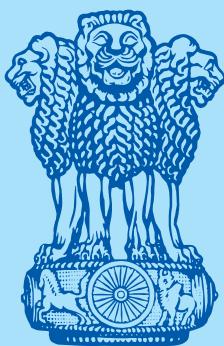


ANNUAL REPORT 2020-21



सत्यमेव जयते

**GOVERNMENT OF INDIA
MINISTRY OF PORTS,
SHIPPING & WATERWAYS**



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Chapter - I

INTRODUCTION



Name changing ceremony of Ministry of Shipping as Ministry of Ports, Shipping and Waterways (PS&W) by Hon'ble Minister of State (IC) for PS&W on 09.11.2020

- 1.1 Ministry of Shipping was formed in 2009 by bifurcating the erstwhile Ministry of Shipping, Road Transport and Highways into two independent Ministries. Thereafter, name of the Ministry was changed to Ministry of Ports, Shipping and Waterways (PS&W) on 9th November, 2020.
- 1.2 Maritime Transport is a critical infrastructure for the economic development of a country. It influences the

pace, structure and pattern of development. The Ministry of Ports, Shipping & Waterways encompasses within its fold shipping and port sectors which also include shipbuilding and ship repair, major ports and inland water transport. The Ministry has been entrusted with the responsibility to formulate policies and programmes on these sectors and their implementation.



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- 1.3 Comprehensive policy package is necessary to address the diverse issues facing the maritime transport sector. The capacity of the ports in terms of their berths and cargo handling equipment needs to keep pace with the growing requirements of the overseas trade. The shipping industry must be enabled to carry higher shares of the sea-borne trade in indigenous bottoms.
- 1.4 Historically, investments in the transport sector, particularly in the ports, have been made by the State, mainly because of the large resources required, long gestation period, uncertain returns and a number of externalities associated with this infrastructure sector. However, the growing resource requirements and the concern for managerial efficiency and consumer responsiveness have led to the active involvement of the private sector in infrastructure services in recent times. To encourage private sector participation, Ministry of Ports, Shipping & Waterways has laid down comprehensive policy guidelines for private sector participation in the Major ports.
- 1.7 Charge) for Ports, Shipping & Waterways.
- 1.8 Secretary (PS&W) is assisted by Additional Secretary, Joint Secretary (Shipping), Joint Secretary (Ports), Joint Secretary (Sagarmala & PPP), Joint Secretary (Admn., Parl. & DGLL), Economic Adviser, Adviser (Statistics), Development Adviser (Ports), officers at the level of Directors, Deputy Secretaries, Under Secretaries and other Secretariat/Technical Officers.
- 1.9 The Finance Wing is headed by Additional Secretary & Financial Adviser who assists in formulating and processing of all policies and other proposals having financial implications.
- 1.10 The Accounts Wing is headed by a Pr. Chief Controller of Accounts who is inter-alia, responsible for accounting, payment, budget, internal audit and cash management.
- 1.11 Adviser (Statistics) renders necessary data support to various Wings of the Ministry for policy planning, transport coordination, economic & statistical analysis on various modes of transport with which the Ministry is concerned.
- 1.12 The following Attached/Subordinate offices, Autonomous Organisations, Societies/ Associations and Public Sector Undertakings are functioning under the administrative control of the Ministry of Ports, Shipping & Waterways:-

Functions

- 1.5 The subjects allocated to the Ministry of Ports, Shipping & Waterways are listed at **ANNEXURE-I**.

Organizational Set-up

- 1.6 Shri Mansukh Mandaviya is the Minister of State (Independent

Attached/Subordinate Offices

1. Director General of Shipping
2. Andaman, Lakshadweep Harbour Works
3. Directorate General of Lighthouses and Lightships

Autonomous Bodies

1. Tariff Authority of Major Ports (TAMP)
2. Port Trusts at Mumbai, Kolkata, Cochin, Kandla (Deendayal), Chennai, Mormugao, NhavaSheva (Jawaharlal Nehru), Paradip, Tuticorin (V.O Chidambarnar) , Visakhapatnam and New Mangalore
3. Calcutta Dock Labour Board
4. Inland Waterways Authority of India
5. Seamen's Provident Fund Organization
6. Indian Maritime University

Societies/Associations

1. Seafarer's Welfare Fund Society.
2. Indian Port Association.
3. National Institute Ports Management.

4. National Ship Design and Research Centre.

Public Sector Undertakings

1. Shipping Corporation of India
2. Cochin Shipyard Limited
3. Dredging Corporation of India
4. Ennore Port Limited
5. Sagarmala Development Company
6. Indian Port Rail and Ropeway Corporation Limited
7. Indian Ports Global Limited(IPGL)
8. Sethusamudram Corporation Limited.
9. Hooghly Cochin Shipyard Limited
10. Central Inland Water Transport Corporation Limited\
11. Hooghly Dock and Ports Engineers Limited
- 1.12 The Organization Chart of the Ministry of Ports, Shipping & Waterways is given at ANNEXURE-II.



Chapter - II

YEAR AT A GLANCE



BACKGROUND

- 2.1 The Maritime Sector in India comprises of Ports, Shipping, Shipbuilding and Ship repair and Inland Water Transport Systems. India has 12 Major ports and about 200 non major ports. Indian Shipping Industry has over the years played a crucial role in the transport sector of India's economy. Approximately 95% of the country's trade by volume and 68% by value is moved through Maritime Transport. Therefore, shipping and ocean resources, ship design and construction, ports and harbours, issues relating to

human resource development, finance, ancillaries and new technologies need to be developed in the light of the emerging scenario. Shipping continues to remain unchallenged as the world's most efficient means of transportation and we need to do all we can to recognize, reward and promote quality within the industry.

GEOGRAPHICAL FEATURES

- 2.2 India has a long coastline of about 7517 km, spread on the western and eastern shelves of the mainland and also along the Islands. It is an important natural resource for the country's trade.

Gross Budgetary Support (GBS) and Internal and Extra Budgetary Resources (IEBR) Outlay For 2018-2019

- 2.3 The Budget Estimate of Gross Budgetary Support (GBS) for FY 2020-2021 was Rs.1800.00 crore for the Ministry. However, at the stage of Revised Estimate

(RE), this has been reduced to Rs. 1433.65 crore. Against the RE allocation of Rs. 1423.65 crore, actual expenditure as on 31.12.2020 was Rs.902.22 crore. Summary of GBS and Internal & Extra Budgetary Resources (IEBR) outlay for 2020-2021 are given below:

(Rs. in Crore)

Sector	2020-2021(BE)		2020-2021(RE)		2020 (Actual Exp.)	
	GBS	IEBR	GBS	IEBR	GBS	IEBR
Ports& Light-houses	601.10	2979.83	513.59	2584.26	315.29	1032.36
Shipping	144.70	735.00	134.70	445	95.53	242.77
IWAI	678.30	0.00	541.20	0.00	360.28	0.00
Others	375.90	0.00	244.16	0.00	131.12	0.00
Total	1800.00	3714.83	1433.65	3029.26	902.22	1275.13

*upto 31st December, 2020

OUTLAY FOR 2019-2020

- 2.4 The details of total GBS and IEBR outlay details for 2021-2022 are given below:-

Sector	2021-2022 (BE)	
	GBS	IEBR
Ports & Light-houses	647.50	4337.12
Shipping	171.25	480.00
IWAI	623.60	0.00
Others	260.00	0.00
Total	1702.35	4817.12

- 2.5 Out of the total GBS of Rs. 1702.35 crore, Rs. 99.10 crore have been earmarked for the North Eastern Region during 2021-2022.

PORt SECTOR

Cargo Traffic at Indian Ports

- 2.6 During 2019-20, major and non-major ports in India handled a total cargo



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throughput of around 1320 Million Tonnes. The traffic grew by 2.98% over the corresponding period of previous year. The 12 Major Ports handled traffic of 414.20 Million Tonnes during April – November 2020, representing a decrease of about 10.68% over the corresponding period of previous year. Of the 12 Major Ports, cargo handled during April – November 2020 only Mormugao Port registered positive

growth of 17.6% over the corresponding period of previous year.

Commodity-wise Cargo Traffic at Major Ports

- 2.7 During 2020-21 upto November 2020, 12 Major Ports handled 414.20 Million Tonnes of traffic as against 463.73 Million Tonnes over the corresponding period of previous year. The composition of the cargo is given below:

(In Million Tonnes)

Year	POL	Iron Ore	F&FRM (Dry)	Coal	Container (In Million TEUs)	Other Cargo	Total
2016-17	208.87	41.77	14.06	135.27	124.66 (8.44)	123.85	648.47
2017-18	224.92	41.17	15.05	141.23	133.73 (9.14)	123.37	679.47
2018-19	233.77	38.81	15.41	163.67	145.52 (9.88)	101.99	699.17
2019-20	240.27	55.51	15.92	149.30	146.88 (9.97)	97.05	704.93
Apr-Nov 2020	127.61	44.71	16.29	79.90	86.37 (5.75)	59.32	414.20

Source: Update on Indian Port Sector (31.03.2020) and Port Data Management Portal

POL includes POL Crude, Products and LPG/LNG

Iron Ore includes Fine and Pellets

F&FRM (Dry) includes Fertilizer, FRM (Dry and Liquid)

Coal includes Thermal, Coking and other Coal

- 2.8 While the commodities viz. POL, Coal, Iron Ore, F&FRM (Dry) and Containers are showing steady growth, there has been steady decrease in traffic of Other Cargo during the last few years. Jawaharlal Nehru Port Trust (JNPT) continued to be the leading container handling port in the country with a share of about 41% followed by Chennai (18%) and the remaining share of 41% being handled by other major ports during 2019-20.

Cargo Traffic at Non-major Ports

- 2.9 The traffic handled at non-major ports which was 485.21 Million Tonnes during 2016-17 increased to 614.99 Million Tonnes during 2019-20 which was 46.5% of the total maritime traffic of the country. The Maritime States namely Gujarat, Andhra Pradesh and Maharashtra accounted for 90.3% of the traffic handled by non-major ports. The cargo traffic handled by non-major ports during April-

November, 2020 was around 362.85 Million Tonnes recording decrease of 9.4% over corresponding period of previous year.

Port Efficiency

- 2.10 Efficiency at ports has an important bearing on the transaction cost. Major ports have improved their efficiency of operation particularly in terms of turnaround time. The Average Turnaround Time improved from 109.44 hours in 2011-12 to 66.24 hours during 2019-20.

Port Capacity

- 2.11 Infrastructure development and capacity augmentation of major ports is an ongoing process. Cargo handling capacity of major ports has increased from 965.36 MTPA as on 31.03.2016 to 1534.91 MTPA as on 31.03.2020. Similarly, Cargo handling capacity of non-major ports has increased from 737.75 MTPA as on 31.03.2016 to 987.98 MTPA as on 31.03.2020. There is adequate capacity build up in Indian ports to cater to the requirement of trade.

Recent reforms/initiatives

- 2.12 **Recent policy reforms and initiatives:** The following initiatives have been taken for improving the efficiency and productivity of Major Ports:

Major Port Authorities Bill

- 2.13 Major Ports Authority Bill 2020 is a Bill to provide for regulation, operation and planning of Major Ports in India and to vest the administration, control and management of such ports upon the

Boards of Major Port Authorities and for matters connected therewith or incidental thereto. The Bill intends to repeal the Major Port Trusts Act, 1963 so as to revamp the administration, control and management of Major Ports in India. Major Ports of India provide a vital link to the economic growth and international trade for our country. The Major Ports handle a vast majority of the imports and exports. Presently Major Ports in India are regulated by The Major Port Trusts Act that was enacted by the Central Government in the 1960's with a view to implement a 'Service Port Model' and under the 'trust' of Board of Trustees. The powers of the Board are limited and there is excessive need for directions on policy matters from the Central Government. The current model of the Board of Trustees has operational restrictions and in the modern economic scenario, the Major Ports are already facing challenges in keeping up with the growth and development in the Ports sector and increased competition from private ports. The Major Port Authorities Bill 2020 has been passed in the Lok Sabha and will be submitted in next session in Rajya Sabha. The salient features of the Major Port Authorities Bill 2020 are as under:-

(a) The Bill is more compact in comparison to the Major Port Trusts Act, 1963 as the number of sections has been reduced to 76 from 134 by eliminating overlapping and obsolete Sections.

(b) The new Bill has proposed a simplified composition of the Board of Port Authority



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- which will comprise of 11 to 13 Members from the present 17 to 19 Members representing various interests. A compact Board with professional independent Members will strengthen decision making and strategic planning. Provision has been made for inclusion of representative of State Government in which the Major Port is situated, Ministry of Railways, Ministry of Defence and Customs, Department of Revenue as Members in the Board apart from a Government Nominee Member and a Member representing the employees of the Major Port Authority.
- (c) The role of Tariff Authority for Major Ports (TAMP) has been dispensed with. Port Authority has now been given powers to fix tariff which will act as a reference tariff for purposes of bidding for PPP projects. PPP operators will be free to fix tariff based on market conditions. The Board of Port Authority has been delegated the power to fix the scale of rates for other port services and assets including land.
- (d) An Adjudicatory Board has been proposed to be created to carry out the residual function of the erstwhile TAMP for Major Ports, to look into disputes between ports and PPP concessionaires, to review stressed PPP projects and suggest measures to review stressed PPP projects and suggest measures to revive such projects and to look into complaints regarding services rendered by the ports/ private operators operating within the ports.
- (e) The Boards of Port Authority have been delegated full powers to enter into contracts, planning and development, fixing of tariff except in the matter of national interest, security and emergency. In the present MPT Act, 1963 prior approval of the Central Government was required in 22 instances.
- (f) The Board of each Major Port shall be entitled to create specific master plan in respect of any development or infrastructure established or proposed to be established within the port limits and the land appurtenant thereto and such master plan shall be independent of any local or State Government regulations of any authority whatsoever.
- (g) Provisions of Corporate Social Responsibility & development of infrastructure by Port Authority have been introduced.
- (h) Provision has been made for safeguarding the pay & allowances and service conditions including pensionary benefits of the employees of major ports and Tariff of Major Ports.
- 2.14 With a view to provide greater autonomy, flexibility and to professionalize the governance of the Major Ports, the above new legislation is being introduced to enable the Major Ports to adopt a competitive business model and implement changes in the evolving market. With the proposed changes in the Major Port Authorities Bill, 2020; the

- administration of Major Ports shall significantly improve and decisions will be taken expeditiously. The Major Ports shall gain autonomy on many key matters including tariffs, development of port assets, master planning of infrastructure within port limits and powers to make regulations for operations of the Major Ports. The Bill also provides for formulation of an Adjudicatory Board that will adjudicate disputes among Major Ports, Public Private Partnership concessionaires and captive users. The Bill also delegates the power of fixation of Schedule of Rates for ports and fixation of tariff to the concessionaire in PPP projects.
- 2.15 The Major Port Authorities Bill, 2020 is expected to usher in a new era for administration of Major Ports in India in which the Major Ports will contribute significantly to the economic growth and provide world-class port infrastructure by adopting Landlord Model of development where the core infrastructure is developed by the Port Authority and the commercial operation are bid out to private players.
- Chabahar Port**
- 2.16 A Memorandum of Understanding (MoU) for development of Chabahar Port by India was signed in Tehran between India and Iran on 06th May 2015 by Minister of Shipping Shri Nitin Gadkari from the Indian side and Minister Dr. Abbas Akhouni from the Iranian side, and thereafter the contract was executed on 23rd May, 2016 at Tehran (Iran) during the visit of Hon'ble Prime Minister of India to Iran. The Contract was signed between Aria Banader Iranian Port & Marine Services Company (ABI) of Iran and India Ports Global Ltd. (IPGL) of India for equipping and operating two terminals at first development phase of Shahid Beheshti- Chabahar Port. The Ports & Maritime Organization of Islamic Republic of Iran (PMO) and Ministry of Shipping, Government of India were the Confirming Parties to the Contract.
- 2.17 In its meeting held on 24.02.2016, the Govt. also approved the proposal of this Ministry for the provision and operationalization of credit of USD 150 Million from EXIM Bank for Chabahar Port Development.
- 2.18 In order to implement Chabahar project, an SPV, India ports Global Ltd was incorporated in January 2015, which was promoted by Jawaharlal Nehru Port Trust (JNPT) and Kandla Port Trust [(now Deendayal Port Trust) DPT].
- 2.19 Since there were challenges in activation of the Main Contract, the foundation of a short period Contract was laid during the visit of His Excellency President of Islamic Republic of Iran to New Delhi in February 2018. Resultantly a formal Short Lease Contract between the two sides was signed on 6th May 2018. For implementation of the same, an SPV India Ports Global Chabahar Free Zone (IPGCFZ) with 98% share holding by IPGL and 1% each by JNPT & DPT was incorporated in Iran. Later, 100% equity shares of JNPT & DPT in IPGL have been purchased by Sagarmala Development Company Ltd. (SDCL) (a company under Administrative control of Ministry of Shipping).



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- 2.20 Government of India has taken-over the operations of two berths at Shahid Beheshti Port, Chabahar, Iran during Chabahar Trilateral Agreement meeting held at Chabahar on 24th December 2018 and has successfully completed one year of operation. Port Office of "India Ports Global Chabahar Free Zone" (IPGCFZ), Indian SPV at Chabahar was also inaugurated jointly by the Head of delegations of India, Iran and Afghanistan.
- 2.21 With this first step a long journey has commenced. By its engagement in Chabahar, India has written a history and is leading the regional cooperation and joint efforts to support land locked Afghanistan. This also fulfils India's long cherished dream of its engagement at Chabahar Port.
- 2.22 Cabinet vide its meeting held on 26.02.2020 has approved this Ministry's note for the exemption from applicability of DPE Guidelines to India Ports Global Limited.
- 2.23 The first consignment of India's humanitarian aid to Afghanistan reached Chabahar on 15th April 2020. It may be noted that total 888 containers of wheat (about 22,800 tons out of total of 75000 tons) have been sent to Afghanistan in three shipments.
- 2.24 The first Trilateral Working Group Meeting between India, Iran and Uzbekistan on joint use of Chabahar Port was held virtually on December 14, 2020. This would open up economic opportunities for the traders and business community of the region. Besides Uzbekistan, other Central Asian countries have also shown interest in using the port virtually on December 14, 2020. India welcomes the interest of Uzbekistan to use the Chabahar port as a transit port. All sides welcomed India's proposal to hold "Chabahar Day" on the sidelines of the International Maritime Summit scheduled to be hosted by India in 2021.
- 2.25 Extension for the Short Lease Contract of Shahid Beheshti Port of Chabahar from June, 2020 to June, 2021.
- 2.26 A consignment of two Mobile Harbour Cranes (MHC) to Iran's Chabahar port has been supplied, with a total contract value of over USD 25 Million under a contract agreement for supply of 6 MHC. The consignment of cranes arrived from Marghera port, Italy has been unloaded successfully on 18th January, 2021 at Chabahar port.
- Major Initiatives/Achievements**
- 2.27 An upgraded Port Community System (PCS) (PCS 1x version) has been implemented. The system enables seamless data flow between the various stakeholders through common interface. Main Objectives of PCS1x are:
- a) Develop a centralized web based application which act as SINGLE WINDOW for secure electronic message exchanges between all stakeholders
 - b) Reduce transaction time and cost in Port's business & overall Logistics cost of the country

- c) Achieve paperless regime in Port sector
- d) Implement an e-commerce portal for Port Community

Facilities:

- a) Towards complete Paperless regime, it facilitates e-DO, e-Payment & e-Invoicing which has already been made mandatory
 - b) It has latch-on facility with all other trade party portals which can be evolved to National Maritime Single Window (NSW) which will reduce delays in physical movement of cargo & transaction time of EXIM trade apart from just being online
 - c) Providing facilities like vehicle booking option, advance notice of traffic to ports, etc. Transportation module (e-Vahan& e-Sarthi) is also an integral part of PCS
- 2.28 Policy Guidelines for Land Management 2014 were issued to all Major Ports for implementation w.e.f. 2.1.2014. Later, some of the provisions of the Land Policy Guidelines, 2014 were further clarified to ease the implementation of the Policy Guidelines by the Major Ports on 17th July, 2015. Many Major Ports had, however, raised various difficulties in implementing some of the provisions of PGLM, 2015 and requested for further clarifications on the same. To accommodate the various difficulties arising with regard to implementation of the guidelines so as to meet the practical exigencies & requirements in public interest, clarifications on these were issued by the Ministry from time to time and all the clarifications issued have been compiled

and have been issued afresh on 29.4.2019. With the objective of further promoting port led industrialisation and ‘Ease of Doing Business’ and the vision of ‘Atmanirbhar Bharat’, new Policy Guidelines for Land Management by Major Ports, 2020 (PGLM 2020) has been prepared and awaiting the approval of the cabinet.

