN-India Partnership for Peace, Progress and Shared Prosperity (2016-2020) has outlined following milestones for the tourism sector.

- "2.7.1. Support continued consultations between ASEAN and India to promote tourism cooperation, such as in the areas of joint marketing and promotion, seminars, workshops, meetings, sharing tourism best practices and resources including human resource development, practising sustainable and responsible tourism, tourism information exchange, crisis communications, tourism investment, joint promotion in the areas of niche markets and promotion of tourism standards activities;
- 2.7.2. Encourage the private sector from ASEAN and India to increasingly participate in the annual ASEAN Tourism Forum (ATF), ASEAN Travex, professional international travel marts held in the ASEAN Member States and India to create more opportunities for joint promotion of integrated tourism markets and joint investment;
- 2.7.3. Strengthen the ASEAN-India capacity building programme in the tourism sector, including language courses for tourism stakeholders;"

The 7th Meeting of ASEAN and India Tourism Ministers (ATM+India) was held on 18 January 2019 at Ha Long City, Vietnam. It was noted that nearly 139.5 million tourist arrivals to ASEAN and India in 2018, an increase of 7.4 per cent compared to the previous year. The 7th ASEAN-India Tourism Ministers meeting has recommended several programmes to further encourage ASEAN-India two-way tourists flow. The Ministers welcomed the decisions of the ASEAN-India Informal Breakfast Summit, held on 15 November 2018 in Singapore. As a follow-up to the Summit, the Ministers launched the ASEAN-India Tourism Cooperation Year 2019 and looked forward to enhancing cooperation with a view to increasing two-way tourist visits and promoting greater people-to-people exchanges between ASEAN and India. The Ministers agreed to focus on key activities such as ASEAN Tourism Forum 2019, SATTE 2019, ASEAN NTOs Meeting in Cambodia in 2019, the activities to be undertaken by the ASEAN Promotional Chapter for Tourism (APCT) in Mumbai in 2019, as well as a request of India to help promote ASEAN Tourism through India national TV stations. The Ministers also took into consideration Vietnam's invitation to participate in annual international travel marts organised in Vietnam such as Ho Chi Minh City's International Travel Expo (ITE) and Vietnam International Travel Mart (VITM). The Ministers also agreed to further enhance ASEAN-India cooperation in tourism under the framework of the 2012 Memorandum of Understanding between ASEAN and India on Strengthening Tourism Cooperation with intensified efforts and activities. The Ministers were pleased to note the progress made in the implementation of the Memorandum of Understanding organised through the following activities in 2018:

- Sharing best practices for the development of responsible and/or sustainable tourism, particularly
 in sharing information in the development of the ASEAN Sustainable Tourism Assessment Tools
 (ASITAT);
- Sharing resources and facilities to provide mutual assistance in tourism education and training for
 quality tourism development, including the development of the Concept Paper on the ASEAN-India
 Tourism Training Programme, as well as the invitation from India for ASEAN countries to depute
 their tourism professionals to join short courses, workshops or seminars in India;
- Crisis communications to protect the reputation and credibility of the relevant tourism organisations and/or tourist destination, particularly through the establishment of the ASEAN-India Crisis Communications Team;

- Exchange information pertaining to statistics and development strategies, investment opportunities
 and economic data, including the 5th India-CLMV Business Conclave held in May 2018 as a platform
 for cooperation with all tourism-related cross sectors such as MSMEs, manufacturing, and information;
 and
- International Buddhist Conclave held on 22-25 August 2018, and the development of the Buddhist Tourism Story Book and website of Buddhist Tourism in ASEAN and South Asia;

The Plan of Action (POA) to implement the ASEAN-India Partnership for Peace, Progress and Shared Prosperity (2021-2025) has outlined following milestones for the tourism sector for the period 2021-2025.

- "44. Enhance consultations between ASEAN and India to promote tourism cooperation, such as in the areas of joint marketing and promotion, sharing of best practices and expertise related to human resource development, practising sustainable and responsible tourism, tourism information exchange, crisis communications, tourism investment, joint promotion in the areas of niche markets and promotion of tourism standards;
- 45. Enhance engagement between private sectors from ASEAN and India, through the participation in the annual ASEAN Tourism Forum (ATF), ASEAN TRAVEX, professional international travel marts held in ASEAN Member States and India, in order to create more opportunities for joint promotion of integrated tourism markets and joint investment;
- 46. Strengthen ASEAN-India capacity building programmes in the tourism sector through seminars, workshops, trainings and language courses for tourism professionals;"

What follows is that tourism is one of the hardest hit sectors in this Covid-19 period. However, once the pandemic subsides, tourism will rebound sharply, provided countries agree to strengthen connectivity and restore favourable business environment. At the Special Meeting of ASEAN Tourism Ministers on Coronavirus Disease 2019 (Covid-19) held on 29 April 2020, ASEAN Tourism Ministers underscored the impact of Covid-19 on travel and tourism and listed several action plans to mitigate the outbreak along with ASEAN partners in some of the action plans (see Box 4). Given the sector's vast employment potential, both ASEAN and India should undertake a calibrated approach in opening up the tourism sector for inter-country travel and tourism. Countries may insist on new standard and protocols including travel bubble and green lane in the Covid-19 time. Therefore, ASEAN and India may undertake joint initiatives to build confidence among consumers in the tourism industry. The ASEAN-India Tourism Facility (AITF) may be setup to promote areas of mutual interests through either MGC tourism programmes or ASEAN-India tourism activities. AITF may be entrusted to develop standard and protocols, tourism packages ad marketing, among others. Besides, a Handbook of ASEAN-India Tourist Places may be published for wider circulation, particularly at a time when cross-country tourism is expected to return in normal path in post-Covid-19.

6. Concluding Remarks

The present health crisis caused by the Covid-19 virus has impacted the people-to-people linkages. Education and tourism are the two vulnerable sectors, which have faced severe downfall due to the ongoing pandemic.

There is no denying that education and tourism are the next promising sectors which can take the ASEAN-India relations to a new higher level in post-Covid-19. There are ample opportunities to scale up the activities in the education and tourism sectors, and this chapter has identified some of these activities succinctly. One of the conclusions of this chapter is that both ASEAN and India shall facilitate accreditation of degrees and diplomas, and set up the AIUN.

Box: 4

Joint Statement of the ASEAN Tourism Ministers on Strengthening Cooperation to Revitalise ASEAN Tourism 29 April 2020

The Tourism Ministers of the member states of the ASEAN have convened the Special Meeting of ASEAN Tourism Ministers on Coronavirus Disease 2019 (Covid-19) on 29 April 2020. ASEAN countries underscored the impact of Covid-19 outbreak on health, well-being, and safety of ASEAN Community. The Tourism Ministers underscored the impact of Covid-19 on travel and tourism business that leads to high unemployment and furlough rates, and adversely affecting the livelihood of the people in ASEAN. ASEAN Tourism Ministers recognise the need for a strengthened ASEAN coordination mechanism to collectively overcome surging challenges to the tourism sector. Ministers also encouraged ASEAN Sectoral Ministerial Bodies in all three ASEAN Community Pillars in taking united effort to mitigate the impact of the outbreak, that are as follows:

- Foster ASEAN coordination in expediting information exchange on travel related health
 and other necessary measures undertaken by ASEAN Member States to control the spread
 of the Covid-19 outbreak through the enhanced operation of the ASEAN Tourism Crisis
 Communication Team (ATCCT) to provide timely and reliable information for inbound and
 outbound travellers and tourism operators throughout ASEAN;
- Intensify ASEAN's National Tourism Organisations' (NTOs) collaboration with other relevant ASEAN sectors, especially in health, information, transport and immigration, and with external partners and international organisations to jointly implement measures and build on each other's platforms to promote a comprehensive, transparent and early response to mitigate and alleviate the impact of Covid-19 and future crises;
- Enhance closer cooperation in the sharing of information and exchange of best practices among ASEAN Member States as well as with ASEAN Dialogue Partners on the responses to the crisis, communications readiness, connectivity coordination, national relief efforts and measures to support the tourism sector;
- Implement clear policies and measures to bolster confidence among domestic and international visitors to Southeast Asia, including the development of clear standards and guidelines for a safer and healthier work environment and tourism-related industries;
- Support the development and implementation of a post Covid-19 Crisis Recovery Plan in building up ASEAN tourism capabilities, engaging with industry stakeholders to stimulate the tourism sector through the use of digital technologies, and initiate joint tourism promotion programmes with the goal to advance ASEAN as a single tourism destination;
- Expedite both micro- and macro- economic policies, among others, providing technical support and financial stimulus, tax alleviation, capacity and capability building, especially digital skills, for travel and tourism stakeholders; and
- Pursue cooperation with ASEAN Dialogue Partners, relevant international organisations and industry stakeholders to build a resilient and prepared Southeast Asia to effectively implement and manage sustainable and inclusive tourism in the aftermath of a crisis.

Source: ASEAN Secretariat (2020).

Apart from education, tourism also plays a significant role in connecting people of the region. It has been observed that Thailand and Singapore offer more preferred tourism destinations for Indian tourists than other ASEAN countries, while, ASEAN tourists prefer Buddhist circuit and cultural heritage sites in India. This chapter recommends that both India and ASEAN shall work together to facilitate the people-to-people connectivity, particularly in the post-Covid-19 period. Outlined in this chapter, India and ASEAN shall undertake joint programmes to overcome the current challenges as outlined in this chapter. Innovative programme such as setting up AITF may help strengthen the tourism sector.

Endnotes

- 1. Refer, Ghosal (2015).
- 2. See, MHRD (2020).
- 3. Refer, https://nalandauniv.edu.in/about-nalanda/vision/
- 4. See, https://www.aistic.gov.in/ASEAN/HomePage
- 5. Based on the recommendations of 5th AINTT roundtable, held in Jakarta in 2018.
- 6. Refer, ASEAN-India POA (2016-2020).
- 7. Read, for example, Bhonsale (2019), Ghosal (2015), etc.
- 8. Based on the inputs collected from ASEAN Secretariat and the MEA.
- According to the Ministry of External Affairs of India, around 3.45 million tourists arrived to ASEAN from India traveled. Refer, the discussion of the 7th ASEAN-India Tourism Ministers meeting.

References

- ASEAN Secretariat. 2020. Joint Statement of the ASEAN Tourism Ministers on Strengthening Cooperation to Revitalise ASEAN Tourism. 29 April 2020. Available at: https://asean.org/storage/2020/04/ENDORSED-Joint-Statement-of-the-ASEAN-Tourism-Ministers-on-COVID_19-29Apr20.pdf
- ASEAN-India Science, Technology & Innovation Cooperation. Ministry of External Affairs, Government of India. Available at https://www.aistic.gov.in/ASEAN/HomePage
- Bhonsale, M. 2019. *Religious tourism as soft power: Strengthening India's outreach to Southeast Asia.* ORF Issue Brief, Observer Research Foundation, New Delhi. Available at: https://www.orfonline.org/research/religious-tourism-as-soft-power-strengthening-indias-outreach-to-southeast-asia-55674/
- De, P. and Pan, S. 2020. ASEAN-India Educational Cooperation: Proposal for ASEAN-India University Network (AIUN). *ASEAN-India Partners of Integration in Asia*, 5Th AINTT Proceeding, 2020, New Delhi.
- Ghosal, B. 2015. Towards a Stronger Cultural Link. *ASEAN-India Development and Cooperation Report 2015*, Routledge Publication, London. 132-139.
- MEA. 2017. ASEAN-India Relation. Ministry of External Affairs, Government of India. Available at https://mea.gov.in/Portal/ForeignRelation/ASEAN_India_August_2017.pdf
- 2018. 25 years ASEAN-India. Ministry of External Affairs, Government of India. Available at https://mea.gov.in/aseanindia/20-years.htm
- 2020. Keynote Address by Shri V. Muraleedharan, Minister of State for External Affairs at VIISAS-ICWA International Webinar. Ministry of External Affairs, Government of India, October 07, 2020. Available at https://www.mea.gov.in/Speeches-Statements.htm?dtl/33102/
- 2020. MOS's address at the webinar organised by North-Earthern Hill University on 'ASEAN-India Relations and the Rise of Multilateralism in Indo-Pacific and Beyond'. Ministry of External Affairs, Government of India, October 05, 2020. Available at https://www.mea.gov.in/Speeches-Statements.htm?dtl/33093/MOSs_address_at_the_webinar_organised_by_NorthEarthern_Hill_University_on_ASEANIndia_Relations_and_the_Rise_of_Multilateralism_in_IndoPacific_and_Beyo
- MHRD. 2020. New Education Policy, Ministry of Human Resource Development, Government of India. Available at: https://www.mhrd.gov.in/sites/upload_files/mhrd/files/NEP_Final_English_0.pdf

13

India-ASEAN Maritime Security Cooperation: The Indo-Pacific Context

1. Introduction

The Indo-Pacific region is witnessing the fastest economic, material and infrastructure development in the world. This is leading to the regional countries' common desire for a benign maritime environment devoid of insecurities caused by all disruptive forces, either state actors, or non-state entities, or even natural forces. This quest led to the Indian and Japanese think-tanks to conceive the 'Indo-Pacific' idea more than a decade ago in 2006-07.¹ Whereas the term 'Indo-Pacific' was not new, its revival germinated from the increasing security linkage between the Indian and Pacific oceans since the turn of the 21st Century. Unlike in the past², this linkage was now premised on maritime security and good order at sea. Since its revival in the current geopolitical context, the Indo-Pacific vision has been embraced not only by most regional countries, but also the extra-regional major powers and regional stakeholders. These include Australia, India, Japan, France, the United States (US), the Association of South East Asian Nations (ASEAN), with Germany being the latest addition.³

2. Backdrop

During the June 2018 *Shangri La Dialogue* at Singapore, the Indian Prime Minister (PM) Narendra Modi articulated India's vision of the Indo-Pacific. Among its key elements were,

"... equal access as a right under international law to the use of common spaces on sea and in the air that would require freedom of navigation, unimpeded commerce and peaceful settlement of disputes in accordance with international law (as a result of which,)... our sea lanes will be pathways to prosperity and corridors of peace. He added, (this would enable the regional countries) "to come together to prevent maritime crimes, preserve marine ecology, protect against disasters and prosper from blue economy."

This was the first formal statement of India's position on the Indo-Pacific concept. Nonetheless, the ASEAN has always been central, not only to India's Look (and Act) East Policy since the early-1990s, but also to its desire to fulfil the Indo-Pacific vision of regional peace and prosperity. During the India-ASEAN 10th Commemorative Summit held in New Delhi in December 2012, the then Indian PM, Dr Manmohan Singh had remarked,

"I feel, our (India-ASEAN) future is inter-linked and a stable, secure and prosperous Indo-Pacific region is crucial for our own progress and prosperity." In June 2018, the Indian PM Narendra Modi specifically emphasised the key role of the ASEAN, saying,

"The ten countries of South East Asia connect the two great oceans in both the geographical and civilisational sense. Inclusiveness, openness and ASEAN centrality and unity, therefore, lie at the heart of the new Indo-Pacific."

The ASEAN acknowledges this. As Thailand's top diplomat in change of ASEAN affairs said in April 2019:

"India's approach converges with that of ASEAN. For instance, India was the first of the quad members to have emphasised on ASEAN centrality and we would like to thank India for the same."

Notwithstanding India-ASEAN strategic convergence, collectively, the ASEAN initially tended to disassociate itself with the 'Indo-Pacific' conceptualisation. In 2019, however, the ASEAN leaders began to see that the 'Indo-Pacific' vision was not only becoming essential to meet their collective interests, but also consonant and complementary to India's position. The 34th ASEAN Summit held at Bangkok in June 2019 culminated in adoption of a crucial document: "ASEAN Outlook on the Indo-Pacific" (AOIP).9 Based on the traditional principles of ASEAN – notably, norm-building, dialogue and inclusivity – the AOIP builds a perspective and provides a narrative on how ASEAN should be driving the region in the midst of global uncertainty and major powers' rivalry, mainly referring to China and the US. The AOIP does not take sides between major powers, which conforms to India's own conceptualisation, of the Indo-Pacific being neither a club of limited members, nor a (military-) strategy directed against any country. 10 Notably, Indonesia played a key role in the ASEAN's acceptance of the 'Indo-Pacific' conceptualisation. The AOIP's formative draft circulated by Jakarta during the 51st ASEAN Foreign Ministers Meeting in August 2018 at Singapore also carried plans on issues like connectivity, sustainable development, navigational safety and mitigating natural disasters. 11 Whereas the final AOIP did not carry the mention of such specific multilateral issues, regional cooperation on maritime security and safety would emerge as the frontrunners as and when the more pressing issue of geopolitical competition among major powers (mainly, China and the US) is managed by the Indo-Pacific countries.

The rationale for regional maritime security cooperation also needs to be contextualised with the expanding scope of the concept of (holistic) maritime security encompassing issues like maritime crime, human safety at sea, freedom of navigation, governance of sea areas beyond national jurisdiction, climate change, and the preservation of marine environment. These are essentially transnational issues necessitating inter-state cooperation. However, it is also necessary to avoid being trapped in a preconceived belief that India-ASEAN maritime security partnership is preordained.

In the aforesaid context, this chapter aims to undertake a realistic and fact-based examination of the potential for cooperation between India and the ASEAN countries on issues of holistic maritime security, which includes maritime safety and good order, and also negotiating between the complex issue of major-power maritime rivalry in the region. Hypothetically considering the India-ASEAN interface as a 'system', the analysis is based on the proven Strengths-Weaknesses-Opportunities-Threats (SWOT) model. For logical and a more comprehensible analyses, the examination is undertaken by reordering the sequence of the four analytical parameters to Threats (and challenges), Weaknesses (and vulnerabilities), Strengths and Opportunities.