- 2.29 Cabotage Relaxation- Cabotage relaxation of coastal movement of EXIM transshipment containers and Empty Containers, introduced in May, 2018. Order has been issued by the Ministry for relaxation of coastal movement of EXIM transshipment containers and Empty Containers
- 2.30 An Enterprise Business System (EBS) is being implemented at 5 Major Ports (Mumbai , Chennai, Deendayal, Paradip, Kolkata (including Haldia) Port with project cost of approx. 323 crores) to provide a digital port ecosystem that will adopt leading International Practices without losing its alignment to existing local needs.). A total of 2474 processes (ChPT – 671, DPT – 376, KoPT – 501, HDC – 374, MbPT – 278 and PPT – 274) were rationalized, harmonized, optimized and standardized to arrive at a final reengineered process count of 162 processes. All the reengineered processes will be KPI driven and performance of each department and process at higher level will be tracked against defined Key Performance Indicators for each department and process. The proposed EBS will comprise of three core solution components - Port



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Operations Solution, standard ERP solutions, and auxiliary solutions, and would tightly integrate with Port Community System (PCS) and other retained applications of ports. This will completely digitize most processes at ports thus making ports better trade facilitator. Trial Run has been successfully done at ChPt and other remaining ports under progress.

- 2.31 The Union Cabinet has accorded its 'in-principle' approval on February 05, 2020 for setting up a Major Port at Vadhavan near Dahanu in Maharashtra. The total estimated cost of the project is Rs.65,544.54 crore. Vadhavan port will be developed on the "Landlord model". A Special Purpose Vehicle (SPV) will be formed with Jawaharlal Nehru Port Trust (JNPT) as the lead partner with equity participation equal to or more than 50% to implement the project. The SPV will develop the port infrastructure including reclamation, construction of breakwater, besides establishing connectivity to the hinterland. All business activities would be undertaken under PPP mode by private developers.

Deep draft berth at Major Ports

- 2.32 With a view to enable Major Ports to handle larger vessels the Ministry has prepared an action plan for increasing the draft in Major Ports. Most of the Ports now already have a minimum draft of 14 meters and the other Ports are striving to achieve this level. Some of the ports like Paradip,

Kamarajar and Mormugao have plans in hand to increase their drafts well beyond existing drafts.

Ease of Doing Business

- 2.33 The Ease of Doing Business (EoDB) index is a ranking system established by the World Bank Group. Ministry of Ports, Shipping and Waterways is one of the stake holder Ministries in the area of business regulation, "Trading Across Borders" under EoDB. Towards facilitating 'Ease of Doing Business (EoDB)', Ministry of Ports, Shipping and Waterways had identified various parameters for reducing dwell time and transaction costs in the Major Ports. These include elimination of manual Forms, accommodation for laboratories to Participating Government Agencies (PGAs), facilitation of Direct Port Delivery& Entry, Installation of Container Scanners, E-delivery orders, invoice, payments, RFID based Gate-automation System, etc. These initiatives have already been implemented at Jawaharlal Nehru Port Trust (JNPT) as well as at other Major Ports.
- 2.34 The efforts by JNPT in the earlier years have contributed significantly in improvement of India's rank in World Bank evaluation in the parameter of 'Trading Across Border' from 146 in 2018 to 80 in 2019, which has further been reduced to 68 in 2020. This ultimately helped in improving India's rank in overall EoDB from 100 in 2018 to 77 in 2019 and further to 63 in 2020. Continuous efforts are going on to bring India's position among the top 50 nations in EoDB.

Doing Business Report "Year"	Overall EoDB Ranking	Trading Across Border Ranking
2020	63	68
2019	77	80
2018	100	146
2017	130	143
2016	130	133
2015	142	126
2014	134	132

Project Unnati

- 2.35 An international consultant (BCG) was engaged to prepare a Quantitative Benchmarking Module which covered the operational, financial, human resources and efficiency related parameters for benchmarking of efficiency and productivity of Major Ports in India against international standards and define Key Performance Indicators for the ports and terminals. The study covered marine operations, stevedoring, jetty operations, vessel operations Yard performance, Labor productivity, Cargo storage (containers & dry bulk only), rake operations (loading/unloading of rakes), maintenance (Equipment uptime and breakdowns), Gate-In and Gate-out operations, safety, customs and penetration of IT.
- 2.36 The benchmarking study focused on identifying how efficiently capacity is utilized and underlying operational performance metrics across commodities. The low berth productivity and crane productivity across container terminals at Major Ports along with potential to drive 15-20% higher volumes of coal across

ports, just by replicating 'best demonstrated performance' consistently was studied. Potential to double volumes of POL by replicating BDP and reducing non working time and high costs of labour and maintenance dredging across ports was also analyzed.

INLAND WATER TRANSPORT (IWT)

- 2.37 To create a country wide waterways network and to promote inland water transport in the country as an economical, environment friendly supplementary mode of transport to rail and road, 111 inland waterways (including 5 national waterways declared earlier) were declared as National Waterways (NWs) by the National Waterways Act, 2016. NW-1, 2, 3 are operational and vessels are plying on these National Waterways. Fairway development works in Vijayawada – Muktyala stretch of river Krishna (Part of NW-4) have commenced. Development of NW-5 have been initiated by hydrographic surveys and engineering studies through consultants. Offices have been established on NW-1 to 5.



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Recent Initiatives

- 2.38 The major initiatives for development of IWT in 2020-21 are produced below:

Jal Marg Vikas Project (JMVP) on NW-1

- a) Government is implementing the Jal Marg Vikas Project (JMVP) at an estimated cost of Rs. 5369.18 cr. for capacity augmentation of navigation on National Waterway -1 (NW-1) on the Haldia – Varanasi stretch of Ganga-Bhagirathi-Hooghly River System with the technical and financial assistance of the World Bank. The project is scheduled to be completed in December 2023 as per loan agreement. Projects worth Rs. 1800 crores (approx.) have commenced on ground in a time period of three years after statutory clearances.
- b) Under JMVP, construction RCC Jetty of Multi-modal Terminal (MMT) at Sahibganj is completed and inaugurated by Hon'ble Prime Minister in September 2019. Works of MMT Haldia and Navigational lock at Farakkaare proceeding on schedule.
- c) From February 2017 to December, 2020, IWAI conducted eighteen successful pilot

movements of bagged cement, timber logs, fly ash, yellow peas, food products, stone-chips, silica sand etc. between various Origin-Destination pairs on NW-1.

New NWs

- 2.39 Based on the outcome of techno-economic feasibility conducted for 106 new NWs, 36 NWs have been found to be technically viable and Detailed Project Reports (DPRs) have been prepared. Development activities have been initiated on 10 most viable NWs viz., River Barak (NW-16), River Gandak (NW-37), Waterways in Goa-NW-27- Cumberjua, NW-68- Mandovi, NW-111- Zuari, Alappuzha - Kottayam-Athirampuzha Canal (NW-9), River Rupnarayan (NW-86), Sunderbans Waterways (NW-97), River Kosi (NW-58) and River Ghagra (NW-40).
- 2.40 Considering the potential waterways for development as per the categorisation of A, B, C, the following National Waterways are considered in the master plan prepared for development during the FY 2020-2025. SFC memo prepared and submitted to MoPS&W for consideration.

SI No.	Waterway	Name of Waterway	State
1	National Waterway-3	West Coast Canal	Kerala
2	National Waterway-4	Krishna - Godavari River	Andhra Pradesh
3	National Waterway -5	East Coast canal	Odisha
4	National Waterway- 8	Alapuzha - Changanassery canal	Kerala
5	National Waterway-9	Alappuzha - Kottayam - Athirampuzha canal	Kerala
6	National Waterway-68	Mandovi River	Goa

7	National Waterway-111	Zuari River	Goa
8	National Waterway-27	Cumberjua River	Goa
9	National Waterway -86	Rupnarayan River	West Bengal
10	National Waterway -97	Sunderban River	West Bengal
11	National Waterway -57	Kopli River	Assam
12	National Waterway -52	Kali River	Karnataka
13	National Waterway -10	Amba River	Maharashtra
14	National Waterway -44	Ichamati River	West Bengal

International Co-operation

- a) Bangladesh has allowed India use of its Chattogram and Mongla Ports for transit movement of our goods through waterways, rail, road or multi-modal transport in its territory for which a Standard Operating Procedure (SOP) was signed by the two countries on 5.10.2019. The alternative connectivity is expected to boost development of the North East Region (NER) by increasing trade volumes and reducing logistic costs. Eight routes are provided under the Agreement which would enable access of NER via Bangladesh.
- b) India and Nepal have agreed to include Inland Waterways connectivity as an additional mode of transport in the Protocol to the Treaty of Transit. Three multi-modal routes for evacuation of cargo have also been agreed by both countries.
- c) Phase-1 of Kaladan Multimodal Transit Transport Project in Myanmar completed and Phase – 2 commenced by IWAI under Ministry of External Affairs.

SAGARMALA SECTOR

- 2.41 The Sagarmala Programme is the flagship programme of the Ministry of Shipping to promote port-led development in the country through harnessing India's 7,500 km long coastline, 14,500 km of potentially navigable waterways and strategic location on key international maritime trade routes. The main vision of the Sagarmala Programme is to reduce logistics cost for EXIM and domestic trade with minimal infrastructure investment.
- 2.42 Under the Sagarmala Programme, 505 projects at an estimated investment of more than Rs. 3.59 Lac Crore have been identified for implementation upto 2035. Of these, 158 projects (Rs. 83,225 Crore) have been completed and 181 additional projects (Rs. 2 Lac Crore) have been awarded and under implementation. These projects are being implemented by relevant Central Ministries, State Governments, Ports and other agencies primarily through the private or PPP mode.
- 2.43 9 projects have been completed in year 2020;major projects completed are New



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Rail Line from Haridaspur to Paradip, Deep Draft Iron Ore Export Berth on BOT basis at Paradip port, Construction of flyover near North Gate Complex on container road in JNPT, Stage II expansion of Mirkawada Fishing Harbour in Ratnagiri District in Maharashtra, Extension of line No. 11 to 15 to full length at R&D yard at Visakhapatnam Port and Construction of approach road to Kharwadeshwari jetty in state of Maharashtra.

- 2.44 Under the budget head of Sagarmala, a total of Rs. 1,976 Crore has been sanctioned and Rs. 1,246 Crore have already been released for the development and implementation of 101 projects for a total project cost of Rs 5,917 Crore. Out of which, Rs. 94.47 Crore has been released during FY 2020-21.
- 2.45 There are 89 projects worth Rs. 44,014 Crore which are focused on increasing capacity at existing major and non-major ports. Out of which, 44 projects have been completed adding capacity of 234 MTPA

whereas 24 projects are under implementation which are expected to add capacity of 190 MTPA at Major and Non Major Ports of nation.

SHIPPING SECTOR

- 2.46 Shipping is an important indicator of, both, commodity and services trade of any country. It plays an important role in Indian economy and share of sea borne trade to total foreign trade is 64.9%. India's shipping tonnage was only 0.19 Million Gross Tonnage (GT) on the eve of independence. Indian shipping tonnage is 12.75 million G.T. as on December 31, 2019, with the public-sector Shipping Corporation of India Ltd. having (3.20 million GT) having the largest share of 25.1%.
- 2.47 As on December 31, 2019, 41.4% of the Indian fleet was over 20 years of age and 12.6% in the age group of 16-20 years as per Indian Shipping Statistics 2019 (Source : Directorate General of Shipping).

Size and average age of the Indian fleet previous years

As on	Number of vessels	GT	DWT	Increase (%) (In terms of GT)
31.12.2016	1301	11425049	17105292	8.7
31.12.2017	1371	12352441	18792107	8.1
31.12.2018	1400	12683450	19174627	2.7
31.12.2019	1429	12746362	19372122	0.5

Chapter - III

SAGARMALA

“

गुजरात में रो-पैक्स फेरी सेवा जैसी सुविधाओं का विकास करने में बहुत लोगों का श्रम लगा है, अनेक कठिनाइयां रास्ते में आई हैं। मैं उन सभी साथियों का आभारी हूँ, उन तमाम इंजीनियर्स का, श्रमिकों का आभार व्यक्त करता हूँ, जो हिम्मत के साथ डटे रहे।

— प्रधानमंत्री श्री नरेन्द्र मोदी **”**

प्रधानमंत्री श्री नरेन्द्र मोदी जी द्वारा हजीरा-घोघा रो-पैक्स फेरी सेवा का उद्घाटन

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Hon'ble Prime Minister inaugurating Ghogha-Hazira RoPax Service

Introduction – Sagarmala Programme

3.1 Sagarmala Programme has now moved from conceptualization and planning to the implementation stage. As part of the programme, the National Perspective Plan has been prepared and was released on 14th April 2016 at the maiden Maritime India Summit – 2016 by the Hon'ble Prime Minister.

3.2 Under the four project themes of Sagarmala viz. port modernization, connectivity enhancement, port led industrialization and coastal community development, 505 projects have been identified at an estimated infrastructure investment of Rs. 3.59 Lac Crore. Out of these, 158 projects (worth Rs. 0.83 Lac Crore) have been completed and 181 projects (worth Rs. 2 Lac Crore) are already under implementation.



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Summary of projects under Sagarmala Programme

S. No	Project Theme	Total		Completed		Under Implementation	
		#	Project Cost (Rs. Cr)	#	Project Cost (Rs. Cr)	#	Project Cost (Rs. Cr)
1	Port Modernization	211	85,486	87	25,301	57	20,131
2	Connectivity Enhancement	200	1,49,043	43	11,155	82	1,05,672
3	Port Led Industrialization	32	1,19,571	8	45,300	22	73,271
4	Coastal Community Development	62	5,536	20	1,469	20	1,006
	Total	505	3,59,635	158	83,225	181	2,00,079

- 3.3 As part of the Sagarmala, 101 projects (worth Rs.5,917 Crore) have been sanctioned by the Ministry of Ports, Shipping and Waterways at a cost of Rs.1,976 Crore and total fund released is Rs.1,246 Crore till December 2019. List of projects include various port and connectivity infrastructure projects, coastal berth projects, projects of fishing harbors, RoRo and Tourism Jetties, projects related to Cruise and CoastalTourisms, skill development and projects related to technological centers.
- 3.4 Some of the funded projects are unique and innovative in nature such as RO-RO Services Project at Mandwa (Rs. 66.56 Crore sanctioned and released), RO-RO Services at Gogha-Dahej (Rs. 117 Crore sanctioned and Rs. 99.18 Crore released), Fishing harbour at Kulai in Karnataka (Rs. 98.5 Crore sanctioned and Rs. 49.13 Crore released), Fishing Harbour at Karanja in Maharashtra (Rs. 68.15 Crore sanctioned and Rs 61.65 Crore released), Development of Fishing Harbour in Juvvaladinne in SPSR Nellore District in the State of Andhra Pradesh (Rs.72 Crore sanctioned and Rs 18.05 Crore released), Construction of Breakwater and Capital Dredging at Cuddalore Port(Rs. 67.5 Crore sanctioned and Rs 33.75 Crore released), etc. In addition, Ministry has sanctioned the National Maritime Heritage Complex project at Lothal with estimated cost of Rs 478.9 Crore.
- 3.5 Hon'ble PM inaugurated and dedicated ROPAX Service between Ghogha and Hazira on 8th November 2020 which is projected to become gateway between Saurashtra and Southern regions of Gujarat. This ferry service would reduce the distance between Gogha and Hazira by 370 km. With 03 trips per day, it would annually transport about 05 lacs

passengers, 80,000 passenger vehicles, 50,000 two wheelers and 30,000 trucks.

- 3.6 The Sagarmala Development Company Limited (SDCL) was incorporated on 31st August 2016, after receiving Cabinet approval on 20th July 2016, for providing funding support to project SPVs and residual projects under Sagarmala. SDCL has identified a few SPVs for the purpose of equity investment in-line with Sagarmala objectives.
- 3.7 SDCL has invested equity support of Rs.125 Crore and Rs.284.5 Crore in

Krishnapatnam Rail Company Limited (KRCL) and Haridaspur-Paradip Railway Company Limited (HPRCL), government majority-owned SPVs, to improve connectivity to Krishnapatnam Port and Paradip Port respectively. SDCL has also invested Rs. 70 Crore equity in 2 other projects. SDCL has taken over Indian Ports Global Limited (IPGL) in 2018-19 and invested approx. Rs. 10 Crore for development and operations of Chabahar Port in Iran.



Figure: New Rail line from Haridaspur to Paradip



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Figure: Krishnapatnam-Obulavaripalli Railway Project - longest electrified tunnel in Indian Railways



Figure: Satellite Image of Chabahar Port, Iran

3.8 In addition to above, SDCL is evaluating another 11 projects for investment in coming years. List includes innovative projects such as Re-modelling Gateway of India Radio Club Jetty, Water-Taxi services in Mumbai, Thane and Navi Mumbai, Ropeway services at Kanyakumari, etc.

Port Modernization & New Port Development

3.9 As per the studies conducted under the Sagarmala Programme, it is expected that by 2025, cargo traffic at Indian ports will be approximately 2500 MMTPA while the current cargo handling capacity of Indian ports is only 2406 MMTPA. A roadmap has been prepared for increasing the Indian port capacity to 3000+ MMTPA by 2024 to cater to the growing traffic. This includes port operational efficiency improvement, capacity expansion of existing ports and new port development. There are 211 projects worth Rs. 85,486 Crore of port modernization. Out of which, 87 projects worth Rs. 25,301 Crore have been completed and 57 projects worth Rs. 20,130 Crore are taken up for implementation.

3.10 Under this pillar, there are 89 projects worth Rs. 44,014 Crore which are focused on increasing capacity at existing major and non-major ports. Out of which, 44 projects have been completed, 24 projects are under implementation and 21 projects are under various stages of development. Completed projects have added capacity of around 234 MTPA whereas projects under implementation are expected to add capacity of around 190 MTPA at Indian ports.

3.11 2 new port locations have been identified for development of greenfield ports. One at Vadhavan (Maharashtra) and another at Western Dock at Paradip Port. Project of Development of Port at Vadhavan approved by the Union Cabinet on 05 February 2020. Various studies are in progress as compliance process for obtaining Environment Clearance from MOEF&CC. Project of Western Dock at Paradip Port is under consideration of the Cabinet Committee on Economic Affairs.

Port Connectivity Enhancement

3.12 Indian Port Rail Corporation Limited (IPRCL) has taken up 31 projects worth Rs. 1,829 Crore. Out of these, 17 works worth Rs 364 Crore have been completed and 14 works worth Rs 1,465 Crore are under implementation.

3.13 54 rail connectivity projects (Rs. 71,650 Crore) are being taken up by Ministry of Railways and 3 projects (Rs. 1,300 Crore) are taken up either in Non-Government Rail (NGR) or JVs. 25 projects (Rs. 1,941 Crore) are being taken up by major ports. Out of the total 81 rail projects (Rs. 74,591 Crore), 26 projects (Rs. 7,132 Crore) have already completed, 48 projects (Rs. 65,770 Crore) are under implementation and 7 projects (Rs 1,689 Crore) are under various stages of development.

3.14 Total 88 road connectivity projects have been identified under Sagarmala by MoRTH, NHAI, State PWDs and Port Trusts. 10 projects (Rs. 1,491 Crore) have been completed, 20 projects (Rs. 19,912 Crore) are under implementation, 58 projects



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(Rs. 22,179 Crore) are under various stages of development.

- 3.15 5 projects (Rs.7,720 Crore) undertaken by MoRTH. Of which, 3 projects are under implementation. 62 projects are undertaken by NHAI, of which, 3 projects (Rs.217 Crore) have been completed, 10 projects (Rs.11,793 Crore) are under implementation. 16 projects are undertaken by Port Trusts, out of which, 4 projects (Rs.146 Crore) have been completed and 6 projects (Rs.739 Crore) are under implementation. 5 projects are undertaken by State PWDs, out of which, 2 projects (Rs.828 Crore) completed, 1 project is under implementation. Out of the total 88 road connectivity projects, 59 projects (Rs.19,332 Crore) are proposed to be implemented under Bharatmala Pariyojna.

- 3.16 To promote Coastal Shipping, Ministry of Ports, Shipping and Waterways has taken number of steps facilitating trade. Some of these are implementing a Coastal Berth Scheme , relaxation u/s 406/407 for easier licensing requirement for chartering

vessels for coastal movement of EXIM/empty containers, agricultural and horticulture commodities, animal husbandry products and farm produce and fertilizers. Cabotage has been relaxed for 5 years for specialized vessels (RO-RO, RO-PAX).

- 3.17 The scope of the Coastal Berth Scheme has been extended up to March 2021. A total of 39 projects (Rs. 1,569 Crore) have been taken up for financial assistance under this scheme. These projects have been sanctioned for total financial assistance of Rs. 636.7 Crore and Rs. 367.34 Crore has been released to Major Ports/State Maritime Boards/State Governments.
- 3.18 Coastal shipping traffic has picked up grown since 2015-16. Coastal shipping has registered growth at CAGR of 10.04% from 2015-16 to 2019-20. At the start of Sagarmala Programme coastal cargo was ~83 MTPA while in 2019-20 this has grown to 122 MTPA%. Further with the policy and infrastructure interventions, it is expected to reach 200 MT by FY 2024-25.

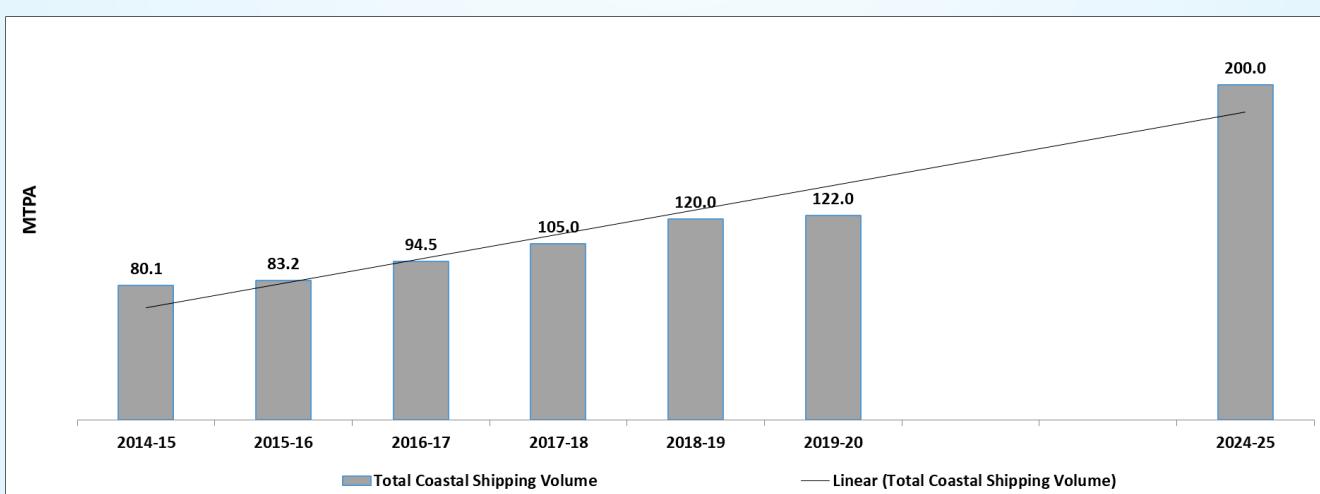


Figure: Trend of Coastal Shipping in India (in MTPA)

3.19 The Ministry of Ports, Shipping and Waterways has partnered with Asian Development Bank (ADB) for carrying out coastal shipping study for development of perspective plan for transport of various commodities through coastal route. The core objective of this study is to identify key issues impacting coastal shipping and developing solutions to address these issues in order to make coastal shipping a more prominent mode of transport in India's domestic logistics. The study reported significant growth in coastal shipping for various commodities and projects around 340 MTPA by 2025 including short sea shipping with neighboring countries basis and has made recommendations on necessary interventions. Ministry of Ports, Shipping and Waterways is taking necessary

steps/actions on possible resolutions in coordination with respective ministries, state government, and authorities of major and non-major ports.

Port-Linked Industrialization

- 3.20 Based on availability of land with the Major Ports, Ministry of Ports, Shipping and Waterways is developing various industrial zones. SEZ at JNPT (Rs. 12,554 Crore), Smart Industrial Port Cities (SIPC) at Paradip (Rs. 7,600 Crore) & Kandla (Rs. 11,147 Crore) are under implementation. The Coastal Employment Units (CEUs) at VoCPT (Rs. 500 Crore) is under development.
- 3.21 As a part of SIPC project at Paradip Port, land measuring 700 acres is being developed for the purpose of industrialization. Some of the land has

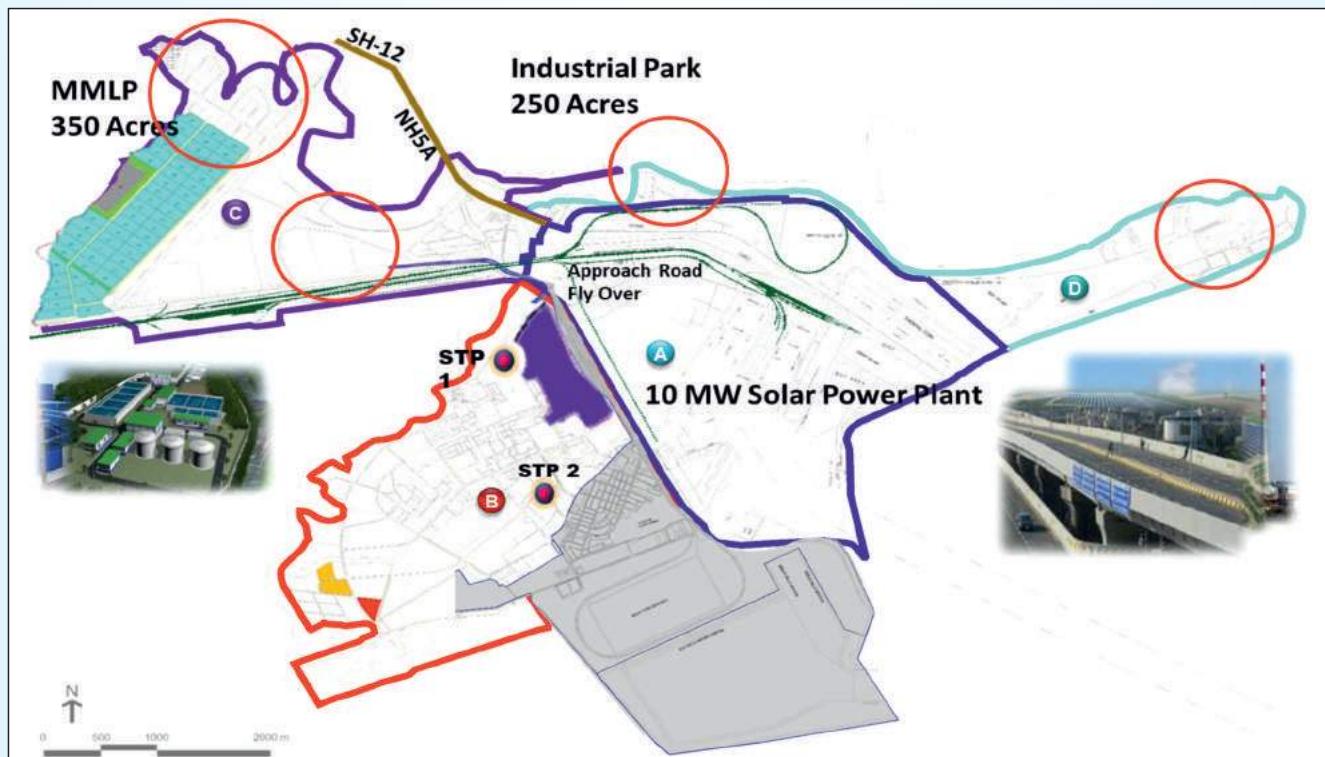


Figure: Layout of Smart Industrial Port City at Paradip



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already been allotted to units for development of MMLP, Plastic Park, Pellet Plant, Tanking Facilities, LPG Handling, etc. Wood Park, Food Processing and Steel Plant are at auction stage. Deendayal Port is developing SIPC on 1430 acre at two green field sites: Location 1 will be a 580 acre Smart urban township and Location 2 will be 850 acre Modern industrial zone. Both locations will have residential area, commercial area, public & semi-public area, green & recreational area, trucking & parking space and area for utilities/services.

Coastal Community Development

3.22 Coastal community development is an important objective of the Sagarmala Programme. In this regard, Ministry of Ports, Shipping and Waterways is taking up a number of initiatives/projects in the areas of coastal community skill development and development of fishermen community. A budget of Rs. 100

Crre has been allocated under Sagarmala for coastal community development activities.

3.23 On the skill development front, skill gap study of 21 coastal districts (spread across 9 states and 3 UTs), has been completed and domain ministries & concerned state governments have been asked to implement the district action plans. In addition, Ministry of Ports, Shipping and Waterways is funding skill development under Sagarmala-DDU-GKY Convergence programme for port and maritime sector. Training centres were operationalized in Kerala, Andhra Pradesh and Tamil Nadu and funds have also been released to Maharashtra, Gujarat and West Bengal. The Ministry has also signed MoU with Ministry of Skill Development and Entrepreneurship and Ministry of Rural Development for convergence in Skill development efforts.



Figure: Skill development undertaken by MoPSW in convergence with MoRD

- 3.24 Centre of Excellence in Maritime and Shipbuilding (CEMS), a first of its kind in Asia with two campuses with 24 laboratories in total (6 laboratories in IRS Mumbai and 18 in Indian Maritime University campus in Vishakhapatnam) has been setup. CEMS will provide 50 courses across 18 specializations; covering 770 modules out of which 270 will be tools and algorithm-based courses while 500 will be process and sector based. It can train 10,512 students and runs on a Hub and Spoke Model with majority funding

from private sector. The total project cost is Rs. 766 Crore and the Ministry of Ports, Shipping and Waterways has sanctioned Rs. 50.07 Crore towards setting of the CEMS. CEMS is equipping students with employable engineering and technical skills in the areas of Ship Hull Design, Ship Detailed Design, Shipbuilding & Maintenance, Repair & Overhaul (MRO), Product Lifecycle Management (PLM), and advanced digital manufacturing-factory concepts.



- 3.25 Ministry of Ports, Shipping and Waterways has set up the National Technology Centre for Ports, Waterways and Coasts (NTCPWC), at IIT Madras to provide innovative and applied research-based engineering solutions to various issues

related to ports, waterways and coasts in the country. The project cost of Rs 70.53 Crore is being shared by MoS, IWAI and the Major Ports. NTCPWC is working as the technology arm of the Ministry.



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- 3.26 A Centre for Inland and Coastal Maritime Technology (CICMT) at IIT Kharagpur has been set up to serve as the technology arm of the Ministry of Ports, Shipping and Waterways to provide research, testing and experimentation facility to IWAI, CSL and major ports. MoU between IIT, Kharagpur & Ministry of Ports, Shipping and Waterways for CICMT signed in July 2019 and MoU between CICMT and DST Germany was signed during the bilateral visit of Chancellor, Germany in November 2020. The cost of the project is Rs.69.20 Crore and it is funded by Ministry of Ports, Shipping and Waterways.
- 3.27 Ministry of Ports, Shipping and Waterways is also funding the Occupational Health and Safety training project for workers at Alang-Sosiya Shipyard. Since 2017 around 23,000 workers have been trained at Alang. In addition to this, a specialized hospital is now operational in Alang. This will ensure immediate response and care to the workers in the yards, particularly for orthopedic and burn injuries.



Figure: Hon'ble Minister of State launched 'Indigenous Software Solution for VTS and VTMS' developed by NTCPWC



Figure: Occupational health and safety training undertaken at Alang-Sosiya shipyard

3.28 Ministry of Ports, Shipping and Waterways is setting up Multi-skill Development Centres (MSDC) in major ports to meet the skills requirement in the ports in the logistics, cruise tourism etc. MSDC is now

operational in JNPT, Chennai Port and Visakhapatnam Port. Operationalization process is underway in New Mangalore Port.



Figure: MSDC building at JNPT



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National Master Plan

- 3.30 DPIIT / NICDC have been given the mandate to prepare the National Master Plan (NMP) with Economic Zones integrated with multimodal connectivity network at a national level. In this regard, MoPSW prepared National Master Plan for maritime sector covering development of new ports, actual and expected growth in cargo traffic, expected expenditure and port led industrialization on land available with Indian ports.
- 3.31 By 2024, cargo traffic at Indian ports is expected to be around 1,750 MMTPA. Considering ~60% of utilization, capacity of Indian ports needs to be targeted around 3,000 MMTPA. Roadmap for achieving target includes port operational efficiency improvement, capacity expansion of existing ports and new ports development. It also includes development of dedicated

terminals to handle specific type of commodities which includes, coal, containers, fertilizers, cement, general cargo, etc.

- 3.32 There are 101 projects (cost: Rs.62,572 Crore) identified for implementation by 2024 and considered part of National Master Plan (NMP). Of which, 56 projects are being implemented at major ports and remaining 45 are being implemented at non-major ports by central government / state government / private entities. There are 51 projects worth Rs.52,956 Crore which are being implemented on PPP basis. Other than those, there are 50 projects worth Rs.9,616 Crore which are being implemented on EPC mode.

Potential Impact

- 3.30 The projects identified under Sagarmala Programme are expected to mobilize more than Rs. 3.59 Lac Crore of infrastructure



Figure: Creative on Ghogha-Hazira RoPax Service in Gujarat

- investment; double the share of domestic waterways (inland & coastal) in the modal mix, generate logistic cost savings, boost merchandise exports and enable creation of new jobs, including both direct and indirect jobs.
- 3.31 Initiatives under Sagarmala have helped in increasing / unlocking capacity ports, thus resulting in lower turn-around time, lower dwell time and reduction in logistics costs. Average Vessel Turn Around Time (TRT) of ships at Major Ports have been reduced from 82 hours in 2015-16 to 61 hours in 2019-20 with increase in Average Ship Berthday Output(gross tonnage) from 13,156 MT to 16,433 MT in the same period. Average Vessel Turn Around Time for Container Vessels have reduced from 44.64 hours in 2015-16 to 32 hours in 2019-20. Dwell Time for import and export containers have also significantly reduced.
- For example, at JNPT, dwell time for import container evacuated by road has reduced from 50.82 hours in 2017-18 to 20.4 hours in 2019-20.
- 3.32 Road and rail projects planned and completed till date have resulted in smoother and more efficient cargo movement, thereby reducing logistics costs. Fishing harbour projects as well as skill development initiatives have resulted in enhancing the income opportunities for coastal communities. Projects of RoPax ferry services reduce travel time between two locations enabling swift change of mode of transport from Road and Rail to Waterways. RoRo and RoPax services will help in reducing CO₂ emission with huge savings on fuel. These projects would also open new avenues in coastal shipping & tourism and help in socio-economic welfare in its vicinity.



Chapter - IV

POR TS



INTRODUCTION

- 4.1 Ports provide an interface between the ocean transport and land-based transport. There are 12 Major Ports in India out of which 6 are located on the East Coast and 6 on the West Coast.



MAJOR PORTS IN INDIA

KOLKATA PORT

- 4.2 Kolkata Port is the only riverine major port in India having an existence of 150 years. It has a vast hinterland comprising the entire Eastern India including West Bengal, Bihar, Jharkhand, Uttar Pradesh, Madhya Pradesh, Assam, North East Hill States and the two landlocked neighbouring countries namely, Nepal and Bhutan. The port has twin dock systems viz. Kolkata dock System (KDS) on the eastern bank and Haldia Dock Complex (HDC) on the western bank of river Hooghly.
- 4.3 SMP, Kolkata handled highest volume of traffic of 63.983 Million Tonnes (MT) in 2019-20. While KDS handled traffic of 17.303 Million Tonnes (MT), HDC recorded the highest ever traffic of 46.680 Million

Tonnes (MT) in 2019-20. SMP Kolkata handled 43.211 Million Tonnes (KDS: 10.615 MT and HDC: 32.596 MT) during April-December 2020-21.

Notable achievements during the year

- a) SMP, Kolkata took a vibrant part in the opening year of its sesquicentennial Celebrations. The Hon'ble Prime Minister of India, Hon'ble Union Minister of Ports, Shipping & Waterways (IC), in presence of other dignitaries, graced the occasion on 11.01.2020 at a curtain raiser event at Millennium Park where Dynamic Light & Sound Show of Rabindra Setu (popularly known as Howrah Bridge) was launched with its history showcased through a spectacular water screen projection. This was followed by laying of Foundation Stone of an installation commemorating 150 years of the port.





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PARADIP PORT

- 4.4 Paradip Port is one of the major ports in India. Government of India took over the management of the port from the State Government on 1st June, 1965, and declared Paradip Port Trust (PPT) as the eighth major port in India on 18th April, 1966 making it the first major port in the East Coast commissioned in independent India. Paradip Port is situated 210 nautical miles south of Kolkata and 260 nautical miles north of Visakhapatnam at Latitude 20 – 15'58.63 N and Longitude 86’ – 40-27".34 E.
- 4.5 The Port handled 82.44 Million Tonnes (MT) of traffic in 2020-21 (upto December, 2020). The port has Seventeen (17) berths/jetties + Three (3) SPMs& One (1) Ro-Ro Jetty) for handling different types of cargoes with an effective Rated capacity of 259.50 MTPA and Desired capacity of 182.25 MTPA.

Notable achievements during the year

- a) In spite of the obstacles due to the Covid-19 pandemic situation, could post 25.73 Million tonnes of Cargo handling mark and moved in to No. 1 spot among all the Major Ports in the Country during First Quarter (i.e. April–June) in the Current fiscal.
- b) PPT achieved all Time Record unloading of 39 Rakes and becomes #1 unloading Terminal of Indian Railways. Along with this MCHP also clocked record unloading of 26 Rakes on 17.04.2020.
- c) After undergoing renovation, EQ3 berth received its first Baby Cape vessel MV ANGLO JESSICA with LOA - 255 Mtr. and 95,000 MT Iron Ore(con) cargo on 05th November' 2020.
- d) New Iron Ore Export Berth of Capacity 10 MTPA, developed on BOT basis by M/s. JSW, is operational since November' 2019.



In the current fiscal, till December' 2020, about 5.86 Million tonnes of Iron ore / Iron Ore pellet traffic has been handled through the Terminal.

- e) The Cabinet Committee on Economic Affairs chaired by Hon'ble Prime Minister Shri Narendra Modi has approved the project 'Deepening and Optimization of Inner Harbour Facilities including Development of Western Dock on Build, Operate and Transfer (BOT) basis under Public-Private Partnership (PPP) mode to handle cape size vessels at Paradip Port'. The proposed project envisages Construction of Western Dock Basin with facilities to handle Cape Size vessels by the selected BOT Concessionaire with an ultimate capacity of 25 MTPA (Million tonnes per annum) in two phases of 12.50 MTPA each. PPT issued a Global Tender for the project of "Deepening and Optimization of Inner Harbour Facilities including Development of Western Dock on Build, Operate and Transfer (BOT) basis under Public-Private Partnership (PPP) mode to handle cape size vessels at Paradip Port". PPT has invited applications from the interested parties in accordance with the qualifications (RFQ).

NEW MANGALORE PORT

- 4.6 New Mangalore Port was declared as the 9th Major Port on 4th May 1974 and was formally inaugurated on 11th January 1975. The Port has 16 berths and 1 SPM (Single Point Mooring) with a rated capacity of 112.51 MTPA. It handled traffic

of 25.79 million tonnes during the year 2020-21 (upto December 2020). NMPT has plans for development of one more deep draft multipurpose general cargo berth (Berth No.17) adjacent to the existing berth no.8 for handling general break bulk cargo and Ro-Ro consignments.

Notable achievements during the year

- a) The Port has streamlined delivery of bulk/coastal cargo by permitting the C&F agents to take alongside delivery of cargo which has significantly contributed to reduce TRT of Truck/Trailer movement, fuel and manpower requirement. In addition to the above, this has also helped to minimize the documentation for hassle-free clearing of cargo from the Port. For the first time in the history of the port, a record dispatch of 4036 metric tonnes of Fertilizer from the Port was achieved in a single day on 03.11.2020 as a result of the above step taken by the Port.
- b) Due to water harvesting to the fullest extent, NMPT has become self-sufficient in water supply for the first time in port history.
- c) The Port has reached the milestone of 100% solarisation by generating the full amount of energy required for port operations through the solar panels. The port has established a solar power plant (ground as well roof mounted facilities) with a total of 5.19 MW/annum power generation capacities in the previous years as part of its efforts to contribute towards a green environment.