3. Threats

India and the ASEAN countries encounter very similar non-traditional security challenges like terrorism with maritime linkages; maritime crimes like piracy and armed robberies at sea, and seaborne smuggling and trafficking of drugs, weapons, people, organs, cultural property and wildlife; marine oil spills and illegal fishing.

In the Southeast Asia, the terrorist group *Jemaah Islamiyah* is suppressed, but still dormant and may seek to exploit the active separatist movements such as in Thailand and the Philippines.¹² While India's similar concerns lie predominantly in its western maritime theatre that led to the Mumbai terrorist attack of November 2008,¹³ it cannot ignore its eastern maritime theatre.

Piracy and armed robberies at sea has been rampant in India's maritime east, and incidents in the Malacca Straits became serious in the early years of the previous decade. This led to jostling among major powers to 'patrol' the Straits, with attendant geopolitical concerns in Indonesia and Malaysia, since much of its waters are the latter's Territorial Seas. Although such insecurities have now reduced substantially, hijackings of small coastal vessels are increasing.¹⁴

The ASEAN countries are also plagued by the drug-trafficking networks that use India as one of its conduits. The issue of human-smuggling—and particularly the Rohingya issue—is a complex issue, not only for Thailand, Malaysia and Indonesia, but also for India. The hijackings and the various forms of sea-borne trafficking are all transnational crimes, organised and syndicated.¹⁵ These crimes impact in many ways ranging from loss of lives, property and State revenue, to the adversities to commercial businesses due to rise in insurance premiums and enhanced investment on security.

Illegal fishing has serious impact not only in terms of the loss of revenue, but also leading to irreversible damage to the marine ecosystem. The illegal trade of detonators across the ASEAN countries are used for fish bombing (dynamite fishing) in many Southeast Asian countries. Estimates indicate that 56 per cent of the sub-region's coral reefs are at risk from such fishing methods. The coral waters of India's Andaman and Nicobar (A&N) Islands too have fragile marine eco-systems, and offer extremely lucrative areas for illegal fishing and poaching to fishermen from China, Taiwan, Indonesia, Thailand and Myanmar. Although destructive fishing techniques have not yet impacted the A&N Islands, India has resolved to prevent this.

The increasing activities of China's distant fishing fleet represent a major insecurity for both India and many ASEAN countries. In June 2019, ten Chinese fishing vessels were apprehended off India's western coast, when these came close to the coast to seek emergency shelter from Cyclone *Vayu*. An inspection of the catch revealed a huge stock of fish endemic to the Indian waters. The real possibility of these vessels being engaged in State-sponsored intelligence-gathering is of much concern to India. Chinese fishing activity in the Western Pacific has more direct security ramifications owing to the outstanding maritime disputes. The fishing vessels here are more overtly supported by the State. For instance, in March 2016, the Chinese fishing trawler *Kway Fey 10078* was intercepted by Indonesian Fisheries patrol boat for illegal fishing within Indonesia's Exclusive Economic Zone (EEZ) off Natuna Islands. While the Chinese trawler was being towed by the Indonesian patrol boat, a Chinese Coast Guard (CCG) vessel rammed into the trawler to prevent its seizure, and a bigger CCG ship then secured the trawler's release through coercion.¹⁹

Unlike the developed West, most countries in the Indo-Pacific continue to be beset by military insecurities. India and the ASEAN countries are no exceptions, and need to factor such traditional threats in their respective maritime-security calculi. However, India has traditionally resisted 'collective security' agreements (military alliances). Therefore, a collective-security arrangement between India and the ASEAN countries may not be conceivable. Nonetheless, India could collaborate with the ASEAN countries for maritime-military capability enhancement (including capacity-building), which is also essential for conventional deterrence, and thereby to maintain a stable balance of power in the Indo-Pacific region.

In the context of China, a more exigent insecurity for India and ASEAN stems from the possible disruption of the established regional maritime order codified in the various international treaties, particularly the *United Nations Convention on the Law of the Sea*, 1982 (UNCLOS). This new threat has begun to emerge in the Indo-Pacific region as a "neo-traditional threat". China's continued reinforcement of its

"historic" maritime sovereignty claims within the so-called "nine-dash line" represents a major challenge to the UNCLOS. Beijing seems to be developing a new narrative on the premise is that the UNCLOS is based on the erstwhile 'western' legal system - and is, therefore, an unfair imposition upon "Asian values". This was the essence of the talk by a Chinese speaker at the 6th International Maritime Security Conference held in May 2019 at Singapore. As a Conference participant, the author interjected: "India too represents "Asian values", but upholds the Law (UNCLOS). It accepted the adverse verdict of the international court against Bangladesh."20 The reference was to the 2014 Permanent Court of Arbitration (PCA) verdict in the Bay of Bengal maritime boundary arbitration (Bangladesh versus India).²¹ This stands in stark contrast to China's rebuttal of the 2016 PCA verdict in the South China Sea arbitration (China versus the Philippines), which ruled against any legal basis for China's historic "nine-dash line" claim.²² Notably, alike India, China is a signatory to the UNCLOS and has also ratified the treaty in June 1996. China's historic "nine-dash line" was never consonant with the UNCLOS, but Beijing did not voice its opposition to the UNCLOS until 2019. Clearly, China is now 'powerful' enough to be able to oppose the fundamental tenets of international maritime law (codified in UNCLOS), which helped it to use the seas to attain prosperity in the earlier decades while it was a 'weak' developing nation. China claims to be a proponent of freedom of navigation. However, its warships issue warnings to foreign naval vessels entering international waters within the "nine-dash" line, wherein the UNCLOS bestows high sea freedoms. In July 2011, the Indian warship Airavat received such a warning over radio when it was transiting through Vietnam's EEZ.23 It also debars the transit of foreign naval vessels through the Taiwan Straits – a 100 nautical mile wide international waterway – claiming it to be its sovereign waters. ²⁴ All this reinforces the seriousness of the emerging 'neo-traditional' insecurity in the Indo-Pacific region.

Since a couple of decades ago, China has been using its growing comprehensive power to influence the behaviour of the countries in the Indo-Pacific region and beyond. It began with building Chinese nodes of influence across the Asian rimland, which has been widely reported since 2005 as China's "String of Pearls" strategy. Since 2013, China has been building geopolitical influence through its "21st Century Maritime Silk Road (MSR)", as a component of its Belt and Road Initiative (BRI). China's BRI has always been a major security challenge for India, and its adverse security implications for ASEAN as only beginning to emerge. Reports since early 2019 indicate that in the guise of tourism projects under the BRI, China may be building a naval base in Cambodia. This would enable it to project hard military power into the SCS to reinforce its 9-dash line and island claims against the ASEAN countries.

Another set of insecurities emanate from the spurt in maritime activity in the Indo-Pacific region, relating to fishing, oil and gas, tourism and travel, including overseas air travel. This is leading to the increasing likelihood of incidents and accidents at sea. The disappearance of the Malaysian airliner MH-370 in 2014 over the maritime space of the Indo-Pacific is case in point. Also, the spaces adjoining India and ASEAN – Bay of Bengal, Andaman Sea and Western Pacific – are more susceptible to natural disasters. Tropical cyclones occur in the Bay of Bengal as frequently as twice a year. The Indian Ocean Tsunami of December 2004 caused by the underwater earthquake is a manifestation of seismic fault-lines in the area. The Western Pacific is also threatened by regular typhoons, as exemplified by Typhoon *Hayian* that hit the Philippines in 2013.

Another facet of safety at sea pertains to the rescue of submarines in distress. The number of submarine-operating navies in the Indo-Pacific region is growing rapidly. India, Indonesia and Singapore have been operating submarines for many years, and are now upgrading their force-levels. Malaysia, Thailand and Vietnam have recently inducted these boats, and Myanmar and the Philippines are likely to commission these in the near future.²⁸ According to *Military Balance 2019*, 228 submarines are presently operating in the East and South China Seas, and this number is likely to rise to 300 within a decade. This has led to proposals for water-space management and even an underwater code of conduct.²⁹ These proposals are unlikely to fructify owing to the sensitivities involved in sharing the information on such stealth

platforms. Nonetheless, it is imperative for the regional countries and stakeholders to acknowledge the increasing possibility of submarine accidents, and the risk to the submarine crews.

4. Weaknesses and Vulnerabilities

As Asian countries, India and the ASEAN belong to the part of the world which was colonised by major powers, and later remained the developing "Third World" for long. As a result, unlike the developed West, most of these countries had limited resources and capacity to regulate human activity, even on their sovereign land territory. When the UNCLOS came into force in 1994, these countries were allowed to extend their jurisdictions over the adjoining seas up to the 200 nautical-mile EEZ, but lacked adequate capacity to enforce national laws and maintain good order in their extensive maritime zones. Although some ASEAN countries have since attained impressive economic growth and development, the capacity deficit continues to be a major constraint for maritime law enforcement. Captain Martin Sebastian of Malaysia points out some specific functional challenges to counter maritime crime, as being "reduced budgets for law-enforcement, reducing attractiveness of recruitment in law enforcement agencies, aging and declining policing assets, low conviction rates and high costs of surveillance, reconnaissance and intelligence." ³⁰

Professor Geoffrey Till lists four functional utilities of the maritime domain. Beside transportation, resources and dominion, the sea is also a medium for communications.³¹ The UN General Assembly Resolution adopted on 23 December 2016 recognised the fact that "fibre-optic submarine cables transmit most of the world's data and communications... are vitally important to the global economy and the national security of all States (and) are susceptible to intentional and accidental damage from shipping and other activities..."32 This is particularly relevant in the India-ASEAN context, wherein the undersea internet traffic among countries is a *sine qua non* of their increasing communications and commercial transactions. Notably, on 10 August 2020, the Indian Prime Minister inaugurated a 2,300 km submarine optical fibre cable between Chennai and Port Blair (A&N Islands) for enabling fifth-generation connectivity. This is being widely seen as the first step towards providing the ASEAN countries an alternative to China to gain international connectivity.33 However, the high density of these undersea cables stretching eastwards from India are highly vulnerable to terrorism, armed conflicts, and also to the bottom fishing methods specific to Southeast Asia (as mentioned earlier). The insecurity is aggravated by the fact that the relevant provisions of international law are archaic and inadequate³⁴ to address the risks to the cables in areas beyond national jurisdiction. Furthermore, all undersea cables are owned by private corporations/ companies, who need support from governments. The advances in Information and Communication Technology (ICT) have also ushered in cyber-space vulnerabilities for the increasing maritime activities, particularly sea-borne commerce and travel.

Another weakness pertains to international maritime conventions. Many regional countries have not acceded to the Maritime Search and Rescue (SAR) Convention, 1979. Evidently, in the maritime-configured Indo-Pacific, even human safety at sea cannot be de-linked from geopolitics. Major powers will not miss an opportunity to project power and influence upon smaller regional countries — and even intervene militarily — through apparently benign missions, such as SAR and Humanitarian Assistance and Disaster Relief (HADR). This explains why countries are hesitant to ratify the 1979 Convention, despite maritime SAR being an altruistic international commitment of nations since the RMS *Titanic* Disaster of 1912. Except India, Indonesia, Singapore and Vietnam, the other ASEAN countries are not party to the 1979 Convention.³⁵ As a result, the boundaries between SAR areas of responsibility remain unclear.

With regard to the UNCLOS, India and the ASEAN countries have varying interpretations of its key provisions such as freedom of navigation and overflight. More specifically, for instance, for Innocent Passage of foreign warships through the Territorial Seas, Thailand places no restrictions, whereas India, Indonesia and Malaysia seek prior notification. On the other extreme, Myanmar and Vietnam seek prior

authorisation or permission for the same. On the issue of foreign military activities in the EEZ, India and all ASEAN countries maintain the same position that their consent should be taken before conduct of such activities in their EEZ. However, the US and Australia assert that no such consent is necessary. Such disparities in interpretation of the Law also provide an alibi to China to exploit the fault-lines in the prevailing international maritime law codified in the UNCLOS.

A major vulnerability of ASEAN countries—and also India, to some extent—is their growing asymmetry with China in terms of maritime-military power. This is increasing military insecurities to India and ASEAN due to China's growing ability for escalation-dominance, and the reduced effectiveness of the formers' conventional deterrence. Furthermore, the increasing capability divide is increasing Beijing's ability to use coercive strategies against India and ASEAN, at least in the Western Pacific, if not yet in the Indian Ocean. More specifically, the ASEAN navies—with the exception of Singapore³⁶—do not possess the capabilities commensurate to their growing responsibilities. Indonesia's *Global Maritime Fulcrum* (GMF) vision necessitates a long-term 'green-water' navy. However, capacity-building constraints are compelling Jakarta to adopt the 2024 *Minimum Essential Force* (MEF) blueprint as an interim measure.³⁷ The navies of Vietnam and the Philippines fall far short of defending their maritime-strategic interests in the South China Sea.³⁸ Whereas the ASEAN countries are increasingly buying submarines to deter China, none of these—except Singapore—possess a submarine rescue capability.

A notable challenge to India-ASEAN maritime security cooperation is the multiplicity of authorities charged with maritime policy-formulation. This pertains to both ASEAN and India in different ways. Each of the ten sovereign nations within the ASEAN is affected by unique conditions and imperatives, thereby limiting New Delhi's choices to few common areas for cooperation in a multilateral format.

On the other hand, it may also be a challenge for the ASEAN countries to collaborate with India, which comprises many geographically dispersed coastal provincial states with varied conditions and maritime interests, leading to their respective provincial governments being guided by diverse imperatives. Even at the level of India's national government, a multitude of ministries and departments are functionally linked to maritime security, directly or otherwise, leading to a major challenge of coordination amongst these. This has led to the recent realisation in India to institute a national maritime authority for coordinating policies relating to the affairs of the sea.

5. Strengths

The current prevalence of the 'Indo-Pacific' concept — signifying the increasing security linkage between the two oceans — creates a relevant geopolitical backdrop to India-ASEAN maritime security cooperation. Whereas the contemporary avatar of 'Indo-Pacific' is essentially meant to incorporate India in the geopolitical affairs of the Asia-Pacific, ASEAN lies in the geographic heart of the 'Indo-Pacific' region.

Within the Indo-Pacific region, India and the ASEAN sub-region have a predominantly maritime configuration; and lately, all these countries are increasingly realising the need to focus on the ocean realm to meet their common national objective of the economic, material and societal well-being of their citizens. Since 2015, India's political direction and foreign policy has also acquired a strongly 'maritime' undertone. In March 2015, while commissioning the Indian-built coast guard ship Barracuda in Port Louis, Mauritius, the Indian Prime Minister enunciated his vision of SAGAR, which means 'Ocean' in Hindi language and is also an acronym for *Security and Growth for All in the Region*.³⁹ This is a notable departure from India's traditional mindset stemming from the ancient Hindu culture, wherein overseas travel was proscribed since crossing the "*Kala Pani*" (Black Waters) to foreign lands was thought to cause the loss of one's caste that endowed social respectability.

India's foreign policy shift from 'Look East' to 'Act East' in signifies a more proactive eastward orientation, and also enlarges the scope of the policy from geo-economics to security issues. Soon after unveiling its Act East Policy at the 12th ASEAN-India Summit in 2014,⁴⁰ in 2015, India established a diplomatic mission to ASEAN based in Jakarta.⁴¹ For its 69th Republic Day celebrations in January 2018 in New Delhi, India invited all ten ASEAN apex leaders.⁴² These are emphatic indicators of India's policy reorientation to eastwards.

With the exception of Myanmar, the strategic attention of ASEAN countries is likely to remain focused in the Western Pacific. Nonetheless, ASEAN ought to look westwards towards India, at least collectively. An analyst has suggested: "As geopolitical power expands from the Asia Pacific to the Indo-Pacific, policy-makers in ASEAN should pay closer attention to the Bay of Bengal region, it being the most geographically proximate section of the IOR (Indian Ocean Region) to the ASEAN."43 Notably, India's maritime zones off its A&N Islands is contiguous with those of its three ASEAN neighbours (Myanmar, Thailand and Indonesia). India conducts coordinated naval patrols bilaterally with all these countries; with Indonesia since 2002⁴⁴, with Thailand since 2005⁴⁵, and with Myanmar since 2013.⁴⁶ This enables India and its eastern ASEAN neighbours, not only to regulate fishing activities in their maritime zones, but also to counter other maritime crimes like trafficking of drugs, weapons and humans. Notably, the southern tip of India's A&N Island chain overlooks the key maritime choke-point (6-degree channel) that, effectively, is also the north-west entrance of the strategic Malacca Straits. This also makes India a 'funnel State' of the Malacca Strait, if not a 'Strait littoral'. These geographical realities translate into major strengths for India and ASEAN, enhancing the potential for maritime-security cooperation. Notably, in response to the heightened risk of piracy and armed robbery in the Malacca Straits, in 2002, the Indian Navy undertook escort missions for the US high-value ships in the Straits.⁴⁷ In 2006, India played an important role along with Singapore and Japan in establishing the Information Sharing Centre (ISC) under the Regional Cooperation Agreement on Combating Piracy and Armed Robbery against ships in Asia (ReCAAP) finalised in 2004.48

Developments in India in the past half-decade - such as the shift from passive to active deterrence⁴⁹ against Pakistan and the increasing firmness in its China-policy – indicate that the present government in New Delhi is likely to use its defence forces – including its Navy - optimally as an instrument of foreign policy, besides bolstering their capabilities for deterrence.⁵⁰

India's *Maritime Security Strategy* released in 2015 articulates the areas of its maritime interest. The primary areas of interest broadly cover the northern Indian Ocean, whereas the secondary areas correspond to the Western Pacific.⁵¹ Both envelop the ASEAN countries and their vital areas completely, thereby highlighting and accentuating India-ASEAN strategic convergence. The Indian Navy is a potent and a battle-indoctrinated navy, comparable to the best in the world. Its three-dimensional capabilities and force levels are built around a 'balanced fleet' with a pan Indo-Pacific reach and adequate combat power to meet its envisaged roles, objectives, missions and tasks in its areas of interest.⁵² It has amply demonstrated its effectiveness during a multitude of contingencies ranging from armed conflicts at sea to humanitarian disaster response in the wake of the Indian Ocean Tsunami (2004),⁵³ and from assisting the government of Maldives to tide over a coup attempt (1988)⁵⁴ to undertaking escort missions for US high value ships in the Malacca Straits (2002).⁵⁵

Hydrographic survey is a notable strength of the Navy, inherited from one of the British from India's pre-independence days. ⁵⁶ Such capability—comprising eight ocean-going survey ships and intensive training facilities at the National Institute of Hydrography (NIH), Goa—is necessary for not only for safe navigation but also to scientific research and exploration of seabed resources. India had undertaken hydrographic surveys for Kenya, Mauritius, Mozambique, Maldives, Oman, Seychelles, Sri Lanka and Tanzania. ⁵⁷

Alike the RSN, the Indian Navy has also acquired a submarine rescue facility becoming the 11th country in the world to possess such capability. The 3rd generation submarine rescue system was inducted in December 2018.⁵⁸ The Indian Coast Guard (ICG) is a major maritime security force to complement the Navy in its constabulary and benign roles, besides being the nodal authority for maritime SAR and marine pollution response.

In response to the Mumbai terrorist of November 2008, India bolstered its coastal security apparatus *inter alia* through enhanced national MDA measures. These include the establishment of the *Integrated Management and Analyses Centre* (IMAC) in November 2014⁵⁹, which was upgraded to the Information Fusion Centre for Indian Ocean Region (IFC-IOR) in December 2018,⁶⁰ and is supplemented by 'White Shipping' information-sharing agreements with the countries and stakeholders of the Indo-Pacific region. The government has approved such agreements with 36 countries, of which, 21 have been signed.⁶¹ These include three from ASEAN (Myanmar, Singapore and Vietnam).

The ASEAN countries have their respective strengths. Singapore has a potent navy, backed by a highly evolved technological base. Most ASEAN countries now have dedicated maritime law-enforcement forces to enable the respective navies to focus on their more crucial missions in military and diplomatic roles. A little more than a decade ago, many ASEAN navies⁶² began bolstering their capabilities for amphibious operations. This trend was largely necessitated by the need to assert their maritime claims upon insular territories occupied by them in South China Sea, and more broadly for providing their navies more balanced capabilities, including for benign missions. Since 2007, Indonesia became one of the few countries in the world to operate a dedicated hospital ship for peace-time employment. In January 2019, it inducted its second hospital ship.⁶³

In response to the heightened maritime insecurities in the first decade of the 21st Century, *inter alia* from terrorism⁶⁴, ship hijackings, accidents and disasters, the ASEAN has streamlined its Maritime Domain Awareness (MDA) apparatus, which also caters for disaster response. The central MDA nodes are the Information Fusion Centre (IFC) established in 2009⁶⁵ and the Changi Regional HADR Coordination Centre (RHCC) established in 2014,⁶⁶ both located at Singapore, in the same complex. The RHCC is also involved in submarine rescue.

The relatively smaller territorial stretch of most ASEAN countries, and consequentially, their more compact and better-integrated policy-making apparatuses also translate into strength. Furthermore, to minimise the challenges of inter-State coordination within ASEAN, the ASEAN countries have designated *National Maritime Security (Single) Points-of-Contact* (NMSPoC) at the national level for coordinating maritime law-enforcement and maritime safety functions, such as information-exchange.⁶⁷ The notable examples are as follows:

- Brunei: National Maritime Coordination Centre (NMCC), established in 2010 under Prime Minister's Office.
- Indonesia: Maritime Security Agency BAKAMLA (Badan Kemananan Laut), established in 2014, which reports directly to the President through the coordinating Ministry for Political, Legal, and Security Affairs.
- The Philippines: National Coast Watch Center (NCWC), established in 2011.
- **Singapore**: National Maritime Security System (NMSS), established in 2011, is a whole-of-government framework for monitoring of maritime security threats and the coordination of operational responses.
- Thailand: Maritime Enforcement Coordination Center (MECC) established in 1997, involving coordination among the navy and other government departments relating to marine resources, marine policing, etc.

6. Opportunities

The India-ASEAN system is rather privileged by the number of substantive opportunities, including in the form of drivers, which could be capitalised upon. The foremost of these constitute the shared maritime interests. The seas constitute the primary medium for inter-state economic interactions, at least in terms of merchandise trade. India-ASEAN trade in goods has witnessed a major spurt since the launch of India's Look East policy in 1991, and particularly since the implementation of the India-ASEAN FTA in January 2010. India's overall trade with ASEAN increased from a mere US\$ 7.13 billion in 2000 to US\$ 81.3 billion in 2017-18.68 With 644 million population and combined GDP of US\$ 2.7 trillion economy, ASEAN together is the third largest economy in the world after the US and China. As much as 25 per cent of India's total merchandise trade transits the Malacca Straits and South China Sea.69 India and ASEAN, therefore, have convergent maritime interests *inter alia* for developing maritime-economic connectivity for trade, tourism and travel, besides good order and a benign environment at sea, the sustainable development of marine resources — both living and non-living, and both renewable and non-renewable — and the preservation of the maritime environment. This leads to the shared imperatives to adhere to the established legal order for maritime governance and activities at sea, including through the provisions of UNCLOS, 1982.

The concept of Blue Economy — linked to Sustainable Development Goal (SDG) 14 pertaining to the health of the oceans — is an emerging imperatives for maritime nations, and presents a good opportunity for India and ASEAN to collaborate, particularly considering that the maritime zones of India and ASEAN countries in the Bay of Bengal and Andaman Sea are contiguous, as mentioned earlier.

As also mentioned earlier, the increasing usage of ICT enhances the vulnerability of maritime activities and undersea communications. However, if these vulnerabilities are addressed effectively, as Captain Martin Sebastian of the *Maritime Institute of Malaysia* (MIMA) asserts, "the 'digital age' provides new opportunities for regional cooperation in coastal and ocean governance, and a particularly valuable tool for exchange of TECHINT (technical intelligence) to combat maritime crime".⁷⁰

Since 'security' is a sensitive area, maritime security collaboration comes only with trust and positive perceptions. In this context, a shared historical narrative that extends to the erstwhile millennia represents another important opportunity. The civilisational links between India and the ASEAN countries are rooted in mutually-beneficial sea-borne trade, cultural exchanges and even sharing of ideas on statecraft and governance, and are devoid of animosities and bad memories. On the contrary, ASEAN countries recall the positive role that India played in the process of decolonisation of the Afro-Asian countries post the Second World War, and its benign struggle for national consolidation. India and ASEAN countries have no outstanding territorial dispute. As early as in the 1970s, India and its eastern ASEAN neighbours (Thailand and Indonesia) delimited their maritime (continental shelf) boundaries though formal agreements. Consequent to the UNCLOS, 1982 coming into force in 1994, in 2017, India and Indonesia began delimit the boundary based on the EEZ. In the India-Indonesia joint statement issued in May 2018, the Indian PM Narendra Modi and Indonesian President Joko Widodo "reaffirmed their continued support to the Technical Meetings and instructed the technical team to expedite the negotiations".⁷²

According to a UN study, half of the world's coastal States have no hydrographic capability, and another 25 per cent have only limited capabilities. Only the remaining 25 per cent including India have adequate hydrographic capabilities. In Asia and Africa, 36 per cent and 64 per cent of the waters respectively are yet to be surveyed systematically. The National Institute of Hydrography (NIH) at Goa is classified as the Regional Hydrographic Training Centre for Africa, Persian Gulf and South East Asia. This leads to immense potential for India-ASEAN cooperation in hydrography, India and all ASEAN members are State parties to the UNCLOS. (The only outlier since long, Cambodia, ratified the treaty in December 2019). This confers upon these countries a responsibility, and also provides them a voice in upholding the established tenets of law for a stable maritime order. This could be capitalised upon

towards applying calibrated pressures upon China to uphold the established international legal order to preserve freedom of navigation in the Indo-Pacific region.

The regional and sub-regional organisations in the Indo-Pacific provide valuable opportunities for India and ASEAN to collaborate in the multilateral formats such as the *ASEAN Defence Ministers' Meeting-Plus* (ADMM-Plus) established in 2010 and the *Expanded ASEAN Maritime Forum* (EAMF) established in 2012. India has been an active participant in the ADMM-Plus activities involving maritime security, counter-terrorism, disaster relief, military medicine and peace-keeping. The combined naval exercises under ADMM Plus have reinforced the interoperability that the Indian Navy has developed with the ASEAN navies through bilateral exercises. Under the EAMF, India and ASEAN have been cooperating on SAR and to prevent and manage accidents/incidents at sea.⁷⁵ Furthermore, India and four of the ASEAN countries (Thailand, Indonesia, Malaysia and Singapore) are members of the *Indian Ocean Rim Association* (IORA), wherein 'Maritime Safety and Security' was incorporated in organisation's agenda relatively recently in 2014 owing to the efforts of India (as the IORA Chair) in 2011. India and two of the ASEAN countries (Myanmar and Thailand) are members of the *Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation* (BIMSTEC). Notably, ASEAN is looked up to in the IOR as a good model for economic development, and thus, ASEAN views wield much weight in national policy-making in India and other IOR countries.

For India, it is highly opportune that the ASEAN countries optimise the employment of their military forces - particularly their navies - for defence diplomacy. This approach has evolved over the years in response to certain factors. A generic one is the realisation of the enlarging role of the defence forces to preserve security in its holistic sense—not confined to military security—which involves trans-national issues wrought by intensifying globalisation. A more specific factor is the emerging onus upon the ASEAN to play a greater role in shaping the regional security environment. Furthermore, ASEAN's policy of open and inclusive regionalism led to defence engagements beyond ASEAN, as exemplified by the creation of the ADMM- Plus and the EAMF.

Between India and the ASEAN countries, there is a high degree of doctrinal commonality in terms engagements under the concept of 'defence diplomacy'. The key ones are Constructive Maritime Engagement (CME), Maritime Assistance and Support and Military Technical Assistance. These encompass inter alia foreign port visits, combined naval exercises (to achieve operational compatibility), capability enhancement (including training exchanges and hardware capacity building), maritime security assistance⁷⁶ and a mutual naval logistics agreement signed with Singapore in June 2018.⁷⁷ Such engagements between India and individual ASEAN countries, however, have not yet been optimised, even in case of Singapore and Vietnam, with whom India enjoys the closest of strategic and defence relations in the world. India and Singapore have been conducting naval exercises since 1993, resulting in much value to both sides, and Singapore has benefited much from learning about submarine operations and the use of Indian defence facilities for military training and weapon-testing.⁷⁸ However, India has not yet been able to derive commensurate capacity-building advantage from Singapore in terms of naval technology that it possesses. Notably, pursuant to the bilateral Defence Cooperation Agreement (DCA) signed in 2003, India and Singapore had established a Defence Technology Steering Committee in October 2006.⁷⁹ In case of Vietnam, whereas India has been providing capability enhancement assistance to the Vietnam Navy inter alia in terms of submarine training and critical Soviet-origin equipment spareparts, not much progress has been made by the two navies in terms of developing inter-operability for coordinated operations, including in terms of a maritime logistics agreement.

Since 2008, the Royal Singapore Navy (RSN) has possessed a sea-based submarine rescue capability housed onboard the MV *Swift Rescue*, a submarine support and rescue ship.⁸⁰ In comparison, the Indian Navy's recently acquired third generation submarine-rescue capability is shore-based (alike the US system), which provides the option for its distant air-transportation via the long-range IL-76 aircraft.

This provides India the ability to provide air-borne submarine rescue cover across the Indo-Pacific region within 72 hours of the occurrence of the disaster, making this a valuable supplement to MV *Swift Rescue*.⁸¹

Soon after the Indian Ocean *Tsunami* of December 2004, India realised the need for large amphibious sealift platforms for a more balance maritime-security strategy, including for meeting its international obligations as an emerging major maritime power. In 2007, therefore, alike many other the Southeast Asian navies, the Indian Navy inducted the former US Landing Platform Dock (LPD) USS *Trenton* as it first major amphibious ship of this type—which is now INS *Jalashwa*⁸²—and four more new LPDs have been ordered.⁸³ This leads to an opportunity to develop inter-operability for undertaking benign naval missions like maritime disaster response and evacuation of civilians. Although India does not operate any hospital ship, since 2006, its naval doctors have been embarking the US hospital ship USNS *Mercy* for regional medical missions.⁸⁴

India presents credible capability-enhancement opportunities to the ASEAN navies and coast-guards, particularly in terms of high standards of training and doctrine development. Even in the domain of capacity-building, the Indian defence-industry offers cost-effective options for import of select hardware. For instance, Myanmar has been inducting India's indigenous lightweight torpedoes and sonars. ⁸⁵ In 2015, India began exporting patrol vessels, with Mauritius being the first destination. ⁸⁶ These vessels constructed in Indian shipyards are not be of the top-notch world standards, but are affordable. Reports indicate that "Indian defence sector sees good opportunities for exports to the Southeast Asian (and some West Asian) countries where slower economic growths have put budgetary pressure on acquiring viable, cost-effective and reliable solutions." Accordingly, many of these regional countries are seeking to purchase the *BrahMos* missile, which began as an India-Russia joint venture, and is now being spearheaded by India's *Larsen & Toubro Ltd* (L&T Defence).

7. The Way Ahead

For an effective and fruitful India-ASEAN maritime security cooperation, the foremost imperative for India lies in introspection. India needs to institute a national maritime policy designating an authority at the apex level *inter alia* to better coordinate maritime (including security) cooperation with friendly countries. In the interim, alike the ASEAN countries, India would need to designate a *National Maritime Security Point-of-Contact* (NMSPoC) at the national level to coordinate India-ASEAN maritime security cooperation, including for intelligence-based operations against maritime terrorism and crime. The Indian NMSPoC cannot be either the Navy or Coast Guard alone, but must have a suitable representation from both these agencies.

While India engages with ASEAN collectively on maritime security issues in a multilateral format (ASEAN-India), India should concurrently pursue such cooperation bilaterally with individual ASEAN countries based on specific strategic convergences, and for equity of dividends for both sides. The latter is exemplified by the case of Singapore and Vietnam, as mentioned earlier.

Considering that MDA is *sine qua non* of maritime security, India and the ASEAN countries need to share 'White Shipping' information in their common areas of interest. This is also essential for monitoring the Chinese maritime activities such as those of its distant fishing fleets. Considering that the ASEAN countries are well-disposed to enter into such agreements with India, more such agreements need to be signed (beyond Myanmar, Singapore and Vietnam), particularly with Brunei, Indonesia, Malaysia, the Philippines and Thailand. In addition, India and Singapore may consider linking-up India's IFC-IOR and IFC, Singapore towards attaining seamless MDA across the Indo-Pacific region.

The 2016 UNGA Resolution (mentioned earlier) encourages "greater dialogue and cooperation among States... (on) ... protection and maintenance of fibre-optic submarine cables (and) to promote the security of such critical global communications infrastructure...".88 Accordingly, India and ASEAN

should deliberate upon suitable collaborative measures to ensure security of the underwater cables. This is not only imperative for maintaining the integrity of commercial transactions and other forms of cyber communication amongst themselves, but also an international obligation to protect infrastructure in the global maritime common as a public good.

While collaborating with ASEAN on maritime security at multilateral fora, India should make best efforts to incorporate Myanmar as a member of the IORA. It should also propose and pursue the case for incorporating Indonesia as a member of the BIMSTEC.

India and the ASEAN countries need to deliberate a common interpretation of UNCLOS with regard to its key provisions on freedom of navigation, such as the innocent passage of foreign warships through the Territorial Seas and foreign military activities in the EEZ. Also, alike the Philippines, the other ASEAN countries whose maritime zone claims overlap with China's "nine-dash line"—Brunei, Indonesia, Malaysia and Vietnam—need to be encouraged to refer the issue for international arbitration under Annex VII of UNCLOS to increase the geopolitical pressures upon Beijing, and the same needs to be supported by India. Whereas ASEAN may be making all efforts to persuade Cambodia against providing a military base to China, given India's historic links with Cambodia, New Delhi's persuasion may be helpful. In any case, this would demonstrate India's commitment to a proactive role under its 'Act East' policy.

Whereas the hydrographic surveys are necessary for navigational safety and exploitation of marine resources, these also have pure military applications, particularly for submarine operations. India would, therefore, be a preferred benign partner for the ASEAN countries that do not have the capability to prepare hydrographic charts, and also assist them in developing such capabilities.

Although some ASEAN countries have not ratified key maritime conventions, most adversities arising there from can be overcome through bilateral arrangements between India and the individual ASEAN countries. For instance, the SAR Convention 1979 provides for countries to enter into SAR MoUs to tide over the prevailing ambiguities in SAR areas of responsibility and foster functional SAR cooperation. India should propose the same to its two ASEAN maritime neighbours—Myanmar and Thailand—who are not party to the Convention.

To ensure a stable regional balance of power, based on its strength areas, India needs to offer capability-enhancement (including hardware capacity-building) to the ASEAN maritime forces. It would also need to collaborate with the major maritime powers like the United States, Japan and Australia towards capacity-building of the ASEAN maritime security forces to reduce power asymmetries vis-à-vis China.

India needs to induct hospital-ships and air-ambulances. In the interim, India and ASEAN countries may undertake combined medical missions in the Indo-Pacific region aboard Indonesian hospital-ships. The two would also need to explore the avenues of undertaking joint ventures for construction of hospital ships, besides patrol vessels and amphibious platforms.