NMPT has achieved 100% Solarisation

COCHIN PORT

4.7 The modern Port of Cochin was developed during the period 1920-1940 due to the untiring efforts of Sir Robert Bristow. The port of Cochin is located on the Willington Island at Latitude 9°58' North and 76°14' East on the South-West coast of India about 930 KM south of Mumbai and 320 KM North of Kanyakumari. With its strategic location on the South-West Coast of India and at a commanding position at the cross roads of the East-West Ocean trade, the port is a natural gateway to the vast industrial and agricultural produce markets of the South-West India. The hinterland of the Port includes the whole of Kerala State and parts of Tamil Nadu and Karnataka States. A study carried out on the traffic flow in the hinterland of the Port indicates that about 97% of the total volume of traffic is accounted for by Kerala State. Cochin with its proximity to the international sea route between Europe

and the Far East and Australia can attract a large number of container lines offering immense business opportunities.

4.8 Cochin Port has 21 Berths including 1 SPM with an effective rated capacity of 73.67 MTPA. The Port handled 34.04 Million tonnes cargo traffic during 2019-20. The cargo handled by the port includes POL, Iron Ore, Fertilizers, Fertilizer Raw Material (Dry) and others.

4.9 Cochin Port registered the total throughput of 21.39 MMT in 2020-21 (Apr-Dec), a decline of 14.44% over the same period of 2019-20. POL throughput registered 12.37 MMT, a decline of 24.44% over the corresponding period of 2019-20. Containers that exhibited a recovery trend in the past few months reached the throughput of 4.78 lakh TEUs in 2020-21 (Apr-Dec), registering the growth of 2.51% over the corresponding period of 2019-20. Significantly, Cochin Port has recorded the highest ever monthly throughput of 3.20

MMT in December, 2020, a growth of 10.55% over December, 2019. Also, the ICTT has crossed 60,000 TEUs consecutively in the past four months, embarking on a new growth trajectory.

Notable achievements during the year

- a) The Port achieved an all time high cargo throughput of 34.04 million metric tonnes during the year 2019-20 recording an impressive growth of 6.31% over 2018-19. Container traffic grew by 4.20% during the same period.
- b) As part of Samudra Setu Operations, CoPT facilitated berthing of three Indian Navy Ships carrying 698, 202 and 568 evacuees from Maldives on 10.05.2020, 12.05.2020 and 17.05.2020 respectively. CoPT extended support to District Administration for the smooth operation of the above.
- c) Cargo Ferry Service was inaugurated between India & Maldives, at Cochin Port Trust on 22-09-2020.
- d) Cochin Port Trust offices functioned during February & March abiding by the Government of India instructions to contain the spread of Covid-19 pandemic. As per the Ministry's direction all the foreign cruise calls have been cancelled till 31-03-2020 and all the SOPs to handle international cruise ships are being followed further, Cochin Port has cancelled the proposed bunkering conference scheduled to be held on 13-03-2020. In order to minimize the impact of this disease, an awareness campaign has been organized by Port hospital and leaflets

have been distributed among port employees and trade communities associated with port operation. In the Cochin Port Trust Hospital top floor of new block is kept ready as isolation ward with 10 rooms. All suspected cases with history of travel are being sent to District Hospital/approved lab for swab test and then to Medical college if found positive. Other suspected cases are advised strict home quarantine. Regarding passengers coming to Cochin Port, the details are being sent essential employees are posted for day today activities of port, and arrangements made for others to work from home.

MoU between MPEDA & CoPT for taking up the project " Modernisation of Kochi Fisheries harbor" at a cost of Rs. 140 cr. has been executed on 28/09/2020.

JAWAHARLAL NEHRU PORT

- 4.10 Constructed in the mid 1980's and commissioned on 26th May, 1989, Jawaharlal Nehru Port has come a long way by becoming a world-class international container handling port. It is situated in between 18 56'43" North and 72 56'24" East along the eastern shore of Mumbai harbour off Elephanta Island.
- 4.11 Jawaharlal Nehru Port is an all-weather tidal Port having 15 berths with an effective rated capacity of 118.00 MTPA. The Port handled a Traffic of 44.74 Million Tonnes during 2020-21 (upto December-2020) of which containersied cargo account for 39.86 Million tons shich is 89.09% of total traffic . The port has 5fully



automated Container Terminals with a total container handling capacity of 7.7Million TEUs, a Liquid Terminal of 7.2 Million Tons capacity and a shallow water berth having capacity of 4.5Million tons for handling container,break bulk,dry bulk and liquid cargo . Four of the Container Terminals are operating in PPP format in partnership with major global terminal operators, namely, DP World (2 terminals), AP Moller Terminals (APM terminals), and Port of Singapore Authority (PSA).A new Container Terminal ,Bharat Mumbai Container Terminal Pvt. Ltd. (BMCTPL), SPV of Port of Singapore (PSA) with a total capacity of 60 million tonnes (4.8 million TEUs)was commissioned for operations under Phase -1 (2.4 million TEUS) on 18th February 2018. Phase-II(2.4 million TEUs) is expected to start in 2026.

MUMBAI PORT

- 4.12 Mumbai Port is the second oldest Major Port in India after Kolkata. The port has long been the principal gateway of India. Strategic location is one factor in its special favour. It lies midway along the West Coast of India and is gifted with a natural deep-water harbour of 400 Sq. Kms. protected by mainland of Konkan on its east and island of Mumbai on its west. The deep waters in the harbour provide secure and ample shelter for shipping throughout the year.
- 4.13 Originally a general cargo port, today Mumbai Port is multi-purpose ports handling all types of cargo viz break bulk, dry bulk, liquid bulk and containers. The port has extensive wet and dry dock

accommodation to meet the normal needs of ships using the port. The port provides services/facilities from pilotage to berthing, storage to delivery of cargo and ancillary services of running Container Freight Station (CFS), Port Railways as also maintenance of crafts, equipment and building.

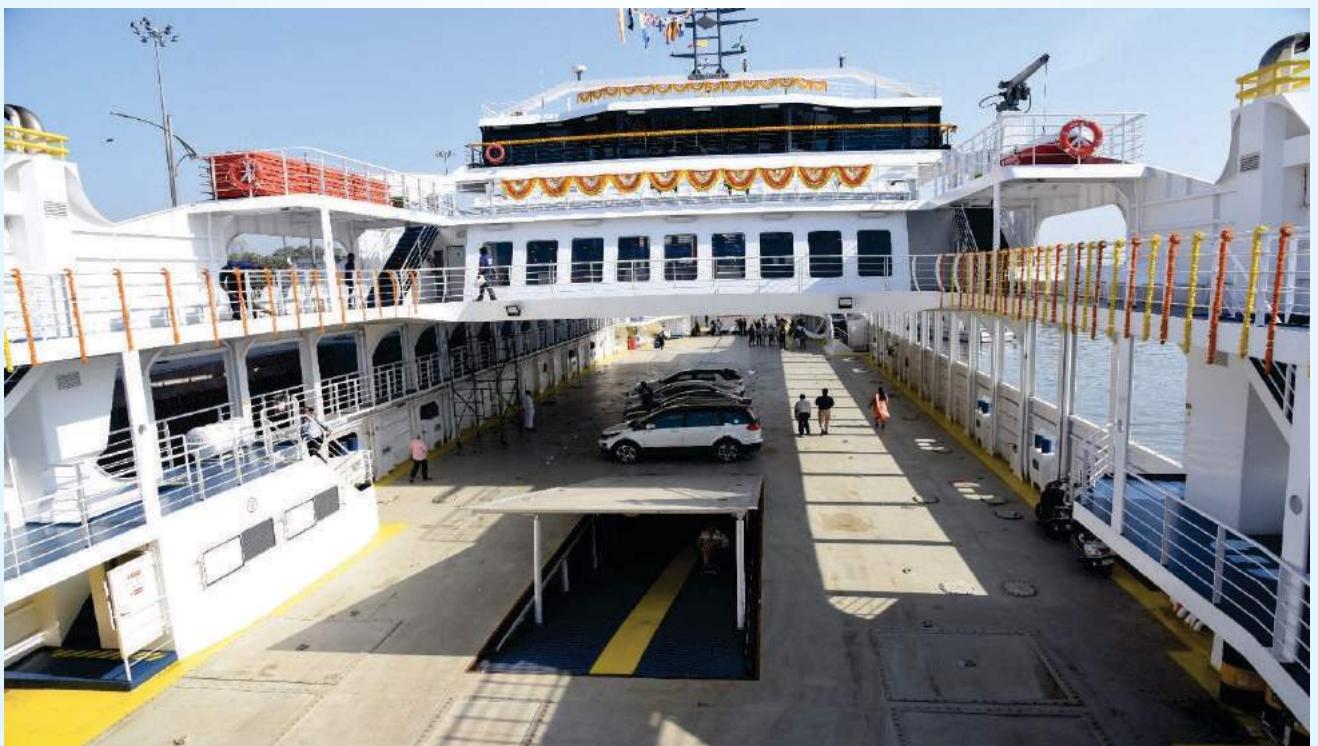
- 4.14 The port has 32 berths (including OCT) with an effective rated capacity of 77.85 MTPA. The port handled traffic of 38.03 million tonnes during 2020-21 (upto December, 2020). The major cargo commodity handled is POL (64.38 % of the total traffic).

Notable achievements during the year

- a) Union Ministry of Ports, Shipping & Waterways and Mumbai Port Trust in association with Maharashtra Maritime Board, Government of Maharashtra conceived a project of Ro-Pax service between Mumbai and Mandwa in 2016. The Ro-Pax service between Mumbai and Mandwa finally commenced from 15.3.2020. The ferry service reduced the time taken from Mumbai to Mandwa from 4 hrs. 15 minutes to nearly 45 minutes and the distance from 110 kms. to nearly 18 kms. The facility will help in a big way to reduce the traffic congestion on the Mumbai-Goa highway, save cost of fuel consumption, reduce the carbon emission to a large extend and will bring the adjoining areas of Mandwa and Alibaug closer to the city of Mumbai. The Ro-Pax service will be operational during monsoon also.



Shri Mansukh Mandaviya, Hon'ble Minister for Ports, Shipping & Waterways inspecting the Ro-Pax Ferry M2M along with Shri Sanjay Bhatia, IAS, Chairman Mumbai Port Trust on 15.3.2020



Ro-Pax (Mumbai-Mandwa) Passenger Ferry was launched on 15.3.2020



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KAMARAJAR PORT LIMITED (ENNORE)

- 4.15 Kamarajar Port Limited (KPL), the 12th Major Port under the Ministry of Shipping was commissioned in 2001, primarily as a Coal Port dedicated to handling Thermal Coal requirements of Tamil Nadu Electricity Board (TNEB). KPL has the distinction of being the only corporate port amongst the Major Ports administered by the Central Government. The Port is functioning on landlord model with cargo handling operations either through BOT or captive models. As a part of disinvestment process, the entire Government of India shares have been transferred to Chennai Port Trust on 27.03.2020. KPL has become a subsidiary of Chennai Port Trust.
- 4.16 Over the years, the port, which was primarily handling coal at initial stage, has developed as a multi cargo port and now has seven berths with handling capacity of 54.44 MTPA for handling coal, POL, LPG, LNG, automobile units, Containers and general cargoes. The Port handled traffic of 17.19 MT during FY 2020-21 (upto December)

Notable achievements during the year

- a) The Hon'ble Minister of Home Affairs, Government of India, laid the foundation stone on 21.11.2020 for IOCL Captive Jetty of 3 MTPA capacity involving an investment of Rs 921 Crores for handling of POL and LPG cargo at KPL.
- b) Kamarajar Port got an opportunity to attract the Transshipment Container cargo due to delays encountered by the Shipping Lines in Colombo Port. It is a matter of

pride for Kamarajar Port that m.v. MSC Faith having capacity of 14,336 TEUs called on Kamarajar Port on 11th November, 2020. This is the largest transshipment vessel that has ever called on any East Coast Port of India.

c) Kamarajar Port handled the highest Container volume of 28,040 TEU's in December 2020 comprising of 10,842 TEU's of Transhipment. This is in line with the initiatives taken by the Ministry to attract transshipment vessels to Indian Ports from Ports like Colombo, Singapore, Jebel Ali, etc.

CHENNAI PORT

- 4.17 Chennai Port is an all weather artificial harbour with one Outer Harbour and one Inner Harbour with a wet Dock and a Boat Basin with round the clock navigation facilities. The Port was established in 1875 located at 13° 06' N latitude and 80° 18' E-longitudes on the Bay of Bengal.
- 4.18 Chennai Port has 24 berths with an effective rated capacity of 134.6 MTPA. Chennai Port handled a cargo tonnage of 46.76 million tonnes during 2019–2020 as against 53.01 MMT handled during the corresponding period of last year. During the current year, tonnage handled upto December 2020 is 30.50 million tonnes, which comprises of 19.46 million tonnes of Imports, 11.04 million tonnes of Exports. 1,383,971 TEUs of containers were handled, whereas in the previous year 1,619,857 TEUs were handled. The cargo tonnage handled in containers has been 26,710,640 and 31,263,240 tonnes

respectively during 2019–2020 and 2018–2019. During the current year 2020–2021, 959,645 TEUs with a cargo of 18.52 million tonnes have been handled upto December 2020. The total number of vessels called at the Port including Government vessels during 2019–2020 were 2295 and the same for 2018–2019 being 2479. This year upto December 2020, 1381 vessels called at the Port.

Notable achievements during the year

- a) Chennai Port has achieved another record in handling highest parcel size of 49,977 Tonnes of Steel on 06.06.2020 through m.v. Intrepid surpassing the previous record of 41,648 Tonnes handled by m.v. Sea Champion on 16.12.2017.
- b) M.T. BRITISH LISTENER a LNG Tanker Vessel with 115366 GRT, LOA of 294.90m arrived from Singapore to Chennai Port Anchorage on 12.06.2020 carried out Sign ON/OFF by disembarking 22 Indian Crew and embarking 24 Indian Crew, following the Standard Operating Procedures issued for Sign ON/OFF during the pandemic period. The vessel sailed on 15.06.2020 for Port of Yeosu, South Korea.
- c) Chennai Port has set another landmark achievement by handling 1,14,000 Tonnes of Crude Oil on 21.06.2020, from the vessel M.T. MOUNT FUJI carrying 1,32,007 Tonnes through the 42" diameter pipeline from Bharathi Dock (BD-III) to CPCL refinery in Manali. The above achievement surpasses the previous record of 1,13,000 Tonnes discharged from the vessel M.T. SIKINOS at BD- III on 01.06.2019.
- d) Chennai Port has achieved another record in handling highest parcel size of 56994 Tonnes of Export Steel on 26.06.2020 through m.v. Qing Ping Shan (sailing under Hongkong flag) surpassing the previous record of 49,977 Tonnes of Steel parcel handled on 06.06.2020 through m.v. Intrepid.

MORMUGAO PORT

- 4.19 Mormugao Port, situated on the west coast of India, is more than a century old port. It has modern infrastructure capable of handling a wide variety of cargo. It is a natural harbour protected by a breakwater and also by a mole. The Port has an approach channel of depth -14.4 Meters. which is presently being deepened to -19.80 mts. The existing rail and road connectivity provides seamless logistic network to the rest of the Country. There is a modern Vessel Traffic Management System installed for providing reliable modern services. The existing VTMS system is being replaced with new System.
- 4.20 The Port has 9 operating berths viz. 6 mooring dolphins for handling bulk cargo. The effective rated capacity of the port is 62.50 MTPA. There is a dedicated cruise berth and a berth for the use of Navy and Coast Guard. The port handled a traffic of 14.53 MT during the year 2020-21 (up to December, 2020). The project relating to redevelopment of Beth no.9 and three Jetties for handling of multicargo with mechanized system will be awarded on PPP basis. Replacement of existing Fenders with SCN (Reverse) type Cone fenders at



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existing Cruise Berth was completed in December 2020. The project relating to improvement of facilities for embarking and de-embarking of the Cruise passengers was completed and commissioned on 21.02.2020.

V.O. CHIDAMBARANAR PORT

4.21 V.O.Chidambaranar Port, the 10th major Port of India is situated 540 kms. South West of Chennai. As a gateway Port with 15 berths, draft ranging from 8.60 metres to 14.20 metres is equipped to handle a wide spectrum of Container, Dry, Liquid and Break bulk Cargoes.

The present effective rated capacity of the Port is 111.46 Million Tonnes and it handled 23.60 MT of cargo and 5.34 Lakh TEUs of Containers during the year 2020-21 (upto December, 2020).

4.22 Aided by the state of the art infrastructure, dedicated terminal operators, Port user

community and efficient human resource, the Port which is in close proximity to the Main line sea route and excellent rail & road connectivity has been the harbinger of socio-economic development of the southern Tamilnadu region.

Notable achievements during the year

a) On 26.05.2020, V.O. Chidambaranar Port handled a windblade of length 72.40 metres, the longest of its kind made in India. The German flagged heavy lift vessel 'M.V Maria' with LOA of 151.67 metres & Draft of 8.50 metres was berthed at VOC-II berth at 1324 Hrs on 26.05.2020 for loading the windblade. The loading of the windblade was executed diligently using 3 Ship's Hydraulic cranes. The Windblade was transited by M/s. NTC Logistics India (P) Limited, using specialized windblade transportation truck all the way from Mappedu near Chennai to Tuticorin.



Windblade being loaded into the Ship 'M.V Maria' using Ship's hydraulic

- b) On 12.06.2020, V.O.Chidambaranar Port created a new record by handling 1,89,395 Tonnes of Cargo in a single day on 12.06.2020 surpassing the earlier single day record of 1,80,597 Tonnes on 26.07.2019. The major cargoes that contributed to the achievement are Industrial Coal (53,077 tonnes), Thermal Coal (45,829 tonnes), Clinkers (13,217 tonnes), Oil Cake (4000 tonnes), Caustic Soda Lye (2241 tonnes) and Containerized Cargoes (70,254 tonnes / 3903 TEUs).
- c) On 19.06.2020, Port created a record by unloading 55,785 Tonnes of Coal in 24 hours at Berth No.9 from the vessel 'M.V. Myrsini', surpassing the earlier record of 55,363 Tonnes of Coal handled at Berth No.9 from the vessel 'MV. Green K Max S'.



Coal being discharged from the vessel 'M.V. Myrsini' using Harbour Mobile

- d) As a part of world's largest evacuation mission by Indian Navy to repatriate the stranded Indian nationals abroad, 'Samudra Setu' – (meaning 'Sea Bridge') under the 'Vande Bharat' Mission, was carried out through V.O. Chidambaranar Port on 4 occasions.



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No.	Date	Name of the Ship	Country	Repatriated Indians
1	02.06.2020	INS Jalashwa	Srilanka	686
2	07.06.2020	INS Jalashwa	Maldives	700
3	23.06.2020	INS Airavat	Maldives	198
4	01.07.2020	INS Jalashwa	Iran	687
			TOTAL	2271



Passengers disembarking from the Indian Navy Ship 'Jalashwa' at V.O. Chidambaranar Port, Tuticorin

DEENDAYAL PORT (KANDLA)

4.23 Deendayal Port (erstwhile Kandla Port) was established in the year 1950 as a Central Government Project and Union Government took over Kandla for its development as a Major Port. Kandla Port has 34 berths including SPM, Oil Jetties and Dry Cargo with an optimum re-rated capacity of 261.10 MTPA. The port handled 84.37 MMT of traffic during 2020-21 (upto

December, 2020). The cargo handled comprises POL, Iron Ore, Fertilizers, Coal (Thermal/coking) etc.

Notable achievements during the year

- (a) On 03rd April, 2020, Shri Nandeesh Shukla, IRTS, Dy.Chairman DPT, handed over 02 Ventilators @ cost of Rs 11 lakhs, to Taluka Health Officer of State Govt, to combat COVID-19. Port administration under guidance of Shri S.K.Mehta, IFS, Chairman,

has taken this noble decision for donation under CSR Fund.