India needs to propose to the ASEAN countries an agreement for rescue of submarines in distress using the system being operated by the Indian Navy, even as a supplement to the agreement that these may have entered into with Singapore. This needs to be preceded by demonstrating India's capabilities on suitable occasions like defence exhibitions and fleet reviews. Thereafter, India would need to conduct periodic submarine rescue exercises with Singapore and other submarine-operating ASEAN countries to develop inter-operability. It would be particularly necessary for India to conduct regular exercises with Singapore to validate the cross-utilisation of various components of respective submarine rescue systems.

8. Recommendations for India

- Work with ASEAN under the Indo-Pacific Concept to enable a benign maritime environment in the region, including applying persuasive and dissuasive pressures upon China to abandon its assertiveness and conform with the established international order.
- Encourage ASEAN countries to seek and secure their interests in the Bay of Bengal, with an attendant expansion of their areas of maritime interest into the Indian Ocean.
- Intelligence sharing with ASEAN countries against terrorism, piracy and other maritime crimes like trafficking of drugs, weapons and humans, and illegal fishing, with emphasis on technical intelligence.
- Indian Navy and Indian Coast Guard need to be prepared to respond to any contingencies involving maritime safety and security, including marine environment disasters, in India's maritime east, particularly in the choke-points like the Malacca Straits.
- Induct hospital ships and air ambulances. In the interim, undertake India-ASEAN combined maritime medical missions in the Indo-Pacific region aboard Indonesian hospital-ships.
- Alike India-Singapore agreement, enter into standing naval logistics agreements with key ASEAN countries like Indonesia and Vietnam.
- Collaborate with ASEAN on information-sharing through all possible avenues like white-shipping
 agreements and data-linking IMAC/ IFC-IOR with ASEAN nodal centres towards building
 comprehensive Maritime Domain Awareness (MDA) in the entire Indo-Pacific maritime space. India
 needs to enter into white-shipping agreements with Brunei, Indonesia, Malaysia, the Philippines and
 Thailand, in addition to the existing ones with Myanmar, Singapore and Vietnam.
- Forge standing agreement(s) with the ASEAN countries of Bay of Bengal for security of fibre-optic submarine cables in case of disruptions due to any reason like terrorism, theft or accident.
- Explore complementaries for defence industry and technology collaboration for capacity-building
 of maritime security forces. In particular, India needs to benefit from the technological advances
 achieved by Singapore in terms of naval systems. Additionally, joint ventures may be explored with
 ASEAN countries to build patrol ships, amphibious vessels and hospital ships.
- Encourage ASEAN countries in the Bay of Bengal to ratify Maritime Search and Rescue (SAR) Convention, 1979. In the interim, or as an alternative, SAR MoUs may be signed with the countries for quick and effective to contingencies involving human safety at sea.
- Offer Indian Navy's advanced hydrographic capabilities to the ASEAN countries for navigational safety of vessels plying in their waters, particularly in restricted waters like maritime choke-points.
 The ASEAN navies may also be assisted to develop their own hydrographic capabilities.
- Offer Indian Navy's new-generation submarine rescue facilities to the ASEAN navies operating submarines to supplement/ complement the facilities available with the Royal Singapore Navy (RSN). A standing agreement for the same may be proposed to the ASEAN navies.
- Work with ASEAN navies to develop a Code for Unplanned Encounters at Sea (CUES) for the Indian Ocean Naval Symposium (IONS) similar to the one instituted Western Pacific Naval Symposium (WPNS).
- Arrive at a common understanding of the interpretation of UNCLOS with regard to two of its key provisions on freedom of navigation, viz. innocent passage of foreign warships through the Territorial Sea and foreign military activities in the Exclusive Economic Zone (EEZ).
- Early agreement needs to be reached with Indonesia on the outstanding issues relating to India-Indonesia maritime boundary based on EEZ delimitation.
- Encourage and support Brunei, Indonesia, Malaysia and Vietnam to refer their maritime disputes in the South China Sea to international arbitration under Annex VII of UNCLOS, alike the Philippines. This will also increase the geopolitical pressures upon Beijing to temper its assertiveness.

- Dissuade Cambodia to permit China to make use of its territory for military-strategic purpose.
- Collaborate and formulate common positions on converging interests prior multilateral forum meetings of the ARF, IORA, BIMSTEC, ADMM+, EAMF, CSCAP, etc.
- Make all efforts to incorporate Myanmar as a member of the IORA.
- Propose and pursue the case for incorporating Indonesia as a member of the BIMSTEC.
- Institute a National Maritime Authority (NMA) to coordinate the functioning of the multifarious government departments and agencies functionally linked to the maritime domain, including overseeing India-ASEAN maritime security cooperation. A single Point-of-Contact (PoC) needs to be designated at the national level for the same, and the ASEAN countries intimated.

9. Conclusions

Since its formation in 1967, the ASEAN has provided the binding and stabilising force to maritime-Asia, and beyond. Hence, not merely 'ASEAN inclusivity', but 'ASEAN centrality' is *sine qua non* for India's 'Indo-Pacific' vision. As PM Narendra Modi remarked at the 2018 Shangri La Dialogue:

"I see ASEAN as an example and inspiration. ASEAN represents the greatest level of diversity of culture, religion, language, governance and prosperity of any grouping in the world. It was born when Southeast Asia was a frontline of global competition, a theatre of a brutal war and a region of uncertain nations. Yet, today, ASEAN has united ten countries behind a common purpose. ASEAN unity is essential for a stable future for this region." 89

Given their increasing conceptual consonance on the Indo-Pacific vision, New Delhi could be a valuable partner for ASEAN to meet the common objectives of regional security. The Indo-Pacific is a predominantly maritime-configured region. Therefore, in a more comprehensive sense, such security would encompass a wide spectrum of imperatives, including preventing maritime crime and use of the sea by terrorists, assuring human safety at sea and in the littorals, ensuring the adherence of regional states and extra-regional stakeholders to the established norms of conduct as stipulated in the prevailing maritime legal order, and maintaining a stable regional balance of power.

In this context, as specifically analysed in the preceding sections of this chapter, notwithstanding the challenges, there emerges immense untapped potential for India to collaborate with the ASEAN—both as a group and as individual countries—and the same have been proposed as the way ahead for consideration by policy-makers on both sides. The analysis has factored the threats and weaknesses (and vulnerabilities), as well as the strengths and opportunities, and the recommendations have emerged from the analytical effort to minimise the effects of the former, while optimising the dividends of the latter. Considering that the analysis is based on open-source inputs, the recommendations may need to be re-oriented and refined based on more precise official inputs.

[At the time of writing, Captain (Dr.) Gurpreet S Khurana, Indian Navy, was the Executive Director of the *National Maritime Foundation* (NMF), New Delhi. The views expressed here are his own and do not represent those of the Indian Navy or the NMF. Usual Disclaimers apply.]

Endnotes

- The Indo-Pacific concept originally encompassed the Indian Ocean and the Western Pacific Ocean, and this essay retains this geographical scope of the Indo-Pacific region. See Khurana (2019a).
- 2. The term Indo-Pacific has been used since the 1920s in the geo-economic or other contexts. See Khurana (2019a).
- Refer, Germany Europe Asia: Shaping the 21st Century Together, Policy guidelines for the Indo-Pacific region, The Federal Government Germany (2020).

- 4. Refer, PM's Keynote Address at Shangri La Dialogue, PIB (2018).
- 5. Refer, India-ASEAN Relations. MEA (2018a).
- Refer, Opening Statement by PM at Plenary Session of India-ASEAN Commemorative Summit, MEA (2012)
- 7. Refer, PM's Keynote Address at Shangri La Dialogue, PIB (2018).
- 8. Address by H.E. Dr. Suriya Chindawongse, Director-General, Department of ASEAN Affairs, Ministry of Foreign Affairs of Thailand, Seminar on ASEAN Indo-Pacific Outlook and India, Research and Information System for Developing Countries (RIS), New Delhi, 10 April 2019.
- 9. Refer, Tobing, D. H. and Barreto, V. (2019).
- 10. Refer, PM's Keynote Address at Shangri La Dialogue, PIB (2018).
- 11. Refer, Tobing, D. H. and Barreto, V. (2019).
- 12. Refer, Bunbongkarn (2018).
- 13. Refer, The National News (2009).
- 14. Refer, Umar (2015), AINTT (2015).
- 15. Refer, Bunbongkarn (2018).
- 16. Refer, South China Morning Post (2003).
- 17. Refer, Smailes (unpublished).
- 18. Refer, Indian Express (2019).
- 19. Refer, Halim, Lubis and Ribka (2016).
- 20. Refer, Shichen (2019).
- 21. Refer, Bay of Bengal Maritime Boundary Arbitration between Bangladesh and India (Bangladesh v. India) under Annex VII to the UNCLOS, PCA (2014).
- 22. Refer, The South China Sea Arbitration (The Republic of the Philippines v. The People's Republic of China), PCA (2016).
- 23. Refer, Incident involving INS Airavat in South China Sea, MEA (2011).
- 24. Refer, Voice of America (2019) and The Economist (2019).
- The phrase 'String of Pearls' was first used in a 2005 report by Booz-Allen-Hamilton, 'Energy Futures in Asia' prepared for US Defense Secretary. Refer, Space War (2005) and Khurana (2008a).
- 26. Refer, Khurana (2019b).
- 27. Refer, South China Morning Post (2019).
- 28. Refer, Haan (2019).
- 29. Refer, Lu (2019).
- E-mail interview with Captain Sebastian Martin, Royal Malaysian Navy (Retired), Centre Head/ Senior Fellow, Centre for Maritime Security and Diplomacy, Maritime Institute of Malaysia (MIMA), 17 Jun 2019.
- 31. Refer, Till (2004).
- 32. Refer, Resolution adopted by the General Assembly on 23 December 2016, UN (2017).
- 33. Refer, Bharadwaj (2020).
- The physical protection of undersea telecommunications cables beyond the territorial waters is governed by the old Convention on the Protection of Submarine Telegraph Cables, 1884 and various articles of UNCLOS, notably, Articles 87 and 113-115.
- International Convention on M-SAR, 1979. The Titanic sank on her maiden voyage in the North Atlantic in April 1912. More than 1,500 passengers and crew died. In response to the proposal made by the United Kingdom, 13 countries participated in the conference that led to the adoption of the International Convention of the Safety of Life at Sea in January 1914.
- 36. Refer, Collin (2012).

- 37. Ibid.
- 38. Refer, McDevitt (2016).
- 39. Refer, PM's remarks on the Commissioning of Coast Ship Barracuda, PMO (2015).
- 40. Refer, Chairman's statement of the 12th ASEAN-India Summit in Nay Pyi Taw, MEA (2014).
- ^{41.} Refer, The Jakarta Post (2015).
- 42. Refer, ASEAN Secretariat News (2018).
- 43. Refer, Gamage (2017).
- 44. Refer, CORPAT India-Indonesia Coordinated Patrol, Indian Navy (2016a).
- 45. Refer, CORPAT India-Indonesia Coordinated Patrol Indian Navy (2016b).
- 46. Refer, Indo-Myanmar Coordinated Patrol (IMCOR) and Signing of Standard Operating Procedure (SOP), Ministry of Defence (2016).
- 47. Refer, People's Daily Online (2002).
- ^{48.} Refer, ICG co-hosts 12th ReCAAP ISC capacity building workshop in capital from June 19, Ministry of Defence (2019).
- 49. For the conceptual difference between 'active' and 'passive' deterrence, see Khurana (2015).
- 50. Refer, Krishnan (2019).
- 51. Refer, Ministry of Defence (Navy) (2015a).
- 52. Refer, Ministry of Defence (Navy) (2015b).
- 53. Refer, Khurana (2008b).
- 54. Refer TOI (2018b).
- 55. Refer, Zee News (2002).
- 56. Refer, Sigh (1986).
- 57. National Hydrographic Office (NHO), India, website, at http://www.hydrobharat.nic.in/views/international_cooperation.php
- 58. Refer, Ocean News (2018) and James Fisher and Sons (2019).
- 59. Refer, Raksha Mantri Shri Manohar Parrikar Inaugurates IMAC, Indian Navy (2014).
- 60. Refer, Raksha Mantri Inaugurates Information Fusion Centre Indian Ocean Region (IFC-IOR), Ministry of Defence (2017b).
- 61. Refer, The New Indian Express (2018).
- 62. Refer, Collin (2012).
- 63. Refer, Antara News (2019).
- Refer, Speech by Senior Minister of State for Defence Dr Mohamad Maliki Bin Osman at the 10th Anniversary Commemoration of the Information Fusion Centre, MINDEF (2019a).
- 65. Refer, Fact Sheet on Information Fusion Centre (IFC) and Launch of IFC's Real-Time Information-Sharing System (IRIS), MINDEF (2019b).
- 66. Refer, Fact Sheet: Changi Regional HADR Coordination Centre (RHCC), MINDEF (2017).
- 67. The establishment of NMSPoC has been an agenda for the ASEAN Regional Forum (ARF) since 2016. Captain Martin A. Sebastian, Royal Malaysian Navy (Retired), Presentation delivered at the 2019 Dongsha Conference, Kaoshiung, Taiwan, 14 Jun 19.
- 68. Direction of Trade Statistics (DOTS), IMF and Department of Commerce (Government of India).
- 69. Refer, TOI (2018).
- 70. Captain Martin A. Sebastian, Royal Malaysian Navy (Retired) Presentation delivered at the 2019 Dongsha Conference, Kaohsiung, Taiwan, 14 Jun 19.

- 71. Refer, Ghoshal (2016).
- 72. Refer, Indonesia Joint Statement during visit of Prime Minister to Indonesia. MEA (2018b).
- 73. See http://www.hydrobharat.nic.in/views/international_cooperation.php
- 74. Refer, Dara (2019).
- 75. Refer, Singh (2018).
- 76. Refer, Indian Maritime Doctrine, Ministry of Defence (Navy) (2015b) Indian Maritime Doctrine 2009 (Naval Strategic Publication 1.1), updated online version 2015, Integrated Headquarters, Ministry of Defence (Navy) 2015, pp.108-114.
- 77. Refer, The Statesman (2018).
- 78. Refer, Sakhuja et al. (2015).
- 79. Refer, Joint statement by Smt. Nirmala Sitharaman, Minister of Defence of the Republic of India and Dr Ng Eng Hen, Minister for Defence of the Republic of Singapore, Ministry of Defence (2017a).
- 80. Refer, ST Marine Launches RSN Submarine Support and Rescue Ship, Singapore Ministry of Defence (2008).
- 81. Refer, Financial Express (2019).
- Refer, Rajghatta (2007) Also see, Khurana (2006).
- 83. Refer, Economic Times (2018).
- 84. Refer, Singh (2006).
- 85. Refer, Business Standard (2017).
- 86. Refer, The Economic Times (2014).
- 87. Refer, The Economic Times (2015).
- 88. Refer, Resolution adopted by the General Assembly on 23 December 2016, UN (2017).
- 89. Refer, PM's Keynote Address at Shangri La Dialogue, PIB (2018).

References

- Antara News. 2019. PT PAL hands over hospital ship to Indonesian Navy. *Antara News*, 21 January 2019. Available at: https://en.antaranews.com/news/121937/pt-pal-hands-over-hospital-ship-to-indonesian-navy
- ASEAN. 2014. Chairman's statement of the 12th ASEAN-India Summit in Nay Pyi Taw, Myanmar, Ministry of External Affairs, Government of India, Press Release, 12 November 2014. Available at: https://mea.gov.in/bilateral-documents.htm?dtl/24243/Chairmans_statement_of_the_12th_ASEANIndia_Summit_in_Nay_Pyi_Taw_Myanmar
- ASEAN Secretariat News. 2018. Leaders of ASEAN as Chief Guests witness the 69th Republic Day Parade at Rajpath in conjunction with the ASEAN-India Commemorative Summit 2018. ASEAN Secretariat News, 26 January 2018. Available at: https://asean.org/leaders-of-asean-as-chief-guests-witness-the-69th-republic-day-parade-at-rajpath-in-conjunction-with-the-asean-india-commemorative-summit-2018/
- Bharadwaj, D. 2020. Andaman optical fiber may pitch India as alternative to China in ASEAN region. *Hindustan Times*, 11 August 2020. Available at: https://www.hindustantimes.com/india-news/india-inaugurates-optical-fibre-project-to-provide-international-connectivity-to-asean-nations/story-ANoK30ADYbfaP4xPZuDx7J.html
- Bunbongkarn, S. 2018. Non-Traditional Security Threats: Challenges to ASEAN. *Proceedings of the 4th Roundtable on the ASEAN-India Network of Think-Tanks (AINTT)*, ASEAN-India Centre, Research and Information System for developing Nations. New Delhi, 2018.
- Business Standard. 2017. DRDO-developed torpedo to be exported to Myanmar. *Business Standard*, 24 March 2017. Available at: https://www.business-standard.com/article/pti-stories/drdo-developed-torpedo-to-be-exported-to-myanmar-117032401237_1.html
- Collin, K. S. L. 2012. Seeking Balance: Force Projection, Confidence Building, and the Republic of Singapore Navy. *Naval War College Review*, Winter 2012, Vol. 65, No. 1, pp.75–92.