VISAKHAPATNAM PORT

- 4.24 The Port of Visakhapatnam, located almost midway between Kolkata and Chennai on the East Coast of India at latitude 17°04'1" and longitude 83°01' was opened to ocean traffic on 7th October, 1933 and has been serving a vast hinterland since then. Capacity of the Port as on 31.12.2020 is 126.89 Million tonnes.
- 4.25 The Port has a total of 26 berths and one SPM for cargo handling. The inner harbour has 20 berths and the outer harbour has 6 berths and an SPM. The inner harbour can accommodate fully laden Panamax vessels of draft up to 14.5 meters and the outer harbour can accommodate vessels of

200,000 DWT with a draft upto 18.10 meters. Port of Visakhapatnam has the distinction of possessing Supercape handling facility and the deepest container terminal among Major Ports of India.

Important Projects completed

- 4.26 Construction of grade separator from H-7 area to Port connectivity road bypassing convent junction with an estimated cost of 59.91 Crores completed on 31.07.2020.

Notable achievements during the year

- a) Environment command Control Centre was inaugurated at A.O.B premises on the event of World Environment Day on 5th June, 2020 by Shri K.Rama Mohan Rao, IAS, Chairman/VPT to exclusively monitor environmental issues and maintain





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- pollution free environment in the Port vicinity.
- b) Shri K. Rama Mohan Rao, IAS, Chairman/VPT has inaugurated the Covid Care Centre (CCC) with 63 bed capacity for VPT employees at Rajiv Gandhi Indoor Stadium on 12th August, 2020 with all medical facilities.
- c) On 31st November, 2020 Vessel M.V. Oslo with 38 mtrs. Beam carrying Steam coal berthed at EQ-7 in Inner Harbour., which is the highest beam vessel ever handled in
- d) Inner Harbour.
- e) For the first time a NALCO tanker M.V.Chembulk Yokohama berthed at WQ4 on 4thNovember, 2020 for discharging cargo by using newly laid underground Caustic soda pipeline.
- f) IRQS Audit team in the Surveillance Audit - 2 recommended VPT for upgradation of OSHAS to ISO 45001 – 2018 and accredited certification from 11.11.2020 to 04.06.2021.

PERFORMANCE OF MAJOR PORTS

4.27 Traffic handled at Major Ports

(In million tonnes)

Sl. No.	Port	Actual 2019-20	Provisional 2020-21 (upto December, 2020)
1	Kolkata	17.30	10.62
2	Haldia	46.68	32.60
3	Paradip	112.69	82.44
4	Visakhapatnam	72.72	51.95
5	Chennai	46.76	30.50
6	V.O. Chidambaranar	36.07	23.61
7	Cochin	34.04	21.39
8	New Mangalore	39.14	25.79
9	Mormugao	16.02	14.53
10	Jawaharlal Nehru	68.45	44.74
11	Mumbai	60.70	38.03
12	Deendayal (Kandla)	122.61	84.37
13	Kamarajar (Ennore)	31.75	17.19
	Total	704.93	477.76

4.28 Cargo Handled at Major Ports

(In Million tonnes)

Sl. No.	Port	Actual 2019-20	Provisional 2020-21 (upto December, 202
1	POL	237.17	148.27
2	Iron Ore	48.45	50.66
3	Fert. & Fert. Raw Materials	15.54	13.66
4	Coal	114.91	92.13
5	Containerized Cargo	146.91	100.50
6	Others	141.95	72.54
	Total	704.93	477.76

4.29 Capacity at Major Ports

(In Million tonnes)

Sl. No.	Year	Port capacity	Traffic Handled
1	2001-02	343.95	287.58
2	2002-03	362.75	313.55
3	2003-04	389.50	344.80
4	2004-05	397.50	383.75
5	2005-06	456.20	423.41
6	2006-07	504.75	463.78
7	2007-08	532.07	519.31
8	2008-09	574.77	530.53
9	2009-10	616.73	561.09
10	2010-11	670.13	570.03
11	2011-12	689.83	560.14
12	2012-13	744.91	545.68
13	2013-14	800.52	555.50
14	2014-15	871.52	581.34
15	2015-16	965.36	606.47
16	2016-17	1065.83	648.40
	Re-rated capacity 2016-17	1359.00*	



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17	2017-18	1451.19	679.37
18	2018-19	1514.09	699.10
19	2019-20	1534.91	704.93
	2020-21		
	(Upto Dec., 2020)	1534.91	477.76

(*) The capacities of the Major Ports have been re-rated as per berthing policy 2016.

4.30 The details of important performance indicators of the Ports are given below:

(i) Average Turn Round time

Sl. No	Port	Average Turn round Time/(Hours)	
		2019-20	2020-21 (upto December, 2020 (*))
1	Kolkata	101.10	74.10
2	Haldia	86.88	72.96
3	Paradip	71.42	67.24
4	Visakhapatnam	59.49	67.60
5	Chennai	48.08	51.74
6	V.O.Chidambaranar	48.24	52.08
7	Cochin	36.15	37.96
8	New Mangalore	45.84	46.79
9	Mormugao	64.64	81.77
10	Jawaharlal Nehru	48.00	48.48
11	Mumbai	61.37	68.19
12	Deendayal (Kandla)	70.56	83.28
13	Kamarajar (Ennore)	44.40	44.94
	Total (All Ports)	62.11	63.70

(*)Provisional

(ii) Average Output per Ship Berth Day

(In Tonnes)

Sl. No.	Port	Average Output Per Ship Berth Day	
		2019-20	2020-21 (upto December, 2020)(*)
1	Kolkata	4215	3995
2	Haldia	10121	9117
3	Paradip	25091	22616
4	Visakhapatnam	14901	12720
5	Chennai	16470	15476
6	V.O.Chidambaranar	15056	14925
7	Cochin	23709	21025
8	New Mangalore	15774	15190
9	Mormugao	13258	12352
10	Jawaharlal Nehru	27677	26290
11	Mumbai	10993	10036
12	Deendayal(Kandla)	16890	14657
13	Kamarajar (Ennore)	23421	17217
	Total (All Ports)	16419	14944

(*)Provisional



Chapter - V

SHIPPING



INTRODUCTION

5.1 Shipping plays an important role in the economic development of the country, especially in India's international trade. The Indian shipping industry also plays an important role in the energy security of the country as energy resources such as coal, crude oil and natural gas are mainly transported by ships. Further, during a crisis situation, Indian shipping contributes to ensure uninterrupted supply of essentials and serves as the second line of defense.

5.2 The salient features of India's shipping policy are the promotion of national shipping to increase self-reliance in the carriage of country's overseas trade and protection of stakeholder's interest in EXIM trade. India's national flag-ships provide an essential means of transport for crude oil and petroleum product imports. The national shipping also contributes to the foreign exchange earnings of the country.

5.3 India has been a founder member of the International Maritime Organization (IMO), a specialized agency set up under

- the United Nations, primarily dealing with the technical aspects of shipping relating to Maritime Safety, Protection of Marine Environment, Standards of Training and related legal matters. India has been participating in various meetings of the IMO Committees, Sub-Committees, Council and Assembly and has actively contributed towards the development of various Conventions, Protocols, Codes and Guidelines developed by the IMO.
- 5.4 To promote Indian tonnage and to save precious foreign exchange, the Cabinet on December 10, 1957 had decided that in all negotiations for large contracts involving shipping arrangements by Central Government Departments, State Government Departments and Public Sector Undertakings (PSUs) under them, the Department of Transport would invariably be consulted and all such import contracts were to be finalized on FOB/FAS (Free on Board/Free Alongside Ship) basis and those for exports on C&F/CIF (Cost and Freight/Cost, Insurance and Freight) basis and in case of departure there from, prior permission was required to be obtained from Department of Transport on a case-to-case basis.
- 5.5 In the changed context of economic liberalization and new thrust on competitiveness and performance improvement of PSUs, the Government on November 15, 2001 decided that while the existing policy for placing import contracts on FOB/FAS basis will continue, the policy was relaxed in case of exports. Government Departments / PSUs were permitted to finalize export contracts on FOB/FAS basis without seeking prior clearance from the Ministry of Shipping.
- 5.6 The emerging sectors, where there is a potential for enhancing trade (exports and imports), need to be focused upon and ways to open up sea routes on these sectors need to be considered. Some examples are the International North-South Transport Corridor (INSTC) route, which would considerably shorten the distance from India to Commonwealth of Independent States (CIS) through Iranian ports; the routes to South East Asian countries, which still have the scope for development, like Thailand, Vietnam etc., akin to the sea routes which were opened up for Bangladesh and Myanmar (as part of Act East Policy of the Government).
- 5.7 During the years, India's overseas trade has expanded considerably both in terms of composition and direction due to the policy of export promotion being pursued by the Government. At the same time, efforts are being made to provide and improve the trade related infrastructure, especially transport, to facilitate the movement of traffic more efficiently. So far as the movement of traffic by ships to overseas destinations is concerned, both Indian as well as foreign flag ships operating consortium liner shipping services have been providing the services either directly or through transshipment arrangements for the general cargo in break-bulk or containerized form. Similarly, for the bulk cargo moving either as imports or exports, the services of



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transships, both Indian and foreign, usually engaged on chartering basis, are available to all the destinations.

- 5.8 Improvement in export related infrastructure has been a consistent endeavour to promote exports. Inadequacies in seamless transport through road, rail, ports and airports are obstacles faced in the infrastructure development for promoting exports. However, it is a fact that in the transport sector, most of the funding in our country has been towards the railways, road and highways sectors. While the importance of roads and railways in the economy is undeniable, there is also a greater need to encourage the maritime sector to enable it to achieve its full potential. Thus there is a strong case for supporting waterway transportation.

SHIPBUILDING AND SHIP REPAIR

- 5.9 The Ministry of Shipping is the nodal Ministry for formulating policy measures for the promotion of Indian Shipbuilding and Ship repair Industry. There are 28 Shipyards in the country, 6 under Central Public Sector, 2 under State Governments and 20 under private Sector. The breakup of the government owned, controlled shipyards is as under:-

(a) **Ministry of Ports, Shipping & Waterways**

- i. Cochin Shipyard Limited, Kochi
- ii. Hooghly Cochin Shipyard Limited – a subsidiary of CSL

(b) Ministry of Defence

- i. Mazagaon Dock Limited, Mumbai
- ii. Garden Reach Shipbuilders and Engineers Limited, Kolkata
- iii. Goa Shipyard Limited, Goa
- iv. Hindustan Shipyard Limited, Visakhapatnam

(c) State Governments

- (i) Under Government of Gujarat
 - Alock Ashdown Co. Ltd. (operations closed in July 2019)
- (ii) Under Government of West Bengal
 - Shalimar Works Limited, Kolkata.

- 5.10 The global shipbuilding industry continued to be under extended downturn for the past few years, with world's leading shipyards facing financial troubles due to lack of orders and the total order book coming down. The effects are felt in all segment such as bulk cargo vessel segments (Bulkers, Containers, Crude Tankers). The major reason for the lack of demand could be attributed to the widening disparity between newbuilding prices and earnings, growing uncertainty within the shipping industry as it prepared for the introduction of the global 0.5% sulphur cap on marine fuels, geopolitical instability and fear of a further escalation in the trade dispute between major countries. Persistent financing challenges and the difficulty to raise equity or obtain long term employment along with nagging questions concerning the shipping

industry's capability to generate profits. Adding to the above, the pandemic due to COVID 19 created more depression in the market due to slow down of trade across the globe and thus impacting the cargo movement. The cruise shipbuilding which was otherwise growing also went into depression due to the pandemic and negative outlook of the tourism industry.

- 5.11 Keeping in view that India has a coastline of 7500 km, inland water ways potential of over 20,000 km, shipbuilding has been identified as one of the key sectors under the 'Make in India' initiative. There is huge potential for the improvement of water transportshare in the inland and Coastal space which can be translate to more activity in the Shipbuilding and Shiprepair segment.

Shipbuilding

- 5.12 Key characteristic feature of ship-building is that unlike other manufacturing industries which pre-dominantly follow make-to-stock inventory model, shipbuilding is an order-driven industry where each vessel is custom built on receipt of the ship-building order. Thus, building an order book is essential for growth and sustenance of the shipbuilding industry. Order book growth for commercial ships is largely driven by the growth in world trade and commerce, which spurs demand for new ships. The evolving environment - friendly international regulations also trigger demands for replacement of old ships. Shipbuilding also provides opportunity for

ancillary industries to grow thus providing multiplier effect to the marine manufacturing segment boosting economy and employment.

Indian Shipbuilding capability

- 5.13 Currently, the maximum size of the vessels, which can be built in India in the public sector is 1,10,000 DWT which is increasing the capacity to built vessels up to 3,00,000 DWT vessels by Cochin Shipyard Ltd. Private sector shipyards can build vessels upto cape size vessels comparable to some of the leading shipyards in the world. Reliance Naval Engg. Ltd. has the capacity to build vessels upto 400,000 DWT and L&T Shipbuilding - Kattupalli 300,000 DWT which includes large LNG Carriers. Smaller size LNG Carriers, Dredgers and other specialized vessels can be built by other shipyards in the Private sector such as Tebma Shipyards, Shoft Shipyard, Chowgule & Co., Vijai Marine Shipyard, Mandovi Dry Docks, A.C. Roy & Co., Dempo Shipbuilding etc.

Order Book Position

- 5.14 As on September 30, 2020, CSL has 52 ships on order including, 1 No. Indigenous Aircraft Carrier for Indian Navy, 1 No. Technology Demonstration Vessel for DRDO, 2 Nos. 500 Pax cum 150 Ton Cargo Vessel for A&N Administration, 2 Nos. 1200 Pax cum 1000 Ton Cargo Vessel for A&N Administration, 8 Nos. of Anti-Submarine Warfare Shallow Water Crafts (ASW SWC) for the Indian Navy. 9 Nos.



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Floating Border Outpost for the Border Security Force, 4 Nos. of mini bulk carrier for JSW group, 23 nos. of battery operated

passenger ferry for the Kochi Water Metro Project and 2 Nos. of Autonomous Electric Ferry for ASKO Maritime AS, Norway.

ORDER BOOK POSITION OF MEMBER SHIPYARDS of SAI

(Rs in Crores)

Sl. No.	Name of Shipyard	Order book position till 31.12.20
		SHIPBUILDING
1	Shoft Shipyard Pvt. Ltd.	575
2	Marine Frontiers Pvt. Ltd.	172
3	Dempo Shipbuilding and Engg. Pvt. Ltd	1.82
4	A.C. Roy & Co.	55.77
5	Reliance Naval & Engg. Ltd.	4,140
6	Mandovi Drydocks	42.3
7	Chowgule& Co. Ltd.	223
8	Vijai Marine Shipyard	70.02
	Total	5279.91

Source: Shipyards Association of India (SAI) is an association of Indian Private Sector Shipyards

Potential in Shipbuilding

5.15 Under the present depressed prevailing market, the growth in the Industry is likely to be accelerated through the "Atmanirbhar Bharath" initiative under the Make In India Programme of the GOI. Various support initiatives were taken by the ministry such as providing preference to local built Tugs for the employment of services in all the Major ports. The likely growth in demand for shipbuilding in India is expected to emerge from the above schemes for the coastal shipping and inland water. Another potential area of interest is the defence market and deep

sea fishing segment. As per a published report, the Indian Navy's perspective plan aims to increase the Navy's fleet from the present 137 to 200 nos. by 2027. The vision of GOI as per the Defence Production Policy, circulated recently was "To make India among the Top Five countries of the world in Aerospace and Defence Industries", with active participation of public and private sector, fulfilling the objective of self-reliance as well as demand of other friendly countries. Another area of interest is in urban transport segment and the Short sea shipping market where environment

friendly electric mobility technology is fast catching up and provides new opportunity for Indian Shipbuilders. Cochin Shipyard has signed a contract with Kochi Metro Rail Corporation for building 23 nos.passenger boats using hybrid battery powered propulsion. Another major contract was clinching a contract to export two (2) nos Electric powered autonomous Ro-Ro ferry for Norwegian customer.

- 5.16 Maritime clusters are vital for the growth of the ship building & repair industry as they provide ancillary services, manufacturing of ancillary products, maritime services and financial services for the industry. Based on the studies conducted under the Sagarmala Programme, Tamil Nadu has been identified for development of a Maritime cluster as part of the National Perspective Plan of Sagarmala Programme. Factors such as proximity to the major shipping routes between Asia and Europe, presence of steel industry, shipyards and ports in the vicinity favour the development of a Maritime Cluster in Tamil Nadu. Gujarat Maritime Board(GMB) is also working on developing a Marine Shipbuilding Park in Bhavnagar along with a Maritime Services cluster in Ahmedabad or Gujarat International Finance Tec-City (GIFT) City.

Goals for Indian shipbuilding industry

- a. To facilitate construction of River sea vessels, Inland vessels, Barges and Fishing vessels in India.
 - b. To encourage use of new technology especially construction of vessels which use alternative fuels.
 - c. To ensure that top global suppliers of advanced equipment stock and/or assemble their products in India.
 - d. To ensure all government-owned/PSU vessels are built in India.
- Ship Repair**
- 5.17 The global ship repair market is approximately US\$ 12 billion. Shipyards in China, Singapore, Bahrain, Dubai and Middle East account for a major share of this market. These locations have achieved a dominant position despite higher cost of ship repair services compared to other Asian countries, largely due to the availability of a skilled workforce and the latest technology which allows these shipyards to attract demand from other low cost locations like India, Malaysia and Indonesia. The global market for ship repair and maintenance service is expected to witness significant growth, reaching a market value of \$ 20,532.6 billion in 2017. Ship repair and maintenance services market is estimated to reach \$ 40 billion by 2028 supported by developments in the markets in South East Asia and India. Though India's share in global ship repair is less than 1%, the country's location is favourable with 7-9% of the global trade passing within 300 NM of the coastline.



Indian Ship Repair Capability

- 5.17 Amongst public sector shipyards, Cochin Shipyard Ltd has the highest capacity for ship repairing (125 thousand DWT). In private sector, Reliance Naval Engg. Ltd. has the maximum capacity for ship repairing (400,000 DWT) followed by L&T Shipbuilding Ltd. (300,000 DWT).
- 5.18 The untapped potential in the Indian ship repair market can be attributed to the presence of competing international ship repair yards in Singapore, Middle East (Dubai, Bahrain) and Colombo on major trade routes and a capability gap of Indian yards in repairing certain kinds of vessels. Due to these disadvantages, only about 5-6 shipyards out of a total of 27 shipyards in the country carry out any significant repair jobs. One of the major deterrents in ship repair is GST which is an additional tax burden and makes Indian ship repairers uncompetitive as compared to foreign ship repairers. Other reasons of cost disadvantages include high cost of financing, lack of supply of ship spares in India and technology related issues increasing ship repair execution cycle time.

Potential of ship-repair industry

- 5.19 India is located strategically on the international trade route, whereby it can attract ships plying from west to east in the trade route for its ship-repair activity. This represents increasing market potential for the ship-repair business, as ship owners prefer to repair their ships without deviating from their trade routes as much as possible. Ship-repair service, a

supplementary service provided by most of the shipyards, is also a labour-intensive activity that utilizes the existing ship-building infrastructure to provide additional returns on the capital invested.

Strengths of Indian ship repair industry

Geostrategic location of India

- 5.20 A long coast line with number of all weather ports which are not subjected to severe weather conditions and naturally protected is the primary advantage. With strategic location in the trade route of tanker/bulk carrier traffic on east & west and ready availability of trained workforce, there are tremendous opportunities for huge revenue generation.

Abundance of labour

- 5.21 All the resources required for the Ship Repair Units to function efficiently are available and there is a huge untapped potential. The ship repair industry promises relatively continuous flow of revenue and employment for all segments of labour class (from highly skilled to unskilled). Most of the existing and new ship repair yards in India concentrate on new building and providing services to naval and coastal vessels.

Competitive labour rates

- 5.22 The subcontract labour rates for steel work, pipe work, blasting and painting, mechanical and electrical works are very cheap in India and are comparable to labour rates in Indonesia and Vietnam. In fact it is 10 to 15% lower than subcontract labour rates of Indonesia and 25% lower than Philippines.

Quality of work

- 5.23 The speed of execution and quality of work is comparable to that of Indonesia, Philippines and Vietnam who have a significant presence in the world ship repair industry.

Recent steps/ initiatives in shipbuilding and ship repair

Financial Assistance Policy on Shipbuilding

- 5.24 To promote shipbuilding in Indian shipyards, the Union Cabinet has on December 9, 2015 approved New Shipbuilding Financial Assistance policy for Indian shipyards for contracts signed during a ten year period, viz. 2016-2026. The Guidelines for Shipbuilding Financial Assistance Policy has been revised in October 2017 and the updated the web portal for processing the online applications by DG(S) submitted by shipyards online, has been rolled out on 31.10.2017. Financial assistance is being granted to Indian Shipyards equal to 20% of the lower of "Contract Price" or the "Fair Price" or actual payments received of each vessel built by them for a period of at least 10 years commencing 2016-17. This rate of 20% will be reduced by 3% every three years. The guidelines have been amended in November, 2020.

Right of Refusal to Indian Shipyards

- 5.25 The Union Cabinet has also approved on 09.12.2015 that all government departments or agencies including CPSUs have to provide Right of First Refusal to

Indian shipyards while procuring or repairing vessels meant for governmental or own use till 2025 after which only Indian shipyards would build and repair vessels of these organizations. Guidelines were uploaded on website of this Ministry on 31.05.2016. Subsequently, a few provisions of the guidelines regarding Quay Length and Non-Destructive Testing facilities have been modified by this Ministry to facilitate more Indian shipyards including small shipyards to take advantage of this policy. The modified guidelines as amended on December 2018 have been uploaded on the website of Ministry of Ports, Shipping and Waterways.

Grant of Infrastructure Status

- 5.26 The Department of Economic Affairs has notified the inclusion of standalone 'Shipyards' in the Harmonized Master List of Infrastructure Sub-sectors on 13.04.2016. With this inclusion, shipyards will be able to avail flexible structuring of long term project loans, long term funding from Infrastructure Funds at lower rates of interest and for a longer tenure equivalent to the economic life of their assets, relaxed ECB norms, issuance of infrastructure bonds for meeting working capital requirements. Standalone shipyard is defined as a floating or land-based facility with the essential features of waterfront, turning basin, berthing and docking facility, slipways and/or ship lifts which is self sufficient for carrying on shipbuilding/ repair/breaking activities.



SOP for charter/procurement of tugs by major ports under Atmanirbhar Bharat Abhiyan

5.27 In order to promote small and medium shipyards, in September, 2020, the Ministry has issued Standard Operating Procedures pertaining to Procurement/ Chartering of Port Crafts by the Major Ports. Further, to assist the Major Ports to implement the Make in India policy, the Ministry has constituted a Standing Specification Committee to prepare Approved Standardized Tug Design & Specifications (ASTDS).

Promotion of Make in India initiative

5.28 In order to promote the Make in India initiative, a notification was issued in October, 2020 regarding RoFR for Indian built and Indian flagged ships through amendments to Guidelines for chartering of vessels done through tender process for all types of requirements.

International Ship Repair Facility

5.29 The Cochin Shipyard Limited (CSL) is developing International Ship Repair Facility (ISRF) within the premises of Cochin Port Trust (CoPT) by installing a Ship lift Facility of 130m x 25m x 6000T capacity with 6 Workstations and allied facilities at the cost of Rs. 970 Crores. CSL continued to operate the dry-dock & existing facilities in the leased area (first phase) at Cochin Port premises. CSL completed the repairs of eleven ships during the financial year 2019-20. The construction works of ISRF project, which commenced on November 17, 2017, is progressing in full swing. More

than 95% of the piling works, 50% of the deck concreting & 80% of the dredging activities are completed and the facility is expected to be commissioned in FY 2021-22. As a part of our efforts to develop Kochi as a maritime hub of India, CSL had set up a maritime park near to the International Ship Repair Facility at Willingdon Island, which was inaugurated by Hon'ble Minister of State (Independent Charge) for Shipping, Shri Mansukh Mandaviya on September 19, 2019. Ten globally renowned firms in the maritime industry have already partnered with CSL for setting up their units in the Maritime Park in the first phase. CSL expects to position Kochi as a major ship repair hub with major operations in the present ship repair dock coupled with increased capacities that would be available when the ISRF is commissioned.

Cruise Shipping

5.30 Cruise shipping is a fast growing component of the leisure industry worldwide. Huge amount of foreign exchange can be earned with sizeable direct & indirect employment can be generated onshore by providing the right policy environment and infrastructure for the growth of cruise shipping and tourism. Cruise tourism leads to significant regional development and also leads to the development of allied services in the vicinity. Currently Indian ports are primarily ports of call for cruise lines at ports in Mumbai, Cochin, Goa, New Mangalore and Chennai. To increase

number of vessel calls and passengers arriving in India Ministry of Shipping has relaxed Cabotage till 5th Feb, 2029 for foreign flag passenger/cruise ships to call at more than one Indian Port. Recently, Ministry in order to support the Cruise shipping industry and keeping in view to balance the loss incurred to the cruise industry due to the pandemic situation caused by COVID-19 has rationalized tariff for Cruise Vessels arriving in India and the following tariff is made applicable for a period of one year vide order dated 14.08.2020:-

- a) The port charges for a Cruise Ship to be charged at \$ 0.085 per GRT for first 12

hours stay ('Fixed Rate') and \$ 5 per passenger ("Head Tax"). The Ports will not charge any other rate like berth hire, port dues, pilotage, passenger fee, etc.

- b) For the period exceeding 12 hours stay, the fixed charges on Cruise Ships will be equal to the Berth Hire Charges payable as per SOR (with 40% discount as applicable for cruise ships),
- c) Further, cruise ships making
 - 1-50 calls per year to get 10% rebate.
 - 51-100 calls per year to get 20% rebate.
 - Above 100 calls per year to get 30% rebate.
- d) The above rationalized tariff is effective for a period of one year i.e upto 13.08.2021.

- 5.31 The number of International Cruise ships and passengers handled in Indian Ports are given in the Table below.

Year	2017-18		2018-19		2019-20	
	No. of Passengers	No. of cruise Vessels	No. of Passengers	No. of cruise Vessels	No. of Passengers	No. of cruise Vessels
Chennai Port	1244	2	3685	5	612	2
Cochin Port	47727	42	62753	49	67907	44
New Mangalore Port	24258	22	293	2	24080	21
Mormugao Port	43726	32	47778	35	57241	38
			Domestic 32732	Domestic 67	Domestic 95634	Domestic 125
Mumbai Port	56601	40	86757	106 *	222105	221*
Visakhapatnam Port			219	3		
TOTAL	173556	138	263296	291	467579	451

* Includes Domestic and foreign cruise vessel data.



- 5.32 The number of Domestic Cruise Ships and passenger handled in Indian Ports in 2019-20 are given in the Table below.

No. of Domestic Cruise Ships and passenger handled in Indian Ports in 2019-20		
Name of Port	No. of calls	No. of Passengers
Mumbai	177	145616
Goa	125	95634

REFORMS

Merchant Shipping Bill, 2020 and Coastal Shipping Bill, 2020 to replace Merchant Shipping Act, 1958

5.33 Over the years, due to evolution of merchant shipping sector, the industry has been facing several challenges. With a view to meet new challenges and to foster overall development of India's mercantile marine ecosystem, it was felt necessary to revamp the Merchant Shipping Act, 1958 by replacing time-barred provisions with contemporaneous ones to reduce compliance burden to promote ease of doing business, legislate on International Conventions to meet India's international obligations and to augment Indian merchant tonnage. The challenges have also necessitated giving impetus to coastal shipping and trade and highlighting the legislative provisions concerning coastal shipping. It was therefore, decided to have a separate Act for regulation of Coastal Shipping. Two separate Bills viz. Merchant Shipping Bill, 2020 and Coastal Shipping Bill, 2020 are in the process of inter-ministerial consultations to revamp the Merchant Shipping Act, 1958.

The Admiralty (Jurisdiction and Settlement of Maritime Claims) Act, 2017

5.34 The Admiralty (Jurisdiction and Settlement of Maritime Claims) Act, 2017 was enforced on 1.04.2018. Rules under clause (b) of subsection (2) of section 16 of the Admiralty (Jurisdiction and Settlement of Maritime Claims) Act, 2017 to provide for the practice and procedure of admiralty jurisdiction under this Act, including fees, costs and expenses in such proceedings are being framed by the courts of coastal states of the country. As of December, 2020, the High Court at Calcutta, the Bombay High Court, the Orissa High Court and the Madras High Court have notified these rules.

The Recycling of Ships Act, 2019

5.35 India acceded to the Hong Kong International Convention for Safe and Environmentally Sound Recycling of Ships, 2009 in November 2019 and Recycling of Ships Act, 2019 was enacted in Dec 2019. The Act is aimed at ensuring that ships, when being recycled after reaching the end of their operational lives, do not pose risk to human health and safety or to the

environment. As per the powers conferred by Section 3 of the said Act, Director General of Shipping had been designated as National Authority which shall administer, supervise and monitor all activities relating to ship recycling under the said Act. In accordance with section 42 of the Act, the Ministry is in the process of framing Rules for safe and environment friendly recycling of ships.

- 5.36 Vessel Sharing Agreements were exempted from the provisions of section 3

of the Competition Act, 2002, initially for a period of one year w.e.f. the 11th of December, 2013, until the 10th of December, 2014. The exemption was again extended for one more year w.e.f. 5th February, 2015 up to 4th February, 2016. Thereafter, the exemption has been periodically extended and it is currently valid till 3.7.2021 for fostering ease of doing business in the liner shipping industry in India, without, compromising the core anti-competition principles.



Chapter - VI

FUNCTIONING OF ORGANIZATIONS



DIRECTORATE GENERAL OF SHIPPING

6.1 The Directorate General of Shipping {DG(S)}, an attached office of the Ministry of Shipping, Government of India was established in 1949 as the Maritime Administration of India. It deals with implementation of shipping policy and legislation, so as to ensure the safety of life and ships at sea, prevention of marine pollution and other mandatory regulations of the International Maritime Organizations are effectively implemented including promotion of maritime education and training, examination & certification of seafarers and supervision of other subordinate offices for their effective functioning etc. The Director General of Shipping is appointed under

section 7 of the Merchant Shipping Act, 1958.

The Director General of Shipping's administrative secretariat consists of Director General, Additional Director General and Deputy Directors General of Shipping. On the technical side, the Director General is assisted by the Nautical Adviser for Navigational Issues, Chief Surveyor on Marine Engineering Issues and Chief Ship Surveyor on the Naval Architecture issues. The field formation of Directorate General of Shipping is headed by Principal Officers who are assisted by surveyor of Engineering, Nautical and Naval Architecture sides. The Heads of allied offices supported by their subordinate officers also assist the

Director General of Shipping in the overall discharge of various statutory functions.

Functions of offices under the administrative control of the DG(S)

- 6.3 The Mercantile Marine Departments (MMDs) were set up in 1929 with Headquarters at Mumbai, Kolkata and Chennai. MMD, Kochi was elevated to district level office and a new district level office at Kandla was opened in 2005. These Departments were directly under the Ministry till the establishment of the Directorate General of Shipping at Mumbai in 1949. The main functions of MMDs are to administer the various Merchant Shipping laws and rules relating to safety of ships and life at sea, registration of ships, tonnage measurement, crew accommodation, survey for load line, safety construction, prevention of pollution, enquiries into shipping casualty and wrecks, surveys of passenger ships, radio equipments on board, inspection and approval of statutory equipment for life saving and fire fighting appliances, wireless telegraphy, global maritime distress and safety systems, navigational aids, pollution prevention equipments, supervision of repairs and construction of ship on behalf of State and Central Government organizations, Flag state implementation, Port State Control inspection, examination and certification of various grades of certificates of competency as per relevant examination rules under Merchant Shipping Act, 1958 etc.

6.4 The additional responsibilities were imposed from time to time in the form of new statutes like Multi-modal Transportation of Goods Act, Admiralty Act, Recruitment and Placement of Seafarers Rules, Majority of Surveys, Inspections & Certification as required under various International conventions, notified by India, relating to safety of ships pollution prevention have been delegated to some of the Classification societies of IACS who acts as Recognized Organization of the Directorate with selective supervisory role for the DGS on important surveys.

Passengers Ship Survey

- 6.5 All passenger ships are subjected to survey of hull, Machinery, equipment etc. during construction and thereafter annually. On completion of survey, Certificates such as Passengers Ship Safety Certificate, Space Certificate, Special Trade Ship Safety Certificate, Exemption Certificate, 'A' Certificate and Certificate of Survey are issued. Cargo Ship Safety Construction (CSSC) Surveys 6.6 Under the requirements of SOLAS 74 Convention as amended, administration is responsible for conduct of CSSC Surveys of various types of Cargo Ships under construction and periodical and annual surveys thereafter. The task of surveys of Cargo Ships under construction/reconstruction abroad and subsequent periodical/annual surveys and issuance of certificate have been delegated to recognize Classification Societies. 6.7 All Sea going vessels over 300



G.T. are required to be surveyed and issued with a Safety Radio Certificate in compliance with the M.S. (Radio) Rules, 1983 and Chapter IV of SOLAS 74 as amended from time to time. The survey consists of checking of Radio equipment for distress, safety and normal communication on board. With the harmonization of Certificates, the Safety Radio Certificate is issued.

Tablet Based Examination System (TBES) Project

- 6.6 Directorate General of Shipping (DGS) in line with STCW Convention and Digital India will shift the existing manual Certificate of Competency (CoC) written examination into Tablet Based CoC Examination System format. National Institute of Smart Government (NISG) has been appointed by the Directorate as a consultant, who has delivered feasibility study; Detail Project Report (DPR), Expression of Interest (EOI) and Request for Proposal (RFP). After implementation of Tablet Based Examination System at MMDs the existing NCV Examination outsourced to Institute of Marine Engineers India (IMEI) will also be merged with the DGS Tablet Based Examination System.

SEAMEN'S PROVIDENT FUND ORGANIZATION, MUMBAI

- 6.7 The Seamen's Provident Fund Scheme, the first social security scheme for Indian Merchant Navy Seamen, brought under statute by enactment of the Seamen's

Provident Fund Act, 1966 (4 of 1966) was introduced retrospectively with effect from 1st July, 1964, to provide for the institution of a provident fund for seamen as old age retirement benefit and their family members in the event of death of seamen members. The Seamen's Provident Fund is vested in and administered by the Board of Trustees consisting of the Chairman and three representatives each of the Government, Employers and Employees. The Director General of Shipping is an ex-officio Chairman of the Board of Trustees and the Commissioner is the Chief Executive Officer and the Secretary to the Board. SPFO was maintaining the PF account of approximately 88,000 Indian seafarers.

NATIONAL WELFARE BOARD FOR SEAFARERS

- 6.8 As provided under Section 218 of Merchant Shipping Act. 1958 the Government of India has constituted a National Welfare Board for Seafarers headed by the Union Minister of Port, Shipping and waterways for advising the Government on the measure to be taken for promoting the welfare of Seamen whether on shore or aboard. The Board functions with Minister of Ports, Shipping and Waterways as the chairman. It comprises of 2 Members of Parliament (one from Lok Sabha and one from Rajya Sabha), 4 representatives from Central Government, 3 representatives each of Ship - owners and Seafarers, 2 representatives from Port Trusts, 1 non-

official Member from the field of Seamen's Welfare of Public, representative from Society interested in Seamen's Welfare.

SEAFARERS' WELFARE FUND SOCIETY

6.9 The SWF Society is set up as a Central Organization for the Welfare of Indian Seafarers and their families. It is registered under the Societies Registration Act 1860 and as a Trust under the Bombay Public Trust Act 1950. The Society represents various interests connected with Indian Shipping which includes representatives of Indian and Foreign Ship-owners and also of Seafarers' Unions separately for officers and seamen. The control of business and affairs of the Society is vested with the Committee of Management of which the Director General of Shipping is the ex-officio Chairman. SWFS manages the gratuity of approximately 75000 Indian seafarers. The SWFS is the Central Organization of the Government of India, to ensure the compliance of the Regulations 4.5 of Maritime Labour Conventions, 2006 and to comply the same, the steps have already been taken by the SWFS by implementing various welfare schemes to the seafarers and their families. The Welfare schemes so far

implemented by the SWFS are (i) Survival Benefit Scheme (ii) Invalidity Benefit Scheme (iii) Maternity Benefit Scheme (Only for women seafarers) (iv) Old Age Benefit Scheme and (v) Family Benefit Scheme.

DIRECTORATE GENERAL OF LIGHTHOUSES AND LIGHTSHIPS

6.10 The Directorate General of Lighthouses and Lightships establishes and maintains Aids to Marine Navigation along the coastline of India as per Lighthouse Act, 1927. According to the SOLAS (Safety of Life at Sea) 1974, Chapter V published by the IMO (International Maritime Organization), the Contracting Governments to:

- Provide appropriate Aids to Navigation
- Take into account international recommendations and guidelines
- Arrange for information on Aids to Navigation to be made available

Aids to Navigation

6.11 There were 17 lighthouses at the time of Independence. As on date, the details of Aids to Navigation maintained by the DGLL are as shown below:

Sl. No.	Aid to Navigation	Nos.
1.	Lighthouses	195
2.	Lightship	01
3.	DGPS Stations	23
4.	Racons	64



5.	Deep Sea Lighted Buoys	21
6.	National Automatic Identification System (AIS) Physical Shore Stations (PSS)	87
7.	Vessel Traffic Service - Gulf of Kachchh(9 Radar +4 AIS Base Stations & 2 Direction finder)	01
8.	Lighthouse Tender Vessels	03
9.	National Navtex Chain (7 Tx. Stations, 7 Monitoring Stations & Navtex Control Centre at Mumbai & Vizag.)	01

Lighthouses

6.12 A Lighthouse is a structure on land, close to the shore line or in the water. The Lighthouse tower serve as a day mark with its colour scheme, and a powerful light with a specific character serve the

mariners during the night. A lighthouse may be used to indicate dangerous Shoals, Sand Bank, Rock etc to obtain a Line of Position and to indicate Landfalls, Headlands, entrance to estuaries/ports etc.



Lighthouse

Lightship

- 6.13 A Lightship serves the same purpose as lighthouse and is positioned in the sea, where it is not feasible to construct a lighthouse. DGLL maintains a lightship "PERIGEE" off the Bhavnagar coast, in Gujarat.



Lightship

Revenue Generation and Expenditure

- 6.14 The funding pattern of the Directorate is based on cost recovery system and it does not burden the taxpayers. All expenditure on management and development (plan and non-plan) is met out of the revenue collected by levy of light dues and thus the Directorate is a self - sustaining organization. The Central Government, as per the provisions of the Lighthouse Act, levies light dues on all the foreign going ships arriving at or departing from any port in India. The light dues are levied on Foreign Going Vessels @Rs. 92/- per TEU on container vessels and @Rs 8/- per ton other than container Vessels once in 30 days. Provision has been made for on-line

payment of light dues. A new e-portal for online collection of Light dues integrated with "Bharat Kosh", a Central Receipt Non-Tax Receipt Portal (NTRP) developed by CGA, Ministry of Finance for online receipts of all non-tax nature for Central Ministries/ Department has been made live w.e.f. 24/07/2020.

Development of Tourism

- 6.15 Lighthouses, due to its natural and scenic locations, have tremendous tourist potential. The DGLL is promoting tourism at lighthouses in phased manner. In order to give impetus to promote tourism at Lighthouses, the Ministry has identified 08 Lighthouses along the coast of India and



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they have been taken up for promotion of tourism at on PPP mode at initial stage.

1. Kanhoji Angre (Maharashtra)
2. Sunk Rock (Off Mumbai Coast)
3. Aguada (Goa)
4. Muttom Point (Tamil Nadu)
5. Mahabalipuram (Tamil Nadu)
6. Kadalur Point (Kerala)
7. Minicoy (Lakshadweep)
8. Chandrabhaga (Odisha)

Establishment of new Lighthouse at Tajpur

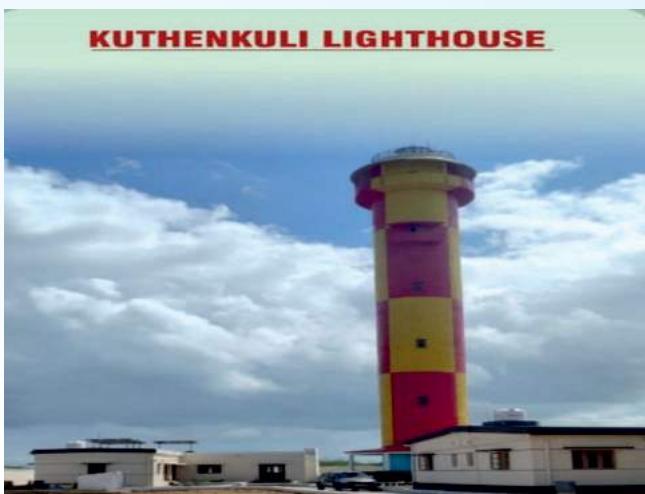
- 6.16 For easy identification of landmark and to provide seamless coverage of lighthouse along the Indian Coast a new Lighthouse at Tajpur has been established. The Lighthouse was commissioned by Sh. E Murthy, Director General through video conferencing on 5th June, 2020.