- —— 2014. Southeast Asia's Emerging Amphibious Forces. *The Diplomat*, 17 October 2014. Available at: https://thediplomat.com/2014/10/southeast-asias-emerging-amphibious-forces/
- —— 2015. What Next for the Indonesian Navy? Challenges and Prospects for Attaining the Minimum Essential Force by 2024. Contemporary Southeast Asia, Vol. 37, No. 3 (2015), pp. 432–62.
- Dara, M. 2019. National Assembly approves UN Convention on Sea Law. *The Phnom Penh Post*, 24 December 2019. Available at: https://www.phnompenhpost.com/national/national-assembly-approves-un-convention-sealaw
- Financial Express. 2019. How Indian Navy has emerged as a regional submarine rescue provider in Indian Ocean Region. *Financial Express*, 05 June 2019, at https://www.financialexpress.com/defence/how-indian-navy-has-emerged-as-a-regional-submarine-rescue-provider-in-indian-ocean-region/1598708/
- Gamage, R. 2017. Bay of Bengal: What Implications for ASEAN. In Sam Bateman, Rajni Gamage and Jane Chan (eds.), ASEAN and the Indian Ocean: Key Maritime Links, RSIS Monograph No. 33, July 2017, pp.62-73
- Ghoshal, B. 2016. Talk at Delhi Dialogue VIII. Institute for Defence Studies and Analyses (IDSA), New Delhi, 19 February. Available at https://www.youtube.com/watch?v=sZimWzOBNYw
- Haan, J. d. 2019. What Will More Submarines Mean for South-East Asia? Future Directions International, 27 February 2019. Available at: http://www.futuredirections.org.au/publication/what-will-more-submarines-mean-for-south-east-asia/
- Halim, H., Lubis. A. M. and Ribka. S. 2016. RI confronts China on fishing. *The Jakarta Post*, 21 March 2016. Available at: https://www.thejakartapost.com/news/2016/03/21/ri-confronts-china-fishing.html
- Indian Express. 2019. Fishermen cry foul as Chinese trawlers 'milk' Indian seas. *Indian Express*, 27 June 2019. Available at: http://www.newindianexpress.com/states/kerala/2019/jun/27/fishermen-cry-foul-as-chinese-trawlers-milk-indian-seas-1995919.html
- Indian Navy. 2014. Raksha Mantri Shri Manohar Parrikar Inaugurates IMAC, a Navy-CG Joint Operations Centre. Indian Navy. Available at: https://www.indiannavy.nic.in/content/raksha-mantri-shri-manohar-parrikar-inaugurates-imac-navy-cg-joint-operations-centre
- —— 2016a. CORPAT India-Indonesia Coordinated Patrol. Indian Navy, 06 April 2016. Available at: https://www.indiannavy.nic.in/content/corpat-india-indonesia-coordinated-patrol
- —— 2016b. Indo-Thai Coordinated Patrol (CORPAT). Indian Navy. 26 February 2016. Available at: https://www.indiannavy.nic.in/content/corpat-india-indonesia-coordinated-patrol
- James Fisher and Sons. 2019. JFD successfully completes third generation submarine rescue system trials for the Indian Navy. James Fisher and Sons, 10 May 2019, at https://www.youtube.com/watch?v=cZAvzmpt9kE
- Khurana, G. S. 2006. *The Indian Navy's Amphibious Leap: 'With A Little Help From America'*. IDSA Comment, 03 April 2006. Available at: https://idsa.in/idsastrategiccomments/TheIndianNavysAmphibiousLeap_GSKhurana_030406
- 2008a. China's 'String of Pearls' in the Indian Ocean and Its Security Implications. *Strategic Analysis*, Vol. 32(1), 2008, pp.1-39. Available at: https://idsa.in/strategicanalysis/ChinasStringofPearlsintheIndianOceanandItsSecurityImplications_gskhurana_0108
- 2008b. Maritime Forces in Pursuit of National Security: Policy Imperatives for India. Shipra Publications, New Delhi, p.59. Available at: https://books.google.co.in/books/about/Maritime_Forces_in_Pursuit_of_National_S. html?id=3JPfAAAAMAAJ&redir_esc=y
- 2015. India Needs Sea-based 'Active' Deterrence against Pakistan-Sponsored Terrorism. Web-publication of NMF, New Delhi, 25 March 2015. Available at: http://www.maritimeindia.org/View%20Profile/637013398932004374. pdf
- 2019a. What is the Indo-Pacific? The New Geopolitics of the Asia-Centred Rim Land. In Axel Berkofski and Sergio Miracola (eds.) *Geopolitics by Other Means. The Indo-Pacific Reality*, ISPI, Ledizioni Ledi Publishing, Milano, Italy, pp. 13-32. Available at: https://www.ispionline.it/en/pubblicazione/geopolitics-other-means-indo-pacific-reality-22122

- —— 2019b. India as a Challenge to China's Belt and Road Initiative. *Asia Policy*, Vol 14(2), April 2019, pp. 27-33. Available at: https://www.nbr.org/wp-content/uploads/pdfs/publications/asiapolicy14-2_where_the_belt_meets_the_road_rt_apr2019.pdf
- Krishnan, R. 2019. Election Result 2019: Why Modi 2.0 will make India a stronger military power. *Business Today*, 23 May 2019. Available at: https://www.businesstoday.in/opinion/columns/pm-modi-re-election-india-military-power-russia-china-pakistan-lok-sabha-election-2019/story/349442.html
- Lu, Z. 2019. US and China's underwater rivalry fuels calls for submarine code of conduct to cut risk of accidents. South China Morning Post, 21 March 2019. Available at: https://www.scmp.com/news/china/military/article/3002736/us-and-chinas-underwater-rivalry-fuels-calls-submarine-code
- MEA. 2011. Incident involving INS Airavat in South China Sea. Ministry of External Affairs (MEA). Government of India. Press Release, 01 September 2011. Available at: https://www.mea.gov.in/media-briefings.htm?dtl/3040
- 2012. Opening Statement by Prime Minister at Plenary Session of India-ASEAN Commemorative Summit, Ministry of External Affairs (Government of India) Press Release, 20 December 2012. Available at: https://mea.gov.in/Speeches-Statements.htm?dtl/20981/Opening+Statement+by+Prime+Minister+at+Plenary+Session+of+IndiaASEAN+Commemorative+Summit
- 2014. Chairman's statement of the 12th ASEAN-India Summit in Nay Pyi Taw, Myanmar, Ministry of External Affairs, Government of India, Press Release, 12 November 2014. Available at: https://mea.gov.in/bilateral-documents.htm?dtl/24243/Chairmans_statement_of_the_12th_ASEANIndia_Summit_in_Nay_Pyi_Taw_Myanmar
- —— 2018a. India-ASEAN Relations. Ministry of External Affairs. Government of India, August 2018. Available at: https://mea.gov.in/aseanindia/20-years.htm
- 2018b. Indonesia Joint Statement during visit of Prime Minister to Indonesia. Ministry of External Affairs, Government of India, Press Release, 30 May 2018. Available at: https://www.mea.gov.in/bilateral-documents. htm?dtl/29932/IndiaIndonesia+Joint+Statement+during+visit+of+Prime+Minister+to+Indonesia+M ay+30+2018
- McDevitt, M. 2016. Small Navies in Asia: The Strategic Rationale for Growth. In Michael Mulqueen, Deborah Sanders and Ian Speller (eds.), *Small Navies: Strategy and Policy for Small Navies in War and Peace*, Routledge, London, pp. 88-90.
- MINDEF. 2017. Fact Sheet: Changi Regional HADR Coordination Centre (RHCC). Ministry of Defence (MINDEF) Singapore, 06 December 2017. Available at: https://www.mindef.gov.sg/web/portal/mindef/news-and-events/latest-releases/article-detail/2017/december/06dec17_fs
- 2019a. Speech by Senior Minister of State for Defence Dr Mohamad Maliki Bin Osman at the 10th Anniversary Commemoration of the Information Fusion Centre. Ministry of Defence (MINDEF) Singapore, 14 May 2019. Available at https://www.mindef.gov.sg/web/portal/mindef/news-and-events/latest-releases/article-detail/2019/may/14may19_speech2
- 2019b. Fact Sheet on Information Fusion Centre (IFC) and Launch of IFC's Real-Time Information-Sharing System (IRIS). Ministry of Defence (MINDEF) Singapore, 14 May 2019. Available at: https://www.mindef.gov.sg/web/portal/mindef/news-and-events/latest-releases/article-detail/2019/May/14may19_fs
- Ministry of Defence (Navy). 2015a. Ensuring Secure Seas: Indian Maritime Security Strategy, Indian Navy. Naval Strategic Publication 1.2, Integrated Headquarters, Ministry of Defence (Navy), October 2015, pp. 34–35.
- —— 2015b. Indian Maritime Doctrine 2009. Naval Strategic Publication 1.1 (updated online version 2015), Integrated Headquarters, Ministry of Defence (Navy), 2015, p.8.
- —— 2016. Indo-Myanmar Coordinated Patrol (IMCOR) and Signing of Standard Operating Procedure (SOP). Ministry of Defence, Government of India, Press Release, 18 February 2016. Available at: http://pib.nic.in/newsite/PrintRelease.aspx?relid=136531
- 2017a. Joint statement by Smt. Nirmala Sitharaman, Minister of Defence of the Republic of India and Dr Ng Eng Hen, Minister for Defence of the Republic of Singapore. Ministry of Defence, Government of India) Press Release, 29 November 2017. Available at: http://pib.gov.in/newsite/PrintRelease.aspx?relid=173945

- 2017b. Raksha Mantri Inaugurates Information Fusion Centre Indian Ocean Region (IFC-IOR). Ministry of Defence (Government of India) Press Release, 22 December 2018. Available at: http://pib.nic.in/newsite/PrintRelease.aspx?relid=186757
- 2019. ICG co-hosts 12th ReCAAP ISC capacity building workshop in capital from June 19. Ministry of Defence, Government of India, Press Release, 18 June 2019. Available at: http://pib.gov.in/newsite/PrintRelease. aspx?relid=190507
- Ocean News. 2018. JFD Delivers the 2nd of Two Third Generation Submarine Rescue Systems. *Ocean News and Technology*, 19 December 2018. Available at: https://www.oceannews.com/news/defense/jfd-delivers-the-2nd-of-two-third-generation-submarine-rescue-systems
- PCA. 2014. Bay of Bengal Maritime Boundary Arbitration between Bangladesh and India (Bangladesh v. India) under Annex VII to the UNCLOS. Permanent Court of Arbitration (PCA), 08 July 2014. Available at: https://pca-cpa.org/en/news/bay-of-bengal-maritime-boundary-arbitration-between-bangladesh-and-india-bangladesh-v-india/
- 2016. PCA Press Release: The South China Sea Arbitration (The Republic of the Philippines v. The People's Republic of China). Permanent Court of Arbitration (PCA), 12 July 2016. Available at: https://pca-cpa.org/en/news/pca-press-release-the-south-china-sea-arbitration-the-republic-of-the-philippines-v-the-peoples-republic-of-china/
- Peoples' Daily Online. 2002. Indian Warships Undertake Escort Operation in Malacca Straits. *Peoples' Daily Online*, 17 July 2002. Available at: http://en.people.cn/200207/17/eng20020717_99852.shtml
- PIB. 2018. Prime Minister's Keynote Address at Shangri La Dialogue, *Press Information Bureau (PIB)*, Government of India, Prime Minister's Office, 01 June 2018. Available at: at http://pib.nic.in/newsite/PrintRelease.aspx?relid=179711
- PMO. 2015. PM's remarks on the Commissioning of Coast Ship Barracuda. Prime Minister's Office (PMO). 12 March 2015. Available at: https://www.pmindia.gov.in/en/news_updates/text-of-the-pms-remarks-on-the-commissioning-of-coast-ship-barracuda/
- Rajghatta, C. 2007. USS Trenton is now INS Jalashva. Times of India, 19 January 2007. Available at: https://timesofindia.indiatimes.com/world/us/USS-Trenton-is-now-INS/articleshow/1287538.cms?
- Sakhuja, V. and Khurana. G. 2015. India-Singapore Defence Cooperation: Exploring Strategic and Functional Compatibilities. In Anit Mukerjee (ed.), The Merlion and the Ashoka: Singapore-India Strategic Ties, World Scientific Publishing Company/ RSIS, Singapore., pp. 63-85. Available at: https://doi.org/10.1142/9789814704670_0005
- Shichen, T. 2019. Presented in the International Maritime Security Conference, 2019 (IMSC-2019). Available at: https://www.youtube.com/watch?v=hTESVrQMGFc&feature=youtu.be
- Singapore Ministry of Defence. 2008. ST Marine Launches RSN Submarine Support and Rescue Ship. Singapore Ministry of Defence, 09 December 2008. Available at: http://www.defense-aerospace.com/articles-view/release/3/100475/st-marine-launches-rsn-sub-support-and-rescue-ship.html
- Singh, R. 2006. Women officers sail into history. *Hindustan Times*, 06 September 2006. Available at: https://www.hindustantimes.com/india/women-officers-sail-into-history/story-yOUinmumuei2o1q4VYLq8I.html
- Singh, S. 1986. Under Two Ensigns: The Indian Navy 1945-1950. Oxford and IBH Publishing, New Delhi: 1986, Chapter 10.
- Singh, U. B. 2018. Significance of India's Act East Policy and Engagement with ASEAN. IDSA Commentary, 04 December 2018. Available at: https://idsa.in/backgrounder/significance-india-act-east-policy-and-engagement-with-asean-ubsingh_041218
- Smailes, A. (unpublished). High Price of Dynamite Fishing. People & Planet.
- South China Morning Post. 2003. Bug to hit dynamite fishing. *South China Morning Post*, 12 January 2003. Available at: https://www.scmp.com/article/403219/bug-hit-dynamite-fishing

- 2019. Chinese warships dock in Cambodia amid rumours Beijing is building a new naval base there. *South China Morning Post*, 09 January 2019. Available at: https://www.scmp.com/news/asia/southeast-asia/article/2181391/chinese-warships-dock-cambodia-amid-rumours-beijing
- Space War. 2005. String of Pearls Military Plan to Protect China's Oil: US Report', Space War, January 18, 2005. Available at: http://www.spacewar.com/2005/050118111727.edxbwxn8.html
- The Economic Times. 2014. CGS Barracuda: First Indian warship exported to Mauritius. *The Economic Times*, 21 December 2014. Available at: https://economictimes.indiatimes.com/nation-world/cgs-barracuda-first-indian-warship-exported-to-mauritius/slideshow/45590323.cms
- 2015. India set to export first batch of missiles to South East Asian, Gulf countries: Official. *The Economic Times*, 15 May 2019. Available at: https://m.economictimes.com/news/defence/india-set-to-export-first-batch-of-missiles-to-south-east-asian-gulf-countries-official/articleshow/69339847.cms
- 2018. Government gives green signal to mega naval project worth over Rs 20,000 crore. The Economic Times, 11 July 2018. Available at: https://economictimes.indiatimes.com/news/defence/government-gives-green-signal-to-mega-naval-project-worth-over-rs-20000-crore/articleshow/58775978.cms?from=mdr
- 2019. China bristles at Western naval transits through the Taiwan Strait. The Economist, 09 May 2019. Available at: https://www.economist.com/china/2019/05/09/china-bristles-at-western-naval-transits-through-the-taiwan-strait
- The Federal Government, Germany. 2020. Germany Europe Asia: Shaping the 21st Century Together, Policy guidelines for the Indo-Pacific region. The Federal Government, Republic of Germany, 01 September 2020. Available at: https://www.auswaertiges-amt.de/blob/2380514/35e5c739e1c9a5c52b6469cfd1ffc72d/200901-indo-pazifik-leitlinien--1--data.pdf
- The Jakarta Post. 2015. India to officially begin diplomatic mission to ASEAN. *The Jakarta Post*, 15 April 2015. Available at: https://www.thejakartapost.com/news/2015/04/15/india-officially-begin-diplomatic-mission-asean.html
- The National News. 2009. Pakistan admits Mumbai terror link. *The National News*, 12 February 2009. Available at: https://www.thenational.ae/world/mena/pakistan-admits-mumbai-terror-link-1.537744
- The New Indian Express. 2018. India starts centre to share maritime traffic updates. The New Indian Express, 23 December 2018. Available at: http://www.newindianexpress.com/thesundaystandard/2018/dec/23/india-starts-centre-to-share-maritime-traffic-updates-1915429.html
- The Statesman. 2018. India-Singapore sign eight MoUs, including crucial naval logistics agreement. *The Statesman*, 01 June 2018. Available at: https://www.thestatesman.com/india/india-singapore-sign-eight-mous-including-crucial-naval-logistics-agreement-1502643261.html
- Till, G. 2004. Sea power: A Guide for the Twenty-First Century. Routledge, London, pp.7.
- Tobing, D. H. and Barreto, V. 2019. Decoding the Indo-Pacific Outlook. *Bangkok Post*, 28 June 2019. Available at https://www.bangkokpost.com/opinion/opinion/1703344/decoding-the-indo-pacific-outlook
- TOI. 2018a. Indo-ASEAN trade rises 10% to \$72bn in FY17, but is long way off potential. *Times of India* (TOI), 26 January 2018, Available at: https://timesofindia.indiatimes.com/business/india-business/indo-asean-trade-rises-10-to-72bn-in-fy17-but-is-long-way-off-potential/articleshow/62657555.cms
- —— 2018b. Operation Cactus: How Indian troops went to Maldives and helped quell a coup *Times of India* (TOI), 07 Feb 2018. Available at https://timesofindia.indiatimes.com/world/south-asia/operation-cactus-how-indian-troops-went-to-maldives-and-helped-quell-a-coup/articleshow/62816787.cms?
- Umar, S. N. 2015. Paper on Non-Traditional Threats presented at 4th *ASEAN-India Network of Think Tanks* (AINTT), 7-8 August 2015, Kuala Lumpur.
- UN. 2017. Resolution adopted by the General Assembly on 23 December 2016 (Oceans and the law of the sea, A/RES/71/25). United Nation (UN), 20 February 2017. Available at: https://www.un.org/en/development/edsa/population/migration/generalassembly/docs/globalcompact/A_RES_71_257.pdf
- Voice of America. 2019. In Rare Move, French Warship Sails Through Taiwan Strait. *Voice of America*, 25 April 2019. Available at: https://www.voanews.com/east-asia/rare-move-french-warship-sails-through-taiwan-strait and
- Zee News. 2002. "INS Sharda" returns after "Operation Sagittarius". Zee News, 15 July 2002. Available at: https://zeenews.india.com/home/ins-sharda-returns-after-operation-sagittarius_49448.html

14

Indo-Pacific Cooperation: AOIP and IPOI

1. Introduction

he Indo-Pacific has been gaining new geopolitical construct over the last few years. There is also a growing consensus in understanding the geographical scope and economic and strategic approaches towards Indo-Pacific. It is a multipolar region, contributing more than half of the world's GDP and population. The Indo-Pacific is the lifeline of the entire world; one-third of the world's flow of trade and energy passes through this region. The motivation for a larger bloc always comes from the sheer size, the resources it owns, and, the scope and size of the economies of scale that it can generate.