Establishment of new Lighthouse at Kuthenkuli

- 6.17 For easy identification of landmark and to provide seamless coverage of lighthouse along the Indian Coast a new Lighthouse at

Kuthenkuli has been established. Honourable Minister Shri Mansukh Mandaviya, Union Minister of State for Shipping (Independent Charge), Chemical and fertilizers inaugurated the Lighthouse through video conferencing on 29th October, 2020.



COCHIN SHIPYARD LIMITED

- 6.18 Cochin Shipyard achieved a net profit of Rs. 637.69 Crore for the year 2019-20 as compared to Rs. 481.18 Crore for the year 2018-19. The Company achieved a turnover of Rs. 3,422.49 Crore for the year 2019-20 as compared to Rs. 2,965.60 Crore for the year 2018-19. Turnover for the half year ended September 30, 2020 was Rs. 989.88 Crore as against Rs. 1709.72 Crore for the half year ended September 30, 2019. Company achieved a net profit of Rs. 151 Crore for the half year ended September 30, 2020 as compared to Rs. 328 Crore for the half year ended September 30, 2019.

Global Shipbuilding Industry

6.19 The global shipbuilding prospects got some fillip due to large ageing fleet replacements and new regulatory restrictions implemented by the International Maritime Organization (IMO). The global fuel, sulphur cap, which came into force in January 2020, is part of the IMO's response to heightening environmental concerns, contributed in part by harmful emissions from ships. Further, commitments to reduce the total emissions to 50% by 2050 is a forward looking initiative with farfetched impact providing plenty of opportunity for the industry to adopt new technology and thus driving next generation fleet replacements. That is likely to have modest positive effect for the shipyards and the suppliers in medium and long term basis.

The uncertainties in the political sphere and trade wars looming large, the world real GDP had a stagnant growth on year on year basis. This had direct impact on the seaborne trade and thus limiting the appetite for the new shipbuilding orders on the international stage.

Indian Shipbuilding Industry

6.20 The Indian shipbuilding industry still continues to be driven by the defence requirements and domestic demand primarily in coastal and inland vessels. As per published report, the Indian Navy's perspective plan aims to increase the Navy's fleet from the present 137 to 200 Nos. by 2027. This is expected to provide a spurt in the indigenous shipbuilding.

Besides, the Indian Navy's indigenisation plan is also expected to give a fillip to the growth of ancillaries and generally improve the shipbuilding environment in the country. The vision of GOI as per the draft Defence Production Policy, circulated recently was "To make India among the top five countries of the world in Aerospace and Defence Industries", with active participation of public and private sector, fulfilling the objective of self-reliance as well as demand of other friendly countries. In this segment, the Company has signed the contract for 8 Nos. ASW - SWC vessels (Anti-Submarine Shallow Water Craft).

6.21 Coastal shipping in India is waiting for a stimulus for its growth that is expected out of Sagarmala programme declared by Government of India in 2015. As part of the programme, a National Perspective Plan (NPP) for the comprehensive development of India's 7,500 km coastline, 14,500 km of potentially navigable waterways and maritime sector was published by Ministry of shipping in 2016. Port led industrialization, port modernisation, port development and connectivity enhancement is expected to create a wider impact in the coastal shipping & inland waterway segment in India. In the inland waterway segment, through the World Bank funded 'Jal Marg Vikas' Project, Government is aiming at increasing the inland waterway cargo movement from the current 8 million tonnes to 27 million tonnes in the next two years. \$88 million worth sanctions accorded to Assam Government is an additional boost to help



modernize Assam's passenger ferry sector that runs on its rivers including the mighty Brahmaputra. With these schemes, the Indian commercial segment projects a positive growth in shipbuilding segments too in a period of 3-5 years from now.

- 6.22 Cochin Shipyard has signed a contract on July 11, 2018 with IWAI for construction of 10 ROPAX/RORO vessels for use in inland waterways segment, 8 of them are delivered at Kolkata which will commence operations shortly.
- 6.23 The fishing vessels built by CSL under 'Blue Revolution Scheme' also has been a successful venture, and has generated demand for Engineered Fishing vessels in the Fishing Industry. The scheme introduced by Government of India aims for replacement of trawl fishing boats with deep sea fishing vessels in a phased manner with funding assistance from the Government of India and State Governments under 'Blue Revolution Scheme'. This helps in promoting sustainable fishing practices such as Gill netting and Long lining in the deep sea and also to provide necessary fishing infrastructural facilities to support deep sea fishing, which will be a game changer in Fishing industry too.

Indian Ship Repair Industry

- 6.24 As per the AT Kearney report, India has a market potential of ₹2,600 Crore from repair of domestic fleet out of which only 15% share is currently captured. The report has further highlighted that India can grow its ship repair industry to ₹9,000

Crore in the next 10 years through infrastructure and process improvement. The report has highlighted low levels of process efficiency, lack of infrastructure to service vessels above 10000 DWT and weak ancillary landscape as road blocks for developing the industry. A key recommendation of the report was to lease out the repair facilities at major ports to specialist to augment revenue opportunity.

HOOGHLY COCHIN SHIPYARD LIMITED (HCSL)

- 6.25 Hooghly Cochin Shipyard Limited (HCSL) was initially set up as a joint venture between CSL and Hooghly Dock & Port Engineers Limited (HDPEL). Pursuant to the approval of the Union Cabinet, HCSL became a wholly owned subsidiary of CSL with effect from November 01, 2019. HCSL aspires to establish itself as one of the leading shipbuilding yard in east coast for quality inland and coastal vessel construction.
- 6.26 During the financial year, the construction work kick-started with the activities under civil works package and the physical progress of civil works has crossed the 50% mark. Major tenders like electrical system, fire-fighting system, gas piping, critical machinery and cranes have been awarded and works are in progress. Other various packages are being finalized and will be executed to match with the progress of the project.
- 6.27 Due to the nationwide lockdown imposed on account of the COVID-19 Pandemic, the construction activities in Nazirgunge were

halted from March 23, 2020 to June 08, 2020 resulting in revising the project completion date to September 2021. However, all efforts are being made to complete the project and commence the operations of the yard within the original contractual completion date of June 2021 itself.

TEBMASHIPYARDS LIMITED (TSL)

- 6.28 As part of CSL's long term strategy, viz., CRUISE 2030, CSL aspires to achieve 6x-8x growth by 2030 and towards this the Company identified deep sea fishing vessel as one of the several opportunities. Since fishing vessel segment calls for a dedicated facility so as to cater to the large volume of business different from the conventional shipbuilding process, CSL was in search of a suitable facility to enter into this segment. During this period, CSL found an opportunity in TSL, Malpe which was undergoing Corporate Insolvency Resolution Process (CIRP) under the Insolvency and Bankruptcy Code, 2016 (IBC) and bidding for TSL through IBC was considered appropriate. Accordingly, after obtaining the approval of the Board, CSL submitted its Resolution Plan for acquiring the assets and facilities of TSL under the IBC. The Committee of Creditors (CoC) on December 26, 2019 approved the Resolution Plan. After successful passing of the Resolution Plan by the CoC of TSL, the Resolution Professional filed the Resolution Plan with the National Company Law Tribunal (NCLT), Chennai on December 27, 2019. The NCLT, after hearing, approved the Resolution Plan and

pronounced the Order on March 04, 2020. CSL is in the process of implementing the said Resolution Plan. However, due to the unprecedented outbreak of COVID-19 Pandemic and subsequent lockdown imposed by the Government Authorities, CSL approached the NCLT, Chennai to obtain suitable orders for exclusion of the period from March 15, 2020 to June 30, 2020 for payment of the bid amount under the Resolution Plan. The NCLT acceded to CSL's proposal and passed its Order on August 06, 2020 excluding the said period resulting in revising the last date of payment of bid amount to September 17, 2020. In compliance with the NCLT Order, CSL paid the bid amount for takeover of TSL on September 15, 2020 with effect from which TSL has become a wholly owned subsidiary of CSL.

SHIPPING CORPORATION OF INDIA LIMITED (SCI)

- 6.29 During the last 58 years, SCI has been providing yeoman service to the country's economy by meeting its ocean transportation requirements. Starting out as a Liner Shipping Company with 19 vessels with a capacity of mere 0.19 Million Dead Weight Tonnage (DWT) in 1961, SCI as on 31.12.2020 owns 59 vessels of 5.311 million DWT, 2.94 million GT and constitutes about 27% (in terms of DWT) of Indian tonnage.

Crude Transportation

- 6.30 India has one of the world's fastest growing energy markets. Energy security is of paramount importance. Looking at nation's immense energy needs for



growth, SCI gradually shifted its focus from liner business to energy transportation starting with crude oil transportation in 1964. SCI ordered several crude and product tankers in 1970s to exclusively meet the needs of the Indian Oil Industry. Today SCI has a fleet of 31 crude and product tankers in all sizes. SCI has five VLCCs and they are employed on a mix of time charter / voyage charter / COA in India centric as well as in open cross trade market. LNG Transportation

LNG Transportation

- 6.31 In 2004, SCI was the first Indian Shipping Company to have ventured into LNG Transportation and remains the only Indian Company operating in LNG sector in India. It co-owns four LNG Carriers in consortium with premier Japanese Companies and independently manages their techno commercial operations. Further, SCI had also signed MOU for post fixture management with GAIL for transportation of LNG from USA to India from 2016-17 for a period of 3 years. Also a JV in Hong Kong is formed for managing LNG vessels and is currently developing opportunities in providing O&M services to LNG FSRU's and FSU's. In order to ensure its presence in the new areas of the LNG market, SCI is exploring opportunities for participation by ownership and in operations of FSRU, small LNG carriers and coastal LNG shipping. SCI has trained its LNG officers on construction and operations of FSRU for which superintended was posted for supervision of FSRU construction.

Commodity & Product Transportation

- 6.32 SCI took fullest advantage of the recession in the shipping industry in early 1980 and did massive fleet acquisition (tankers as well as dry bulk vessels) to meet nations growing EXIM trade. In 1991, SCI diversified into cryogenic operations. As of date, SCI has 15 dry bulk carriers in various sizes and is employed on a mix of Time Charter & Voyage Charter and is trading India centric as well as cross trade market.

Container Movement

- 6.33 One of the strengths of SCI lies in having a diversified fleet. SCI is the only Indian Shipping Company providing container services which connects West Coast of India to East Coast of India and mainland to Port Blair. SCI has two container vessels in its fleet, which are deployed in the Indian Coastal Sector and they are the largest vessels on the Coast. Presence of SCI in this segment has proved to have a moderating effect on the freight rates, thus, protecting the interest of Indian Manufacturers, Exporters and a boon to the Coastal trade. During the COVID-19 crisis and related lock down period, SCI's coastal service was able to tide over the challenges by reorienting services by adding / omitting port calls as per needs & requirements of the trade with a view to ensure uninterrupted movement of essential commodities like wheat, rice, agricultural commodities etc. from surplus to deficient regions.

INDIAN MARITIME UNIVERSITY (IMU)

- 6.34 IMU is a teaching-cum-affiliating University established on 14th November,

- 2008 to provide quality maritime education, training and research. For the Academic Year 2020-21, 999 students were admitted in IMU Campuses and 1270 students were admitted in the Affiliated Institutes. As on date, there are 47 Ph.D Scholars and 6 MS (By Research) Scholars undertaking research work. IMU conducted its 5th Convocation on 14th February 2020 at IMU Headquarters, Chennai. During the year, IMU introduced Online Classes for all the degree (UG/PG) Programmes to maintain academic continuity during the COVID-19 lockdown period. IMU had already introduced online classes for Ph.D & MS (By Research) course work subjects since 2017.
- 6.35 Due to COVID-19, IMU conducted Online Proctored Examinations for Final Semester Students with a view to facilitate their placement and higher studies. The Online Proctored Examinations for final Semester Students were conducted between 14.09.2020 and 19.09.2020. Around 99% of students attended the examinations (8800 examinations). The students attended these examinations from their residence. The results were published within a week from the completion of examinations. Indian Navy has gifted a BER Gas Turbine to IMU Kolkata on 10.01.2021 for educational purposes. IMU is actively engaging with industry for promoting research activities, consulting projects and academic collaboration. Further, IMU is in the process of setting up a Chair in collaboration with Institute of Marine Engineers, India.
- 6.36 IMU has instituted a Mentorship Scheme in collaboration with the Company of Master Mariners of India (CMMI). IMU cadets are being mentored by industry experts to raise the competence of cadets and to align them with needs of industry. IMU is laying special emphasis to enhance the communication and critical thinking skills of cadets. In this regard, IMU has launched lecture series in collaboration with Institute of Chartered Shipbrokers.
- TARIFF AUTHORITY FOR MAJOR PORTS (TAMP)**
- Role & Functions of the Authority**
- 6.37 The Tariff Authority for Major Ports (TAMP) was created in 1997 by an amendment to the Major Port Trusts Act, 1963 and was constituted by the Government of India through a Gazette Notification on 10/04/1997. The regulatory jurisdiction of the Authority extends to all the Major Port Trusts and private terminals operating therein. The Authority is statutorily mandated to frame the Scale of Rates and Statement of Conditions for the services rendered by the Major Port Trusts and Private Terminals thereat as well as charges for use of port properties. The Authority consists of a Chairman and two Members. The sanctioned strength of officers and staff of the Authority is 36. Tariff Authority for Major Ports is an ISO 9001:2015 and ISO 27001:2013 certified organisation.
- 6.38 The Authority follows the following guidelines issued by the Government of India as policy direction u/s 111 of the



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Major Port Trusts Act, 1963 for regulating tariff of Major Port Trusts and Private Terminals operating thereat.

Sr. No.	Guidelines
(I).	Upfront Tariff Guidelines, 2008.
(ii).	Reference Tariff Guidelines, 2013.
(iii).	Guidelines for Determination of Upfront Tariff for Stevedoring and Shore Handling Operations, 2016.
(iv).	Berthing Policy for Dry Bulk Cargo for Major Ports, 2016.
(v).	Tariff Policy for Major Port Trusts, 2018.
(vi).	Tariff Guidelines, 2019, for regulation of tariff for BOT Operators operating in the Major Port Trusts who were governed by erstwhile Tariff Guidelines of 2005.

6.39 An exercise for review of Reference Tariff Guidelines, 2013 has been undertaken. In the meanwhile, the validity of the Reference Tariff Guidelines has been extended upto 08 March 2021 or until further order whichever is earlier. The

Authority has adopted a definite procedure for disposal of tariff cases. In order to promote participative approach in tariff fixing, special care is taken to give adequate opportunities to users to furnish written and / or oral submissions. Port-level joint hearings are organized to facilitate maximum participation of the greatest number of users to hear their arguments on all tariff proposals and final decisions are taken in the Authority meetings and tariff Orders are notified in the Gazette of India. This year the Authority has held 27 joint hearings till date through video conferencing in view of Covid-19 pandemic.

6.40 The Authority since inception has disposed of 1039 cases till 31 December 2020. Every notification, declaration, Order and regulation of the Authority made under the MPT Act is published in the Gazette of India. The details of the disposal of tariff cases during the period 2019-20 and during the period 01/04/2020 to 31/12/2020 is tabulated below:

Particulars	From 01/04/2019 to 31/03/2020	From 01/04/2020 to 31/12/2020
No. of Tariff cases approved	43	32

ANDAMAN LAKSHADWEEP HARBOUR WORKS

6.41 Andaman Lakshadweep Harbour Works (ALHW) a sub –ordinate office under Ministry of Shipping was established during 1965 for the service of A& N islands and Lakshadweep Islands. The ALHW is entrusted with the responsibilities of

formulating and implementing the programme of Ministry of Shipping for providing Port and Harbour facilities in Andaman & Nicobar and Lakshadweep Islands. From its inception, ALHW has been implementing the Port development schemes from the funds provided by Ministry of Shipping under Central Sector

Plan schemes starting from the Third Five Year Plan onwards. Apart from the creation of Port infrastructures, ALHW is also entrusted with maintenance of Port structures & Cargo Handling equipments under the funds provided by Andaman & Nicobar Administration and Lakshadweep Administration.

DREDGING CORPORATION OF INDIA LIMITED

6.42 Dredging Corporation of India Limited (DCI) was incorporated in March, 1976 with an authorized capital of Rs. 30 crore and paid-up capital of Rs. 28 crore. 1.44% and 20% of the share capital was disinvested by the Government in the years 1991-92 and 2003-2004 respectively. 5% of the share capital was further disinvested by the Government in the year 2014-15. During 2016-17 0.09% of the share capital was offered and purchased by the employees. The Government has sold the remaining 73.47% to the four ports – VPY, PPT, JNPT and DPT vide the Share Purchase Agreement dated 08/03/2019 along with transfer of management and control. Its shares are listed on Mumbai, Kolkata and National Stock Exchanges. The Company is engaged in providing maintenance and capital dredging services, beach nourishment, land reclamation, shallow water dredging, marine port construction activities, PMC services to Ports, Indian Navy etc. Located strategically on the eastern seaboard at Visakhapatnam, DCI helps in attaining and continuous availability of desired depths, in the shipping channels of major and minor

ports for fishing harbours, Indian Navy and other maritime organizations.

SAGARMALA DEVELOPMENT COMPANY LIMITED

- 6.43 The Union Cabinet, after approval of Cabinet Note on Sagarmala Programme, Concept and Implementation on 25th March 2015, gave approval for incorporation of Sagarmala Development Company (SDC) on 20th July 2016 with following decisions:
- a) Formation and incorporation, of the Sagarmala Development Company (SDC), under the Companies Act, 2013 and appointing Secretary (Shipping) as the ex-officio Chairman and a Board of Directors comprising of the Managing Director, two Functional Directors, one Government Director and two Non-Official (Independent) Directors of the SDCL.
 - b) Selection of the initial set of Managing Director and the two Functional Directors of the Company, through a Search-cum-Selection Committee to be headed by the Chairman, Public Enterprises Selection Board (PESB) with Secretary (Shipping), Secretary (DOPT) and an expert (to be nominated by the Ministry of Shipping from outside the Ministry) as members. The Government Director and two Non-Official (Independent) Directors, on the Company Board, shall be appointed by the Ministry of Shipping, after taking prior approval of the Competent Authority.
 - c) To set-up the SDC with an Initial Authorized Share Capital of Rs. 1,000 Crore and a Subscribed Share Capital of Rs. 90 Crore



- with the provision of increasing it in future if the need arises.
- d) A budgetary allocation of Rs. 250 Crore for FY 2016 -17 and an equal amount for each of the subsequent 4 years is solicited.
- e) 6.80 Sagarmala Development Company Limited (SDCL) was incorporated on 31st August, 2016 and it will raise funds as debt/equity(as long term capital), as per the project requirement, by leveraging resources provided by the Government of India and from multi-lateral and bilateral funding agencies. As per the approved structure of Sagarmala Programme, the implementation of the projects shall be done by the line ministries, State Governments/State Maritime Boards (SMBs) and SPVs and the SDCL will provide a funding window and/or implement only those residual projects that cannot be funded by any other means/mode.
- 6.44 SDCL endeavors to provide a framework and funding for ensuring integrated development of Indian maritime sector. These include Green field port/brown field port development, last mile connectivity to the ports and other relevant activities under Sagarmala Programme. With SDCL being a common equity investor and project development agency, it can lead to better communications and coordination among the different implementing agencies. The Company acts as a patient investor providing long-term equity as well as aims to provide residual capital to cover up equity short-fall in specific projects. SDCL also acts as the facilitator for pre-development tasks by providing support in project studies, DPRs, financing arrangements, facilitating approvals and clearances.
- 6.45 During 2018-19, the Sagarmala Development Company Limited infused Rs 125 Crore in the Krishnapatnam Railway Company Limited (KRCL). KRCL is tasked with the development of a double railway line between Krishnapatnam Port and Venkatachalam and single railway line between Venkatachalam and Obulavaripalle. This project will result in reduction of transit distance from the existing route by over 50 km. The train operations began in 2019. SDCL has also taken over the Indian Ports Global Limited (IPGL). Investment in Chabahar port through IPGL is first overseas strategic venture for India. The Chabahar project gives India a sea-land access route into Afghanistan and Central Asia through Iran's eastern borders. India, through IPGL, on 24th December 2018, took over operations at Chabahar port. With the objective of improving connectivity to Haldia Port, the Sagarmala Development Company Limited has also infused equity in an Road and ROB project connecting Haldia Port to the road network. SDCL invested Rs. 50 Crore in the SPV for this project formed with NHAI. SDCL has also invested equities of Rs. 284.5 Crore in Haridaspur-Paradip Railway Company Limited (HPRCL), government majority-owned SPV to improve connectivity to Paradip Port in FY 2019-20. With the objective of improving connectivity to

Haldia Port, the Sagarmala Development Company Limited has also infused equity in a Road project connecting VPT to the road network. SDCL invested Rs. 20 Crore in the SPV for this project formed with NHAI.