The Indo-Pacific obtained renewed vibrancy when ASEAN, in June 2019, and India, in November 2019, came out with their respective Indo-Pacific visions, namely, the ASEAN Outlook on Indo-Pacific (AOIP), and, the Indo-Pacific Oceans Initiative (IPOI), respectively. Figure 1 illustrates countries within and outside the region that have introduced Indo-Pacific Visions, with ASEAN being encouraged to take centre stage due to its already-established regional structures such as the ASEAN Regional Forum (ARF) and the East Asia Summit (EAS).

Given the foregoing, this chapter reviews the perspectives of Indo-Pacific that are shared by different countries and discusses the key elements of the IPOI and the AOIP, as also ensuing areas of cooperation, where ASEAN and India can work together for the integration of the region.

2. Rising Strength of Indo-Pacific

The Indo-Pacific is a multipolar region, whose geographical coverage encompasses a number of countries in the Indian Ocean and the Pacific Ocean. The coverage of the Indo-Pacific includes as many 43 countries from Southeast Asia, South Asia, Africa, the Pacific, West Asia, Latin America and North America, and France. As a region, the Indo-Pacific contributes more than half of the world's GDP and population and has huge natural resources and potential for new economic opportunities (see Table 1). On the flip side, the heterogeneity of the Indo-Pacific region in terms of economic development generates a variety of challenges in the economic, political and security domains.

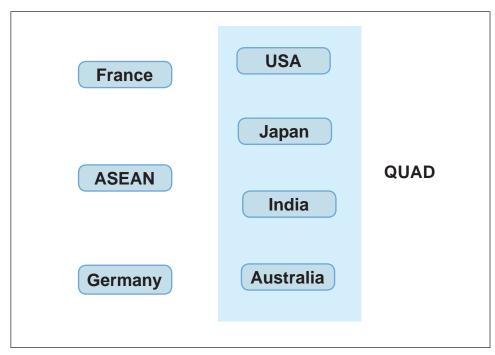


Figure 1: Indo-Pacific Visions Issued by Countries*

Note: As on October 2020.

Source: Authors.

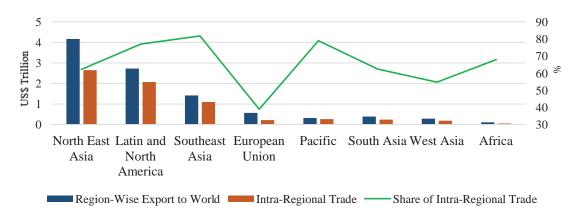
Table 1: Major Indicators of Indo-Pacific, 2019

Indicators	Indo-Pacific	Share in World (%)
Land area (million sq. km)	74.23	58.29
Population (billion)	5.24	68.28
GDP (current US\$ trillion)	60.19	68.63
Export in Goods (US\$ trillion)	11.76	47.43
Import in Goods (US\$ trillion)	11.98	49.27
Total Trade in Goods (US\$ trillion)	23.74	48.27
Intra-Regional Trade (US\$ trillion)	6.81	69.65

Notes: ASEAN: Brunei Darussalam, Cambodia, Lao PDR, Myanmar, Malaysia, Indonesia, Singapore, Thailand, Vietnam, the Philippines; South Asia: India, Sri Lanka, Pakistan, Bangladesh, Maldives; Latin America: Colombia, Chile, Ecuador, Peru; North America: Canada, Mexico, United States; North-East Asia: China, Japan, South Korea, Russian Federation; Pacific: Australia, New Zealand, Papua New Guinea, Fiji; West Asia: Iran, Islamic Rep., United Arab Emirates, Yemen, Rep., Oman; Africa: Kenya, Somalia, Tanzania, Madagascar, Mozambique, South Africa, Mauritius, Comoros, Seychelles; European Union: France.

Source: De and Kumarasamy (2020) based on World Development Indicators, World Bank.

Figure 2: Intra-Regional Merchandise Trade in Indo-Pacific Subregions, 2019



Note: Refer, Table 1 note for details.

Source: Calculated by authors based on DOTS, IMF Database.

Table 2: Indo-Pacific Developments



• October - The term "Indo-Pacific" appears for the first time officially in the White Paper published by **Australia**

2013

• May - Defence White Paper of Australia mentioned the Strategy Outlook of stable Indo-Pacific

2015

 October - The document Ensuring Secure Seas: Indian Maritime Security Strategy referred the term "Indo-Pacific"



 February - Defence White Paper of Australia menioned the Strategic Outlook of stable Indo-Pacific region and a rules-based global order

 August - Shinzo Abe declares his "Free and Open Indo-Pacific Strategy" to be the core of Japan's foreign policy doctrine.



- •Novemebr At the APEC Summit in Hanoi, U.S. President calls the "Free and Open Indo-Pacific" the focul point of U.S. Asia Policy
- November Foreign Policy White Paper of **Australia** dedicates a chapter on "A stable and prosperious Indo-Pacific"
- December The National Security Strategy of the **United States** dedicates a special section to the "Free and Open Indo-Pacific" under strategy in the regional context



- •May French President Macron speaks about a French strategy for the Indo-Pacific
- June Indian Prime Minister Narendra Modi presents his country's "Free, Open, Prosperous and Inclusive Indo-Pacific" concept in his speech at the IISS Shagri-La Dialogue in Singapore.
- September **Japan** from now on calls the "Free and Open Indo-Pacific" a "vision" rather than a "strategy"



- •May The French Ministry of Defence publishes the strategy paper "France and Security in the Indo-Pacific"
- June ASEAN summit, Bangkok, the ASEAN states agree on a joint document "ASEAN Outlook on the Indo-Pacific (AOIP)"
- June The **U.S.** Department of Defense publishes the Indo-Pacific Strategy Report: Prepardness, Partnership, and Promoting a Networked Region
- •November The U.S. Department of State publishes the strategy paper "A Free and Open Indo-Pacific: Advancing a Shared Vision"
- Novemebr Indian Prime Minister presents Indo-Pacific Ocean Initiative (IPOI) at the 14th East Asia Summit, Bangkok

2020

• September - German Government issues the Policy Guidelines on Indo-Pacific

The intra-regional trade among Indo-Pacific countries stands at 69.65 per cent (about US\$ 6.81 trillion) in 2019, mostly contributed by North-East Asia, Latin and North America and Southeast Asia (Figure 2). This shows the potential strength of economic integration in the Indo-Pacific. For instance, Rahman *et al.* (2020)¹ have investigated the potential economic effect of 'Indo-Pacific' regional economic cooperation and compared it with that of the CPTPP (Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP). The Computable General Equilibrium (CGE) results show that the quadrilateral grouping of the US, Japan, Australia, and India already shows a substantial economic gain and if South and East Asia join with the Indo-Pacific cooperation, the economic benefit would be enormous. The findings also indicate that improved trade facilitation amongst countries of South Asia and East Asia could bring huge gain. High trade transaction costs are one of the major barriers inhibiting the growth of Indo-Pacific intra-regional trade. This chapter emphasises that improvements in infrastructure and connectivity that leads to lower trade transportation costs are a necessary step to realise the potential of Indo-Pacific trade in full measure.

3. Emerging Perspectives of Indo-Pacific

The term "Indo-Pacific" has found its way into official documents such as national security strategies, defence white papers, foreign policy, maritime security strategy and other official documents (see Table 2). Australia referred to the term 'Indo-Pacific' in its White Paper in 2012, Defence White Papers in 2013 and 2016, and its Foreign Policy White Paper in 2017, which taken in aggregate, under core Australia's accord of strategic priority to the region. Similarly, the USA has also mentioned the term in its National Security Strategy and defence documents, respectively in 2017 and 2019, with an emphasis on 'Free and Open Indo-Pacific' in the regional context. Table 2 also indicates that several major countries, such as Japan, ASEAN member-States, India, Australia, the US, France, and most recently, Germany, have gradually recognised the strategic importance of the region and come forward to state their perspectives and positions on Indo-Pacific. The idea of the Indo-Pacific has taken root across a wide swath from the European Union (EU) to East Asia. Other countries, such as Canada, Sri Lanka and South Africa, are expected to shortly launch their Indo-Pacific visions.² A common perspective of all these countries in respect of the Indo-Pacific is to ensure a safe and secure maritime space through an inclusive and multilateral approach among like-minded countries while acknowledging ASEAN centrality, and, to support a rules-based international order that promotes regional stability.

Indo-Pacific countries, all of which border the Indian Ocean or the Pacific Ocean, seek to deepen their strategic bonding by enhancing maritime connectivity through quality infrastructure, free and fair trade, preserving marine resources, tackling climate change, and, enabling digital connectivity, marine safety and maritime security. Yet, although the end-goals might well be common goals of Indo-Pacific, there are differences in each country's approach towards the Indo-Pacific construct; and there is, therefore, a need maximise convergence in multiple areas of cooperation, to achieve peace and security in the Indo-Pacific as a whole. Table 3 encapsulates the major objectives and areas of cooperation that are stated in the Indo-Pacific visions of the various countries.

3.1 ASEAN Perspective - ASEAN Outlook on the Indo-Pacific

ASEAN is geographically located at the centre of the Indo-Pacific. ASEAN countries are well integrated in terms of trade and investment with major economies of the Indo-Pacific such as China, the US, Japan, Korea, India, etc. ASEAN has also been engaging with several Indo-Pacific countries at bilateral, regional and multilateral levels. To promote a rules-based regional order, ASEAN adopted the "ASEAN Outlook on the Indo-Pacific (AOIP)" in June 2019.

Table 3: Indo-Pacific Initiatives in Comparison

	Key Objectives	Focus Areas
ASEAN	 Building on existing regional arrangements Strengthening and optimisation of ASEAN-led mechanisms to contribute to the maintenance of peace, freedom, and prosperity 	 Maritime cooperation Connectivity UN SDG 2030 Economic and other areas of cooperation
India	 Deepening economic and security cooperation Strengthening maritime security capacities Advancing peace and security Dealing with emergencies Calling for respect for international maritime rules and norms 	 Maritime ecology Maritime security Marine resources Capacity building and resource sharing Disaster risk reduction and management Science, technology and academic cooperation Trade, connectivity and maritime transport
Japan	 Promotion and establishment of the rule of law, freedom of navigation, free trade, etc. Enhancing connectivity through quality infrastructure Ensuring sustainable development Enhancing maritime safety and security 	 Maritime security Quality infrastructure Environment/Health Human resource development Energy sector Legal system development
Australia	 Resolution of disputes peacefully, in accordance with international law, and without the threat or use of force or coercion Facilitation of open markets for free flows of goods, services, capital and ideas Inclusivity of economic integration and open regionalism Upholding of the rights of freedom of navigation and overflight, and, the protection of the rights of small States 	 Maritime security Enhance regional training on maritime domain awareness Protection of maritime environment and international law Support regional forum Address fault lines, especially, South China Sea issues Promote regional trade and investment, and infrastructure financing arrangements
USA	 Respect for the sovereignty and independence of all nations Peaceful resolution of disputes Free, fair, and reciprocal trade, based on open investment, transparent agreements, and connectivity Adherence to international rules and norms, including those of freedom of navigation and overflight Engagement of partners and regional institutions via multilateral and bilateral engagements Enhancing of economic prosperity Ensuring peace and security Investment in human capital 	 Maritime safety Quality infrastructure Maritime security Energy Digital economy Good governance Peace and security Human capital

Table 3 continued...



Source: De and Kumarasamy (2020).

The AOIP promotes 'ASEAN Centrality' and emphasises ASEAN-led mechanisms to strengthen regional and sub-regional cooperation, to promote common interests within the Indo-Pacific. The AOIP is also intended to work as a set of guiding principles for Indo-Pacific regional cooperation, towards the promotion of peace, stability and prosperity in the region as well as for building connectivity and maritime cooperation, as also to achieve UN SDGs and economic cooperation.³

3.2 ASEAN Plus Perspectives

Japan – "Free and Open Indo-Pacific"

Japan's former Prime Minister, Mr Shinzo Abe, announced Japan's vision for a "Free and Open Indo-Pacific" in 2016. The vision emphasised the promotion and establishment of the rule of law, freedom of navigation, free trade, etc., and sought to pursue economic prosperity and to ensure peace and stability in the region. The Indo-Pacific vision of Japan is to improve connectivity between Asia, Africa and Middle East countries by promoting quality infrastructure development, which includes roads, railway networks, ports, etc. For instance, Japan has initiated several connectivity projects within ASEAN, and in South Asia, too.

Japan's enunciation of its Indo-Pacific vision also promotes sustainable development in the region through equipment-transfers and technical cooperation designed to enhance maritime safety and security, and the provision of capacity-building assistance to coastal countries of the Indo-Pacific to strengthen maritime law enforcement capacity and enhance maritime domain awareness (MDA) in the region. Japan has also been proactive in its cooperation endeavours in the fields of humanitarian-assistance and disaster-relief (HADR), anti-piracy, counterterrorism, non-proliferation, etc. Towards these ends, Japan is actively partnering with ASEAN nations, the US, Australia, France, and India, and has demonstrated a ready willingness to extend assistance to ensure peace and prosperity in the region.⁴ Apart from all this, Japan is also one of the proponents of the recent Supply Chain Resilience Initiative (SCRI). This has been extensively discussed in the study by Horimoto (2020)⁵, who has suggested stronger cooperation between

Japan and India, to maintain peace and stability in the Indo-Pacific region. He has also suggested the creation of a free, open, inclusive, and democratic Indo-Pacific, through the creation and strengthening of mechanisms based on principles of multilateralism, e.g. Quad-Plus, involving not only the present four countries but also incorporating other like-minded countries.

Australia – "Secure, Open and Prosperous Indo-Pacific"

Australia has released two White Papers that set out its vision for the region, both of which seek to facilitate the free flow of trade and investment, work for economic integration which is inclusive and open to all the regional economies, and, support the freedom of navigation, and the rule of law. Australia is enhancing its cooperation with regional players such as Japan, Indonesia, Korea and India, to ensure security, economic partnerships, and, people-to-people linkages. Australia has also enhanced its engagement with member states of ASEAN through strategic partnerships in the areas such as security, trade and investment, regional infrastructural development, and the environment. Australia is an island continent that plays an important role in issues such as maritime safety and security, marine resources and preservation, and maritime domain awareness. These areas are very important for the Indo-Pacific as a whole. Australia has been offering capacity-building programmes to Southeast Asia and enhancing cooperation with countries of the Indian Ocean, so as to promote maritime safety and security.

India – "Free, Open and Inclusive Indo-Pacific"

India occupies a prominent role in the Indian Ocean in terms of geographical, cultural and civilisational linkages. At the regional as well as sub-regional level, India is actively engaged with several major countries, such as the member-States of ASEAN, Japan, South Korea, Australia, New Zealand and the US. India is also working closely with island nations of both, the Indian Ocean and the Pacific Ocean, and with its extended neighbours such as Russia. It is noteworthy that during the ongoing Covid-19, India launched 'Mission Sagar' to provide relief and succour to the island-nations of the Indian Ocean Region.⁷ India strongly believes that the key to regional prosperity lies in multi-faceted cooperation between the nations of the region.⁸.

The Indian Prime Minister, Shri Narendra Modi, introduced the concept of SAGAR – "Security and Growth for All the Region" during his Mauritius visit in March 2015, to promote peace, stability and prosperity in the Indian Ocean region and beyond. Further, to add momentum, Indian Prime Minister shared the vision of a "Free, Open, Prosperous and Inclusive (FOPI) Indo–Pacific" at the Shangri La Dialogue in 2018. While attending the 14th East Asia Summit, in Bangkok, in November 2019, he sought to deepen cooperation amongst Indo-Pacific countries he proposed the 'Indo-Pacific Ocean Initiative' (IPOI). The IPOI focuses on seven deeply interconnected pillars, namely, Maritime Security; Maritime Ecology; Maritime Resources; Capacity Building and Resource Sharing; Disaster Risk Reduction and Management; Science, Technology and Academic Cooperation; and Trade Connectivity and Maritime Transport (Box 1).

FOPI IPOI

Source: De and Kumarasamy (2020).

Box 1: IPOI Pillars

IPOI Pillars

- 1. Maritime Security
- 2. Maritime Ecology
- 3. Maritime Resources
- 4. Capacity Building and Resource Sharing
- 5. Disaster Risk Reduction and Management
- 6. Science, Technology and Academic Cooperation
- 7. Trade, Connectivity and Maritime Transport

The USA - A Free and Open Indo-Pacific: Advancing a Shared Vision

The USA is a significant player within the Indo-Pacific and has robustly promoted its Indo-Pacific vision of a 'Free and Open Indo-Pacific'. Unlike India, the USA has conceptualised the Indo-Pacific as a 'strategy'. The USA currently coincides the geographic boundaries relevant to the planning and execution of this 'strategy' with the area of responsibility of the 'Indo-Pacific Unified Combatant Command' (COCOM), which is one of its seven geographical COCOMs. As such, it describes the region as ranging from the western coast of the Americas to the west coast of India.

The USA's vision emphasises economic prosperity by endorsing free and fair trade, good governance by empowering citizens and civil societies, anti-corruption, transparency, democracy, protecting fundamental freedoms and human rights, addressing transnational crime and environmental challenges, protecting the maritime domain, and, responding to emerging threats to ensure security in the region. The USA proposes to invest about US\$ 113 million along with Australia and Japan to establish an investment fund to deliver infrastructure projects that would bring potential contribution in the Indo-Pacific region. The three countries have also intended to mobilise and support the deployment of private sector investment capital to deliver major new infrastructure projects, enhance digital connectivity and energy infrastructure, and achieve common development goals in the Indo-Pacific. A recent but important feature of the USA's 'Indo-Pacific Strategy' is the 'Blue Dot Network' (BDN), which was formally announced on 4 November 2019 at the Indo-Pacific Business Forum (IPBF) in Bangkok, Thailand. This initiative is intended to promote high-quality, trusted standards for global infrastructure development. As such, it is envisaged as a globally recognised 'evaluation and certification system' for roads, ports, bridges, with particular focus being retained on infrastructure projects in the Indo-Pacific region. The indo-Pacific region is the Indo-Pacific region in the Indo-Pacific region.

3.3 Policy Guidelines of France and Germany in the Indo-Pacific

France and Its Four Pillars of Indo-Pacific Strategy

Among the EU countries, France has large overseas territories and 93 per cent of its exclusive economic zone is in the Indian and Pacific Oceans. About 1.5 million French citizens live in these territories and France also maintains a strong military presence in the region. France has realised the significance of geopolitical and geo-economic changes in the Indo-Pacific region and the country's President enunciated the 'French Indo-Pacific' vision at the Garden Island, Sydney in May 2018. The core aspects of the French approach to the Indo-Pacific are: settling regional crises, protecting shipping routes, robustly engaging in the fight against terrorism, radicalisation and organised crime; strengthening strategic partnership with regional partners like Australia, India, Indonesia, Japan, New Zealand, Singapore, South Korea, but also with China. France follows the EU Framework while working with other regional partners in building regional cooperation. France also has been working closely with ASEAN, recognising that the ASEAN is the focal point of Asia's multipolar architecture and the core of any inclusive Indo-Pacific strategy. France is committed to promoting global public goods (climate change, environment and biodiversity, health, education, digital technology and quality infrastructure) and enhancing the wellbeing of the region. France also endorses the EU as a key player for sustainable development and stability of the Indo-Pacific region under the cooperation of Europe and Asia Connectivity Strategy.

Germany: "Policy Guidelines" on Indo-Pacific

Within the EU, Germany has followed France and has recently (on 1 September 2020) shared a policy guideline to engage with countries of the Indo-Pacific. Unlike France, Germany does not have any recognised territory or territorial claim in the Indo-Pacific region. However, both these European nations have shared interests in shaping and shoring-up an Indo-Pacific region that is founded upon a consensually derived rules-based order that promotes comity between all nations through international cooperation. Germany has shown considerable interest in establishing partnerships for economic cooperation and

to enhance its cooperation in combating marine pollution, mitigating and adapting to climate change, enhancing connectivity, spreading culture, broad based education, advancing science and technology, and furthering the opportunities resident in cyberspace.¹³

Germany's Indo-Pacific approach supports an ASEAN-centric security architecture and proposes to initiate dialogues with BIMSTEC and IORA in the areas of business, maritime safety, and disaster risk management. Germany supports rules-based free trade and helps to shape the international rules-based order to ensure the enforcement of rules and norms in the region. Germany has also endorsed that the ongoing Covid-19 has disrupted trade and slowed the economic growth of the region, and, accordingly calls for the diversification of global and regional supply chains and markets. This shows the positive aspects of potential investment opportunities in Asian countries by the EU member states. Germany also supports the 2021-25 Strategic Plan of the Mekong River Commission (MRC) for the management of regional water resources. Apart from all this, Germany also seeks to enhance its defence and cybersecurity cooperation, particularly with Singapore, Australia, Japan, and South Korea and promotes digital transformation and connectivity in the region.

4. IPOI and AOIP: Complementarities and Cooperation

Section 3 briefly explores the significant role of the Indo-Pacific on building both the economic and security architecture of the region. There is a very large scope for convergence amongst Indo-Pacific countries in a variety of areas of common interest, and there is evident and significant complementarity in sustainably sharing the rich resources of this region. In this context, this section reviews the commonalities between IPOI and AOIP and the areas for plausible cooperation to strengthen the emerging regional architecture on Indo-Pacific.

India's Prime Minister enunciated a new "Indo-Pacific Oceans Initiative" (IPOI) at the 14th East Asia Summit (EAS) in Bangkok, on 4 November 2020.¹⁵ The IPOI has been conceptually positioned to be in consonance with the UN's Sustainable Development Goals (SDG) — specifically (but not exclusively) with 'SDG 14': Life Below Water.¹⁶ The IPOI is designed to further the endeavour of countries of the Indo-Pacific, stretching from the east coast of Africa to the west coast of the Americas,¹⁷ "to create a safe, secure and stable maritime domain" within which collective and collaborative mechanisms could be created to "conserve and sustainably use" this domain and "safeguard the oceans, including from plastic litter; build capacity and fairly share resources; reduce disaster risk; enhance science, technology and academic cooperation; and promote free, fair and mutually beneficial trade and maritime transport."¹⁸

The IPOI provides both, complementarity and specificity to the Indian vision of SAGAR, which, apart from being the Hindi word for 'Ocean', is, more pertinently, an acronym for 'Security And Growth for All in the Region'. ¹⁹ The vision of SAGAR itself rests upon India's formulation of the Indo-Pacific as a region — and, specifically, the Indian outlook towards it. Abundant specificity in this regard has been provided by India, and clearly articulated at the highest level of the Government of India. Delivering the keynote address at the 2018 edition of the Shangri La Dialogue, in Singapore, on 1 July 2018, Indian Prime Minister was unequivocal in his presentation of the Indian outlook.

As may be seen from the Indian Prime Minister's speech at the Shangri La Dialogue, 'inclusivity', and, 'transparency', are fundamental to India's Indo-Pacific formulation,²⁰ as also to the vision of SAGAR, and these, therefore, also drive the 'IPOI'.

The 'IPOI' identifies seven basic facets of maritime cooperation and collaboration. These are: (1) Maritime Security; (2) Maritime Ecology; (3) Maritime Resources; (4) Capacity Building and Resource Sharing; (5) Disaster Risk Reduction and Management; (6) Science, Technology and Academic Cooperation; and (7) Trade, Connectivity and Maritime Transport. These facets of maritime cooperation and collaboration have been described by India's Ministry of External Affairs (MEA) as seven "pillars", 21 but

should not be thought of as seven silos, since the interconnections between all of them are so abundant and so varied that they form an intricate web, with seven spokes.

It is important to note that both, 'SAGAR' (as a vision) and the 'IPOI' (as an initiative), are synchronous with other recent maritime initiatives and strategies relevant to the Indo-Pacific. Prominent amongst these is Japan's "Free and Open Indo Pacific" (FOIP). This term, much favoured by Tokyo, actually has two distinct (albeit related) points of reference. The first is as a 'concept' in which the adjectives 'free' and 'open' are envisaged as "international public goods" that can be provided through the leveraging of the dynamism inherent in the combination of two continents (Asia and Africa) across two oceans (the Indian Ocean and the Pacific Ocean). The second point of reference — and here the acronym 'FOIP' is used almost as a common noun — is a key strategy of Japan, through which a troika of objectives, namely, 'peace' 'stability', and, 'prosperity', all three of which result from a foundational adherence to a rule-based international maritime order, are sought to be achieved in a comprehensive, inclusive and transparent manner, across the geography defined by the aforementioned combination of the two continents (Asia and Africa) and the two oceans (the Indian Ocean and the Pacific Ocean).²² As with the FOIP, the IPOI emphasises 'inclusivity', 'transparency', a 'rules-based international order', and the centrality of ASEAN and ASEAN-led constructs, such as the East Asia Summit (EAS)²³ and the ASEAN Regional Forum (ARF).²⁴ A similar congruence between the Indian conceptualisation of the Indo-Pacific as a 'strategic-geography' may be seen with France's concept as enunciated in the 2019-update to the French MoD's policy document, "France and Security in the Indo-Pacific", and, here too, 'peace' 'stability', and, 'prosperity' are enunciated as desired goals. As in the case of India and Japan, France has unequivocally stated that the attainment of these goals requires adherence to a rules-based international order that has been set through multilateral dialogue and comity.²⁵ While the geography of the Indo-Pacific specified in the Government of Australia's "2017 Foreign Policy White Paper" ("We define the Indo-Pacific as the region ranging from the eastern Indian Ocean to the Pacific Ocean connected by Southeast Asia, including India, North Asia and the United States."),26 is more limited than that of India, Japan and France, there is very substantial conceptual and geopolitical alignment, particularly where the IPOI is concerned. This congruity is most evident in the India-Australia "Joint Declaration on a Shared Vision for Maritime Cooperation in the Indo-Pacific" of 4 June 2020.27 Some analysts have tended to club the USA, Japan, India and Australia into something called a 'FOIP bloc', which they have posited is distinct from (and opposed to) China.²⁸ Considerable significance is provided by these analysts to the potential of the expected initiative from Indonesia by way of an "Indo-Pacific Infrastructure and Connectivity Forum". However, this seems to be a force-fitted difference-of-approach because it is acknowledged by these very scholars that "Several principles of the Jakarta-led Indo-Pacific cooperation concept - namely, openness, transparency, and upholding of international law (rules-based order) - are compatible with those proposed by the United States and its partners within their FOIP vision". In any case, the basic tenet of ASEAN-centrality embodied in this soon-to-beproposed 'forum' has already been fully embraced by India, Japan, Australia and the USA. Indeed, the very conceptualisation by India of the Indo-Pacific, as also its 'subsets', namely, the vision of SAGAR and the IPOI, is founded precisely upon the centrality of ASEAN. This is equally true of the FOIP and the Australian and US formulations.

At this stage, it would be appropriate to briefly review ASEAN's formulation, embodied in the "ASEAN Outlook on the Indo-Pacific" (AOIP).

In terms of the geography of the Indo-Pacific, the AOIP makes two main assertions. The first is that ASEAN views the Indo-Pacific as being equal to the wider Asia-Pacific region *plus* the Indian Ocean region.²⁹ The second assertion both, modifies and amplifies, the first, in averring that the Indian Ocean region and the Pacific Ocean region are not perceived by ASEAN as being merely "contiguous territorial spaces but as a closely integrated and interconnected region, with ASEAN playing a central and strategic role".³⁰

There is no doubt that, cartographically, the Indian Ocean region does, indeed, stretch eastward from the east coast of Africa, and that the Pacific Ocean region does, indeed, stretch westward to the western shores of the Americas. It is thus clear that, contrary to the views of some European scholars³¹, there is a close congruence between ASEAN, Japan, France and India, insofar as the geographic framework of the Indo-Pacific region is concerned.

Beyond the strict confines of geography, too, clear congruence is visible in the functional framework of the Indo-Pacific perspectives of both, ASEAN and India. This commonality runs unbroken through the Indian concept of the Indo-Pacific itself, India's outlook as encapsulated by the acronym of SAGAR, and the programmes envisaged under the rubric of the IPOI. Specific evidence of this congruence is to be found in the following commonalities between the outlooks of ASEAN and India, respectively:

- The centrality of ASEAN, as a foundational principle.
- The predominance of dialogue and cooperation instead of rivalry.
- The pursuit of peace and stability as a prerequisite for prosperity.
- The pursuit of inclusive development and prosperity for all.
- The criticality of the maritime domain.
- The primacy accorded to inclusivity, openness, and transparency.
- The indispensability of a rules-based framework whose structural strength is derived from
 internationally and consensually derived laws, treaties and conventions such as the UN Charter,
 the ASEAN Charter, the 1982 UN Convention on the Law of the Sea (UNCLOS 1982), the SOLAS
 Conventions, the SUA Convention, the 1976 ASEAN Treaty of Amity and Cooperation (TAC, 1976),
 the 2011 EAS Principles for Mutually Beneficial Relations, etc.
- The essentiality of an abiding respect for sovereignty.
- The importance is given to complementarity with existing ASEAN-led cooperation-frameworks, such
 as the East Asia Summit (EAS), the ASEAN Regional Forum (ARF), the ASEAN Defence Ministers
 Meeting 'Plus' (ADMM-Plus), the Expanded ASEAN Maritime Forum (EAMF), etc.

There is, once again, an almost complete commonality in the specific areas of cooperation envisaged by the AOIP and the IPOI, although the former has a more exhaustive listing and the latter, a more consolidated set that encompasses very nearly all the broad areas of cooperation enumerated in the AOIP, as well as their more detailed amplification.³² Table 4 shows the evidence of commonalities between AOIP and IPOI.

Special mention must be made of 'Connectivity' and, as the AOIP puts it — "connecting the connectivities". It is a central theme along which maritime cooperation and collaboration between ASEAN and India can and should be progressed. In August 2017, Dr S Jaishankar, who was then Foreign Secretary in the Government of India, had unequivocally stated- "Growth and connectivity are, today, very central to India's foreign policy thinking. The approach of 'sabka saath, sabka vikas' (collective action, inclusive growth) is as much a belief in international relations as it is in the domestic development... Across South Asia, one can see today transformational initiatives in energy, road and rail connectivity and infrastructure building... As these initiatives are realised, their contribution to the emergence of a larger regional cooperative architecture would be increasingly appreciated. Significantly, we are today working closely with a number of other international players whose approach is similar in this regard". 33

Table 4: Identified Broad Areas of (Maritime) Cooperation

Sectors	ASEAN Outlook on the Indo-Pacific (AOIP)	Indo-Pacific Oceans Initiative (IPOI)		
Maritime	Freedom of Navigation and Overflight	Maritime Security		
Cooperation	Peaceful Dispute-settlement	Capacity Building and Resource		
	Promote Maritime Connectivity	Sharing		
	Maritime Safety & Security			
	Promote Maritime Commerce			
	Address Transnational Crime (e.g., trafficking in persons or illicit drugs, seapiracy, robbery and armed robbery against ships at sea, etc.)			
	Develop a Blue Economy	Maritime Resources		
	Sustainable Management of Marine Resources	Capacity Building and Resource Sharing		
	Address Marine Pollution			
	Mitigate impacts of Sea-level Rise			
	Tackle Marine Debris			
	Preserve and Protect the Marine Environment and Biodiversity	Maritime Ecology		
	Promote 'Green' Shipping,	Capacity Building and Resource		
	Protect the Livelihood of Coastal Communities	Sharing		
	Support Small-scale Fishing Communities			
	Technical Cooperation in Marine Science Collaboration (R & D; sharing of experience and best practices, capacity-building, managing marine hazards, raising awareness on marine and ocean-related issues, etc.)	Science, Technology and Academic Cooperation		
Connectivity (Connecting the Connectivities)	Reinforce existing MPAC 2025	Trade Connectivity and Maritime		
	Mobilise resources for connectivity projects via regional public-private partnerships (PPP)	Transport Capacity Building and Resource Sharing		
	Promote regional public-private partnerships (PPP) for infrastructure projects			
	Explore potential synergies with subregional frameworks (e.g., IORA, BIMSTEC, BIMP-EAGA, MGC, ACMECS, etc.)			
	People-to-people connectivity (including academia and business communities)			

Table 4 continued...

UN Sustainable	Utilisation of the digital economy	IPOI's underpinning as a whole	
Development Goals 2030	Align regional development with the SDGs		
Economic and	Trade Facilitation and Logistics	Trade Connectivity and Maritime	
Other Areas of	Infrastructure and Services	Transport	
Cooperation		Capacity Building and Resource	
		Sharing	
	Climate Change and Disaster Risk Reduction	Disaster Risk Reduction and	
	and Management	Management	
	Maritime Implications of Industrial Revolution 4.0		

Source: Chauhan (2020).

Finally, in this examination of complementarities between the AOIP and the IPOI, it is important to avoid undue self-limitation by restricting the geographic scope to the western Pacific alone. The Indo-Pacific maritime expanse offers opportunities for a number of cooperation-mechanisms within the Indian Ocean, too. The willingness of ASEAN member-States such as Singapore, Indonesia, Malaysia and Thailand, to involve themselves in protecting and preserving freedoms in the maritime common in the north-western Arabian Sea within the Indian Ocean, offers a number of exciting pointers for future maritime collaboration that both, India and ASEAN would do very well to explore. An overarching facet of cooperation stipulated in the IPOI is that of "Capacity Building and Resource Sharing".

As Table 4 shows, this is a recurring facet of complementarity across several, if not all, the areas of cooperation listed in the AOIP document. For instance, the enormous success that India has garnered in addressing water-stress in volcanic islands, such as those in the Lakshadweep, by way of Low-Temperature Thermal Desalination (LTTD), can easily be leveraged and proliferated across several island nations of the Indo-Pacific as a whole. This offers immediate opportunities for several technologically-advanced ASEAN nations to improve the engineering of these LTTD plants and offer them as "public goods" in both, the western pacific as well as the Indian Ocean, under the common rubric of the AOIP and the IPOI.

It may thus be seen from the foregoing arguments, that the complementarities between the AOIP and the IPOI are legion and the opportunities for maritime cooperation between ASEAN and India are limited solely by the collective imagination of the respective policy-makers.

5. Way Forward

With the announcement of the AOIP and the IPOI in 2019, the Indo-Pacific has been imparted very significant international momentum and geopolitical traction. As an open global initiative, the IPOI draws on existing regional cooperation architecture and mechanisms to focus on seven central pillars that anchor the deeply interconnected areas of Maritime Security; Maritime Ecology; Maritime Resources; Capacity Building and Resource Sharing; Disaster Risk Reduction and Management; Science, Technology and Academic Cooperation; and Trade Connectivity and Maritime Transport. The AOIP and the IPOI demonstrate very substantive commonalities and greatly enhance the scope of cooperation, particularly in view of unfolding changes to the global order against the backdrop of the ongoing Covid-19. The National Maritime Foundation (NMF) of India came out with the first-ever Indo-Pacific Report in 2019 and this initiative needs to be followed-up so that an extensive body of literature on the Indo-Pacific is available and its intellectual base is appropriately strengthened.

The success of this regional initiative also depends on bilateral as well as subregional relations. In July 2019, India joined ACMECS (Ayeyawady-Chao Phraya-Mekong Economic Cooperation Strategy) as a 'Development Partner' along with Australia, China, Japan, South Korea and the US.

The Indo-Pacific has all ingredients required to facilitate trade and investments. However, the region is highly heterogeneous in terms of economic size and level of development, with significant differences in security establishments and resources. It also faces complex challenges in terms of economy, security and the environment. The maintenance of peace, stability and security on, in and under the seas; unimpeded lawful commerce; freedom of navigation and overflight and other internationally lawful uses of the oceanic and air space; and, the protection and preservation of marine resources, as well as a sustainable and responsible fishery–framework; are all critical towards building a regional consensus on maritime security and cooperation in the Indo-Pacific.

With countries from ASEAN, SAARC, BIMSTEC, EAS, EU and NAFTA all contributing towards a free, open and inclusive Indo-Pacific, there is every likelihood of a substantial and substantive scale-up of regional cooperative and collaborative endeavours in the post-Covid-19 period. Of course, this is provided countries do not repeat past mistakes in terms of regional cooperation initiatives, and, instead, devote quality time to build a better world for all. Security is not the only vehicle for the diffusion of integration. Geographical and cultural proximity is at least as effective if not more so. In the final analysis, it is the economy that would drive the Indo-Pacific in the days and years that lie ahead.

Even in this Covid-19 time, countries of the Indo-Pacific have ample scope for further deepening their integration. Strengthening economic integration requires a shared strategic vision, political will, and strong commitment, which are the keys for the success of Indo-Pacific. Without doubt, ASEAN centrality would be a major driving force for speeding-up cooperation within the Indo-Pacific. Multidimensional regional cooperation within the Indo-Pacific would not only foster economic relations but would, in addition, strengthen regional capacity, and enhance regional capability while dealing with the region's complex security challenges. To drive the initiative in this era of disruptions, it is recommended that Indo-Pacific countries that have enunciated their respective visions, convene a Ministerial-level meeting to begin with, and a Summit thereafter. It would be advantageous to constitute an empowered Joint Working Group (JWG) to design the Indo-Pacific blueprint and propose a comprehensive Plan of Action (POA).

6. Concluding Remarks

The Indo-Pacific has a significant role to play in building both the economic and security architecture of the region. Protecting marine resources, biodiversity, and developing adaptive and mitigative strategies to offset the deleterious effects of climate change, enhancing sustainable development, promoting connectivity, reducing marine pollution, promoting disaster-management and relief, information sharing, capacity building and capability enhancement, generating maritime domain awareness, developing quality infrastructure, increasing non-polluting maritime trade and transport, strengthening the digital economy, promoting energy cooperation, and facilitating maritime tourism, are just a few of the several areas that could be explored further through cooperation amongst the Indo-Pacific partnering countries.

There is a vast untapped opportunity for cross-border trade and investment across the Indo-Pacific region. Heterogeneity in the economic size and development in the region has thrown-up several challenges, but these can be managed by consolidating the efforts of countries to mobilise the skills, financial and technical resources to stimulate growth and long-term development of the region.

Countries of the Indo-Pacific can also advantageously use existing regional and sub-regional fora and initiatives, such as APEC, ASEAN, IORA, BIMSTEC, MGC, ACMECS, etc., to reinforce the partnership.³⁴

The long-term funding and supply of quality infrastructure are the biggest challenges in the Indo-Pacific region. India's SAGAR and Indo-Pacific Ocean Initiative, Japan's Quality Infrastructure, ASEAN's Master Plan on ASEAN Connectivity 2025, the USA's Blue Dot Network, and other initiatives across the region, are all aimed at strengthening regional connectivity. There is a large potential to consolidate and mobilise financing for infrastructure projects across the region by developing a comprehensive financing scheme as also by creating a master plan for Indo-Pacific connectivity and building the needed institutions to drive its constituent programmes.

[This chapter is based on following two publications: (i) De, Prabir and Durairaj Kumarasami (2020) "Emerging Perspectives of Indo-Pacific Initiatives", AIC Commentary No. 9, ASEAN-India Centre (AIC), RIS, New Delhi; and (ii) Chauhan, Pradeep (2020) "ASEAN Outlook on Indo-Pacific (AOIP) and Indo-Pacific Oceans Initiative (IPOI): Complementarities and Cooperation", Paper Presented at the 6th AINTT Roundtable, New Delhi]

Endnotes

- Refer, for example, Rahman et al. (2020).
- Refer, for example, De (2020).
- 3. Refer, for example, Acharya (2019) and Saha (2019).
- 4. Refer, Towards Free and Open Indo Pacific, The Government of Japan (2019).
- 5. Refer, for example, Horimoto (2020).
- 6. Refer, for example, Adducul (2018) and Hardy (2019).
- 7. India launched 'Mission Sagar' on 10 May 2020 on a special 'COVID Relief Mission' carrying 580 tonnes of food aid and essential medicines and also dispatched medical assistance team to the island nations in the southern Indian Ocean region through Indian Naval Ship Kesari.
- 8. Refer, for example, Siddiqui (2019).
- 9. Refer, Utz (2018).
- 10. US Department of State, "Blue Dot Network", https://www.state.gov/blue-dot-network/
- 11. Refer, for example, Nicolas (2019).
- See, The Indo-Pacific region: a priority for France. https://www.diplomatie.gouv.fr/en/country-files/asia-and-oceania/the-indo-pacific-region-a-priority-for-france/
- Refer, "Germany Europe Asia: shaping the 21st century together": The German Government adopts policy guidelines on the Indo-Pacific region, Federal Foreign Office (2020).
- 14. Refer, for example, Fulda (2020).
- 15. Refer, PM Speech at the East Asia Summit, MEA (2019).
- United Nations Development Programme, "Sustainable Development Goals, Goal 14: Life Below Water", https://www.undp.org/content/undp/en/home/sustainable-development-goals/goal-14-life-below-water.html
- 17. See also United Nations in India, "SDG 14: Life Below Water", https://in.one.un.org/page/sustainable-development-goals/sdg-14/
- 18. Refer, PM's Keynote Address at Shangri La Dialogue MEA (2018).
- 19. Refer, PM"s Speech at the East Asia Summit, MEA (2019).
- 20. Refer, PM's remarks on the Commissioning of Coast Ship Barracuda, MEA (2015).
- 21. Refer, PM's Keynote Address at Shangri La Dialogue, MEA (2018).
- 22. Refer, Indo-Pacific Division Briefs, MEA (2020a).
- 23. Government of Japan, Ministry of Foreign Affairs, "Free and Open Indo-Pacific", https://www.mofa.go.jp/files/000430632.pdf

- Government of India, Ministry of External Affairs, East Asia Summit, "India at the East Asia Summit", August 2018, https://mea.gov.in/aseanindia/about-eas.htm
- 25. ASEAN Regional Forum Website, "About the ARF", http://aseanregionalforum.asean.org/about-arf/
- 26. Refer, "France and Security in the Indo-Pacific" Government of France (2019).
- 27. Refer, 2017 Foreign Policy White Paper, Government of Australia (2017).
- ^{28.} Refer, Joint Declaration on a Shared Vision for Maritime Cooperation in the Indo-Pacific Between the Republic of India and the Government of Australia, MEA (2020b).
- 29. Leong. K. L.C. (2020).
- 30. Refer, "ASEAN Outlook on the Indo-Pacific" Background and Rationale, p 1. ASEAN (2019).
- 31. Refer, "ASEAN Outlook on the Indo-Pacific" ASEAN Outlook on the Indo-Pacific, p 2, ASEAN (2019).
- 32. Refer, Heiduk and Wacker (2020).
- 33. Refer, "ASEAN Outlook on the Indo-Pacific", Section V Areas of Cooperation, p 3, ASEAN (2019).
- 34. Refer, Address by Dr S Jaishankar, The Economic Times (2007).
- 35. Refer, for example, De (2020).

References

- ASEAN. 2019. ASEAN Outlook on the Indo-Pacific. Available at: https://asean.org/storage/2019/06/ASEAN-Outlook-on-the-Indo-Pacific_FINAL_22062019.pdf
- Acharya, A. 2019. Why ASEAN's Indo-Pacific Outlook Matters. East Asia Forum, 11 August. Available at: https://www.eastasiaforum.org/2019/08/11/why-aseans-indo-pacific-outlook-matters/ (assessed on 20 September 2020)
- Adducul, L. A. M. 2018. The Indo-Pacific Construct in Australia's White Papers: Reflections for ASEAN-Australia Future Strategic Partnership. Foreign Service Institute (FSI), 5 (6), March. Available at: https://www.fsi.gov.ph/the-indo-pacific-construct-in-australias-white-papers-reflections-for-asean-australia-future-strategic-partnership/ (assessed on 20 September 2020)
- Clayton Utz. 2018. *Backing infrastructure investment in the Indo-Pacific: The trilateral Australia-Japan-United States partnership*. Lexology. Available at: https://www.lexology.com/library/detail.aspx?g=c6377f39-b2f9-4117-b139-01235bb941d9 (assessed on 22 September 2020)
- Chauhan, P. 2020. ASEAN Outlook on Indo-Pacific (AOIP) and Indo-Pacific Oceans Initiative (IPOI): Complementarities and Cooperation. Paper Presented at the 6th ASEAN-India Network of Think Tank (AINTT), Roundtable, New Delhi.
- De, P. 2020. Driving Indo-Pacific in an Uncertain World. *The Economic Times*, 6 September. Available at: https://economictimes.indiatimes.com/blogs/et-commentary/navigating-indo-pacific-in-an-uncertain-world/(assessed on 11 September 2020)
- De, P. and Kumarasamy, D. 2020. *Emerging Perspectives of Indo-Pacific*. AIC Commentary, No.9, September 2020. Available at: https://cutt.ly/aiccommentarysept2020
- Federal Foreign Office. 2020. "Germany Europe Asia: shaping the 21st century together": The German Government adopts policy guidelines on the Indo-Pacific region. Available at: https://www.auswaertiges-amt.de/en/aussenpolitik/regionaleschwerpunkte/asien/german-government-policy-guidelines-indo-pacific/2380510
- Fulda, A. 2020. Germany's New Policy Paper for the Indo-Pacific: Some Change in Tone, Little in Substance. RUSI Commentary, 11 September. Available at: https://rusi.org/commentary/germanys-new-policy-paper-indo-pacific-some-change-tone-little-substance (assessed on 22 September 2020)
- Government of Australia. 2017. 2017 Foreign Policy White Paper. Department of Foreign Affairs and Trade (DFAT), Government of Australia. Available at: https://www.fpwhitepaper.gov.au/foreign-policy-white-paper/chapter-three-stable-and-prosperous-indo-pacific/indo-pacific

- Government of France. 2019. France and Security in the Indo-Pacific, Government of France, Ministry of Defence, 2018 Edition updated in May 2019. Available at: https://www.defense.gouv.fr/layout/set/print/content/download/532754/9176250/version/3/file/France+and+Security+in+the+Indo-Pacific+-+2019.pdf
- Government of Japan. 2019. Towards Free and Open Indo-Pacific. Ministry of Foreign Affairs. Government of Japan. Available at: https://www.mofa.go.jp/files/000407643.pdf
- Hardy, J. M. 2019. Australia's Role in the Indo-Pacific. Indo-Pacific Defense Forum, 11 November. https://ipdefenseforum.com/2019/11/australias-role-in-the-indo-pacific/ (assessed on 20 September 2020)
- Horimoto, T. 2020. and other thematic papers covered in the special issue of the *Journal of Asian Economic Integration* (*JAEI*), Vol. 2, No. 1.
- Heiduk, F. and Wacker, G. 2020. From Asia-Pacific to Indo-Pacific: Significance, Implementation and Challenges. Stiftung Wissenschaft und Politik (German Institute for Security and International Affairs), SWP Research Paper 9, July 2020, pp 8, 10. Available at: https://www.swp-berlin.org/fileadmin/contents/products/research_papers/2020RP09_IndoPacific.pdf
- Leong. K. L.C. 2020. What to Expect from Indonesia's Indo-Pacific Push in 2020. *The Diplomat*, 06 March 2020. Available at: https://thediplomat.com/2020/03/what-to-expect-from-indonesias-indo-pacific-push-in-20
- MEA. 2015. Text of the PM's remarks on the Commissioning of Coast Ship Barracuda. Ministry of External Affairs, Government of India, Media Center, 12 March 2015. Available at: https://www.pmindia.gov.in/en/news_updates/text-of-the-pms-remarks-on-the-commissioning-of-coast-ship-barracuda/
- 2018. Prime Minister's Keynote Address at Shangri La Dialogue. Ministry of External Affairs, Government of India, Media Center, 01 June 2018. Available at: https://mea.gov.in/Speeches-Statements.htm?dtl/29943/Prime+Ministers+Keynote+Address+at+Shangri+La+Dialogue+June+01+2018#:~:text=Center
- 2019. Prime Minister's Speech at the East Asia Summit. Ministry of External Affairs, Government of India, Media Center, 04 November 2019. Available at: https://www.mea.gov.in/Speeches-Statements.htm?dtl/32171/Prime_Ministers_Speech_at_the_East_Asia_Summit_04_November_2019
- 2020a. Indo-Pacific Division Briefs. Ministry of External Affairs, Government of India. Available at: https://mea.gov.in/Portal/ForeignRelation/Indo_Feb_07_2020.pdf
- 2020b. Joint Declaration on a Shared Vision for Maritime Cooperation in the Indo-Pacific Between the Republic of India and the Government of Australia. Ministry of External Affairs, Government of India, Media Center, 04 June 2020. Available at, https://www.mea.gov.in/bilateral-documents.htm?dtl/32730/Joint_Declaration_on_a_Shared_Vision_for_Maritime_Cooperation_in_the_IndoPacific_Between_the_Republic_of_India_and_the_Government_of_Australia
- NMF. 2019. Indo-Pacific Report 2019. National Maritime Foundation (NMF), New Delhi.
- Nicolas, F. 2019. France's Indo-Pacific strategy: inclusive and principled. East Asia Forum, 12 December. https://www.eastasiaforum.org/2019/12/12/frances-indo-pacific-strategy-inclusive-and-principled/ (assessed on 25 September 2020)
- Rahman, M., Kim, C. and De, P. 2020. Indo-Pacifive Cooperation: What Do Trade Simulations Indicate? *Journal of Economic Structures*, Vol. 9, No. 45. Available at: https://journalofeconomicstructures.springeropen.com/articles/10.1186/s40008-020-00222-4
- Saha, P. 2019. ASEAN's Indo-Pacific outlook: An analysis. Observer Research Foundation, 28 June. Available at: https://www.orfonline.org/expert-speak/aseans-indo-pacific-outlook-an-analysis-52542/ (assessed on 20 September 2020)
- Siddiqui, H. 2019. *India's concept of Indo-Pacific is inclusive and across oceans*. Ministry of External Affairs, Government of India, 8 November. Available at: https://www.mea.gov.in/articles-in-indian-media.htm?dtl/32015/Indias_concept_of_IndoPacific_is_inclusive_and_across_oceans
- The Economic Times. 2007. Growth, Connectivity Key to India's Foreign Policy Thinking: S Jaishankar. Address by Dr S Jaishankar at the Consultation on Asia-Africa Growth Corridor: The Way Forward event hosted by the Research and Information System for Developing Countries, 25 August 2017. Available at: https://economictimes.indiatimes.com/news/economy/policy/growth-connectivity-key-to-indias-foreign-policy-thinking-s-jaishankar/articleshow/60224892.cms

ASEAN-India Development and Cooperation Report 2021

Avenues for Cooperation in Indo-Pacific

ASEAN and India are bound together by their shared history, culture and civilisation. Relation with ASEAN is one of the cornerstones of India's foreign policy. ASEAN and India are more integrated now as compared to the year when the Act East Policy (AEP) was introduced. However, the global slowdown in the last few years and the current pandemic have an adverse impact on the economies of ASEAN and India. Amid these developments, the partnership between ASEAN and India continues to make remarkable progress in a wide range of areas. Today, ASEAN and India face a common challenge to save their countries from the devastation of the Covid-19 pandemic. It underlines the need for deeper cooperation between ASEAN and India in search of collective solutions to the common challenges and the collective path for a resilient recovery.

Against this backdrop, the ASEAN-India Development and Cooperation Report 2021: Avenues for Cooperation in Indo-Pacific (AIDCR 2021) presents scope, challenges and opportunities in deepening the ASEAN-India partnership. Another objective of the Report is to promote ASEAN-India integration with particular focus on current challenges unleashed by the Covid-19 pandemic, and the regional cooperative mechanisms that could provide solutions to them. The Report broadly addresses the major issues pertaining to (i) economic performance, trade, investment and value chain linkages, (ii) trade facilitation and connectivity, (iii) sectoral issues such as energy cooperation, and (iv) Indo-Pacific cooperation. This Report is an independent assessment of various economic and social relations between ASEAN and India.

The Report will be invaluable to scholars and researchers of economics, international relations, development studies, area studies, as well as policymakers, administrators, private sector professionals, and non-governmental organisations in the field.





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