INDIAN PORT RAIL & ROPEWAY CORPORATION LIMITED (IPRCL)

6.46 In order to provide efficient rail evacuation systems to Major Ports and thereby enhance their handling capacity and efficiency, a proposal seeking approval of Cabinet to form a Special Purpose Vehicle (SPV) was mooted by the Ministry. The Cabinet approved the proposal of formation of SPV on 25th March, 2015. Based on this decision a company namely Indian Port Rail Corporation Ltd. (IPRCL) has been incorporated on 10th July 2015 under Companies Act, 2013, in which the subscribed share capital of Rs.100 Crore has been contributed by 11 Major Ports and Rail Vikas Nigam Limited (RVNL). The authorized share capital of the company is Rs.500 Crore. The company has subsequently further diversified into Ropeways and the name has accordingly been changed to "Indian Port Rail & Ropeway Corporation Limited".

Objectives of IPRCL

- a) To provide efficient and competitive rail evacuation systems to Ports in India by way of creating last mile connectivity of the ports;
- b) Modernization of the rail infrastructure at ports; creating and managing the internal port railway system.

c) Creation of new and enhancement of capacity in embedded hinterland connectivity.

d) To create railway infrastructure at Major Ports and other designated areas including land, building, locomotives and maintenance facilities for achieving the main objectives mentioned above.

e) To carry on the business of development, operations & maintenance of Ropeways and other modern transit systems;

f) To provide consultative and management services in all matters derived from domain expertise relating to all aspects of port infrastructure including railway, multimodal transport & port infrastructure, railway siding, locomotives, conveyor belts, land management etc. including policy formulation, promotion, development, implementation, construction, operation, maintenance, management and finance thereof.

g) To enter either alone or jointly with any other companies or persons in India or outside India, into contracts (on turnkey basis or otherwise) for the design, erection, construction, maintenance, alteration, repair, pulling down and restoration of railways, factories, mills, industrial plants, engines, machinery, works of all descriptions, including railways, tramways, waterways, road bridges, warehouses, factories, mills, museums, machinery, railway carriages, wagons, ships and vessels of every description, gas works, electric works, water works, drainage and sewage works



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and other public utilities, wharfs, docks, piers and buildings of every description in India and or outside India.

IPRCL Operations

6.47 In year 2019-20 major thrust of the management has been team and organization building for taking up direct execution of railway projects at all the

locations in various parts of India. IPRCL is in the process of capacity building and opening of offices at various locations all over India for better co-ordination and control of the projects being undertaken by it. IPRCL has directly executed projects for JNPT, DPT, KoPT, PPT, VPT and KPL during the year and this includes DPR preparation, PMC and Construction.

Important Projects completed during the Year 2019-20:

Sr No.	Name of Project	Port	Cost in Crores (Rs.)
1	Rail connectivity to berth No. 13, 14, 15 & 16 Phase-2 : Bridge and Track Linking Work	DPT	28.86
2	Design supply erection testing & Commissioning 25 KV, 50 Hz single phase traction overhead equipment and other associated modification work of Line no. 6 and 7 in the Haldia Dock Complex.	HDC	2.10
3	Extension of line No. 11 to 15 to full length at R&D yard	VPT	10.23
4	Supply of PSC sleepers and carting of sleepers from Dhanmandal Station of East Coast Railway to PPT	PPT	11.92

Financial Results:

6.48 During the financial year 2019-20, company achieved a total revenue of Rs. 234.53 crore as compared to Rs. 322.26

crore in the previous financial year. Further, our company has also achieved a Profit after Tax of Rs. 6.03 crore as compared to Rs. 19.88 crore in the previous financial year.

Financial Year	2016-17	2017-18	2018-19	2019-20
Total Income (Rs. Crore)	71.68	200.36	322.27	234.53
Net Profit / Loss (Profit After Tax)	8.54	13.16	19.88	6.03
Dividend (Rs. Crore)	NIL	NIL	7.084	NIL

INDIAN PORT GLOBAL PRIVATE LIMITED

- 6.49 In view of strategic interest of gaining reliable sea / land access route to Afghanistan and other Central Asian Countries, Ministry of External Affairs moved a Cabinet Note dated 5th September, 2014. As per para 12 of the said Note, it was proposed to establish a Joint Venture Company, comprising of Jawaharlal Nehru Port Trust (JNPT) and Deendayal (erstwhile Kandla) Port Trust (DPT) to enter into Contract with Iran's Port & Maritime Organization (P&MO) to participate in development of Phase 1 of Chabahar Port. Cabinet approved the Indian participation in Chabahar Port Development on 18.10. 2014. Accordingly India Ports Global Private Limited (IPGL) was incorporated on 22nd January 2015 with an authorized capital of Rs.10 crore and a paid-up capital of Rs. 5 crore. The two promoters were Jawaharlal Nehru Port Trust and Deendayal Port Trust, holding equity in the ratio of 60:40, respectively.
- 6.50 A Memorandum of Understanding (MoU) for development of Chabahar Port by India was signed in Tehran between India and Iran on 06th May 2015 by Minister of Shipping from the Indian side and Minister from the Iranian side, and thereafter the contract was signed on 23rd May, 2016 at Tehran (Iran) during the visit of Hon'ble Prime Minister of India to Iran. The Contract was signed between Aria Banader Iranian Port & Marine Services Company (ABI) of Iran and India Ports Global Ltd. (IPGL) of India for equipping and operating two terminals at first

development phase of Shahid Beheshti-Chabahar Port. The Ports & Maritime Organization of Islamic Republic of Iran (PMO) and Ministry of Shipping, Government of India were the Confirming Parties to the Contract.

- 6.51 Since there were challenges in activation of the Main Contract, the foundation of a short period Contract was laid during the visit of His Excellency President of Islamic Republic of Iran to New Delhi in February 2018. Resultantly a formal Short Lease Contract between the two sides was signed on 6th May 2018. For implementation of the same, an SPV India Ports Global Chabahar Free Zone (IPGCFZ) with 98% share holding by IPGL and 1% each by JNPT & DPT was incorporated in Iran. In order to insulate JNPT and DPT from possible impact of United State sanctions after US withdrew from the Joint Comprehensive Plan of Action, 100% equity shares of JNPT & DPT in IPGL have been purchased by Sagarmala Development Company Ltd. (SDCL) (a company under Administrative control of Ministry of Shipping).

- 6.52 Extension for the Short Lease Contract of Shahid Beheshti Port of Chabahar from June, 2020 to June, 2021. A consignment of two Mobile Harbour Cranes (MHC) to Iran's Chabahar port has been supplied, with a total contract value of over USD 25 Million under a contract agreement for supply of 6 MHC. The consignment of cranes arrived from Marghera port, Italy has been unloaded successfully on 18th January, 2021 at Chabahar port.



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HOOGHLY DOCK & PORT ENGINEERS LIMITED

6.53 Hooghly Docking & Engineering Limited (HDPEL), situated at Kolkata, is one of the oldest shipyards in India. It was established in 1819 in the private sector known as Hooghly Docking & Engineering Company Limited. On merger of the Port Engineering Works with Hooghly Docking & Engineering Limited, the Hooghly Dock & Port Engineers Limited was formed by an Act of Parliament titled "The Hooghly Docking and Engineering Company Limited (Acquisition and Transfer of Undertakings) Act, 1984". Government of India has nationalized the ailing company, so as to utilize the available infrastructure through adequate investment for modernization and increase the capacity for Ship Building and Ship Repair in the country. The nationalized Company had remained with the Ministry of Industry till 27.07.1986 and was thereafter transferred to erstwhile Ministry of Surface Transport and now it is under the administrative control of Ministry of Ports, Shipping & Waterways.

Rehabilitation-cum-restructuring of HDPEL

6.54 The Union Cabinet on 03rd October, 2019 has approved the proposal for Liquidation & Restructuring of and providing improved Voluntary Retirement Scheme (VRS) for the employees of Hooghly Dock & Port Engineers Limited (HDPEL). In view with the decision of the Union Cabinet Improved VRS has been successfully implemented in HDPEL, out of 43 employees in HDPEL, 42 employees opted

for improved VRS and 1 employee has been retrenched, who did not opt for improved VRS. Cochin Shipyard Limited (CSL) on 01.11.2019 transferred the book value to HDPEL towards the consideration for the transfer of 26% equity shares of Hooghly Cochin Shipyard Ltd. (HCSL) held by HDPEL and the amount has been transferred to PAO, DIPAM on 28.11.2019 making HCSL 100% subsidiary of CSL. Ownership of the land assets of HDPEL has been transferred to Ministry of Shipping, as per extant guidelines of Department of Public Enterprises dated 14.06.2018. Outright liquidation and winding up of HDPEL has already been initiated, technical evaluation of the Bids are under process for appointment of Insolvency professional in HDPEL.

CENTRAL INLAND WATER TRANSPORT CORPORATION LIMITED

6.55 CIWTC was incorporated on 22nd February 1967 incorporated in May 1967 as a Govt. of India Undertaking, when it took over all the assets and liabilities of the erstwhile River Steam Navigation Company Limited under a Scheme approved by the Calcutta High Court on 03.05.1967. However, due to inherent limitations and infrastructure bottlenecks in the water transport sector, the operations of CIWTC could never become viable and the company incurred operational losses in each Financial Year since its inception and surviving on the support/Grants-in-aid on Govt. of India for payment of salary/wages and other statutory dues of its employees. The Cabinet on 31st August, 2016 approved a

- proposal for Dissolution of Central Inland Water Transport Corporation Ltd. (CIWTC) including Disposal of movable and immovable assets , improved Voluntary Retirement Scheme (VRS) for the remaining five employees with provision of Compulsory Retirement (CR) in case of unwillingness and Winding up of CIWTC as per provision of Companies Act, 1956. All the land parcels of CIWTC have been transferred/handed over to Central Government, CPSEs etc. and all the movable assets have been disposed.
- 6.56 Pursuant to the Cabinet decision for voluntary winding-up of CIWTC, the company on 19.12.2017 had appointed an Insolvency Professional for conducting voluntary liquidation in terms of Insolvency & Bankruptcy Code, 2016. However, in view of the claims made by Kolkata Port Trust (KoPT) and Garden Reach Shipbuilders & Engineers (GRSE), the Liquidator of CIWTC on 21.06.2018 filed an application with National Company Law Tribunal (NCLT) in terms of Regulation 40(2) of Insolvency and Bankruptcy Board of India Regulations, 2017 for suspending the process of voluntary liquidation of CIWTC and for further directions. The Hon'ble National Company Law Tribunal, Kolkata Bench, Kolkata on 28.09.2018 by its impugned Order suspended the voluntary liquidation of the Appellant and rejected the prayer for conversion to an application under section 271 of the companies act, 2013 for winding up and compulsory liquidation.
- 6.57 NCLAT vide Order dated 07.08.2019 has disposed the case directing CIWTC to move before Adjudicating Authority (National Company Law Tribunal NCLT, Kolkata) with the request to act under Section 59 of Insolvency and Bankruptcy Code, 2016 in view with the Govt. of India, Ministry of Shipping decision vide meeting dated 05.07.2019 to consent for Voluntary Liquidation of CIWTC and taking into account consideration the claim of Garden Reach Shipbuilders & Engineers Ltd. (GRSE) and Kolkata Port Trust (KoPT) and order of release of certain fund. The Adjudicating Authority, after hearing the parties will pass appropriate order in accordance with law. CIWTC on 18.11.2019 filed an application before NCLT, Kolkata in view with the directives of NCLAT, Delhi. The decision of NCLT, Kolkata is awaited
- SETHUSAMUDRAM CORPORATION LIMITED**
- 6.58 Sethusamudram Corporation Limited (SCL) is an SPV set up under the Companies Act in the year 2004, with the approval of Cabinet, to implement the Sethusamudram Ship Channel Project (SSCP). Due to various litigations against the SSPC, the work has been stalled by an order of Hon'ble Supreme Court in August, 2007 and since July, 2009 all work has been stopped at the project site.



Chapter - VII

INLAND WATER TRANSPORT



M.V. SANKARDEV VESSEL PLYING ON NATIONAL WATERWAY

Introduction

7.1 The Inland Water Transport (IWT) mode is widely recognized as a fuel efficient, environment friendly and cost effective mode, especially for bulk goods, over dimensional cargo and hazardous goods. The primary requirement for making this mode commercially viable is development of IWT infrastructure (fairway, terminals and navigation aids) and at the same time creating an enabling environment for augmentation of IWT fleet, primarily by the private sector. Inland Waterways Authority of India (IWAI) is now focused on developing the technically and economically viable National Waterways

under the National Waterways Act, 2016 in order to create IWT network across the country to supplement already congested road and rail networks.

7.2 The IWAI was set up on 27th October 1986 vide Inland Waterways Authority of India Act, 1985, for regulation and development of inland waterways for the purposes of shipping and navigation, and is inter-alia responsible for development, maintenance and regulation of National Waterways (NWs). The development and regulation of waterways which are not declared as NWs remain under the domain of the respective State Governments.

National Waterways-1, 2, 3, 4 & 5

7.3 National Waterway - 1 (Ganga - Bhagirathi-Hooghly river system from Allahabad to Haldia), National Waterway – 2 (River Brahmaputra from Dhubri to Sadiya), National Waterway-3 (West Coast Canal from Kottapuram to Kollam along with Udyogmandal and Champakara Canals) have already been developed with fairway, navigational aids, jetties and terminals with mechanized equipment handling facilities for loading and unloading of cargo. These waterways are operational and vessels are plying on these National Waterways. Fairway development works in Vijayawada – Muktyala stretch of river Krishna (part of NW-4) under Phase – I are in progress at a cost of Rs. 96 Crore. Development of NW-5 has been initiated with Monthly Longitudinal Thalweg Survey in Pankapal-Dhamra Port – Mangalgadi-Paradip Port stretches and consultancy work for studies including EIA-EMP are underway.

National Waterway-1

7.4 The Ganga – Bhagirathi – Hooghly river system between Haldia (Sagar) and Allahabad (1620 km) was declared as National Waterway-1 (NW-1) in 1986. Since then IWAI is carrying out various developmental works on the waterway for improvement of its navigability and also development and maintenance of other infrastructure such as navigation aids and terminal facilities as laid down in the IWAI Act, 1985 (82 of 1985). During 2019-20, the important measures like River Conservancy works (dredging & bandalling) carried out for development & maintenance of fairway along with navigational aids and terminal facilities on NW-1. The stretch-wise following Least Available Depth (LAD) is maintained by deploying 11 nos. Departmental dredgers along with 13 nos. survey vessels for monitoring:

(a)	Haldia – Farakka stretch	560 km 2.6 m to 3.00 m
(b)	Farakka – Barh stretch	400 km 2.1 m to 3.00 m
(c)	Barh – Ghazipur stretch	290 km 1.5 m to 2.50 m
(d)	Ghazipur – MMT Varanasi	140* km 1.1 m to 2.20 m

The LAD ranging of 0.8 - 1.5 m was naturally available in MMT Varanasi - Allahabad/ Prayagraj (230 km) stretch of NW-1.

7.5 Fixed terminals at GR Jetty-2 (Kolkata), Patna (Low level and high level) are operational and in-use. Pakur & Farakka

jetty are also available for utilization. Another Multi-Modal Terminal (MMT) at Sahibganj (Jharkhand) on NW-1 under World Bank assisted Jal Marg Vikas Project (JMVP) was inaugurated on 12.09.2019 by the Hon'ble Prime Minister through video



conferencing. One Multi-Modal Terminal (MMT) at Varanasi (U.P.) already inaugurated by the Hon'ble Prime Minister on 12.11.2018 and both are operational. The details of Jal Marg Vikas projects may be seen in a separate section of this report. Further 20 floating terminals have also been provided on NW-1 for berthing of vessels/ embarking-disembarking & logistic support at following locations:

- (I) Haldia, Budge-Budge, BISN, Botanical Garden (Kolkata), Shantipur, Swaroopganj, Katwa, Hazardwari, Downstream (D/s) Farakka and Upstream (U/s) Farakka in West Bengal;
- (ii) Rajmahal (Manglahat) and Sahibganj (Samdaghata) in Jharkhand and Bateshwarthan, Bhagalpur, Munger, Semaria & Buxar in Bihar; and
- (iii) Ghazipur / Rajghat, Ramnagar (Varanasi) and Allahabad terminals in Uttar Pradesh.

Jal Marg Vikas Project

7.6 Inland Waterways Authority of India is implementing the Jal Marg Vikas Project (JMVP) for capacity augmentation of navigation on NW-1 (Haldia-Varanasi stretch) with the technical assistance and financial support of the World Bank at an estimated cost of Rs. 5,369.18 crore (Revised project cost Rs. 4633.81 Cr.) The project implementation is planned to be completed by December, 2023 as per the loan agreement signed by DEA with World Bank. On completion, JMVP will provide a supplementary, cost-effective, safe and environment-friendly mode of transport,

giving the cargo operator modal choice of transport and enable socio-economic growth in Uttar Pradesh, Bihar, Jharkhand and West Bengal. The progress achieved under each component of JMVP during the period of report is summarised below:-

Fairway Development

- 7.7 The fairway development consists of (i) provision of least assured depth in the fairway from Haldia to Varanasi; (ii) bank protection works; (iii) river bend correction upstream of the Farakka Navigation Lock; and (iv) provision of Navigation Aids & RIS.
- 7.8 Dredging Management Plan (DMP) in consultation with Expert Committee including NTCPWC, IIT-Madras has been prepared and approved by IWAI Board for implementation:-
 - a) Provision of least assured depth (LAD) of 3m and bottom channel width of 35/45 m on the Farakka-Kahalgaon stretch (146 Kms), Sultanganj-Mahendrapur stretch (74 kms) and Mahendrapur-Barh stretch (71 kms) through Performance Based Assured Dredging contracts. The contracts were awarded to M/s Adani Ports & SEZ Ltd. on 9.04.2018, 12.04.2019 and 12.04.2019 at costs of Rs. 177.00 Crore, 159.30 Crore and 182.9 Crore respectively. The financial progress as on November 2020 (1) Farakka-Kahalgaon stretch: Rs. 70.68 Crore; (2) Sultanganj-Mahendrapur stretch: Rs. 24.81 Crore; and (3) Mahendrapur-Barh stretch: Rs. 26.56 Crore.

- b) On the advice of NTCPWC of IIT-Madras on dredging strategy plan for providing an LAD of 2.5 m and bottom channel width of 30 m on the Barh-Majhaua stretch through Departmental Dredgers on O&M Contracts; and on Majhaua-Ghazipur stretch and Ghazipur-Varanasi stretch through Quantity Based Maintenance Dredging contract are under finalization.
Barh – Digha – Majhaua
Majhaua – Ghazipur
Ghazipur – Varanasi
Tribeni – Farakka
 - c) Tribeni - Farakka – NIT for this stretch has been released on 21.11.2020. The pre-bid was schedule on 08.12.2020
 - d) Tenders for Least Assured Depth on Barh-Digha and Digha- Majhaua stretches were floated on 20.11.2019. Due date of submission of bids was 23.03.2020. Due to COVID-19 no bids were received.
 - e) All the awarded contracts are to be completed by March, 2023.
 - f) Presently, no dredging is planned on the Kahalgaon-Sultanganj stretch (50 km) due to the presence of Dolphin Sanctuary.
- 7.9 DGPS reference station with MF link was established at Swaroopganj with a view to provide sub-meter accuracy in position fixing so as to facilitate the operators to navigate their vessels smoothly and effectively along the navigational channel. The River Information System was made fully operational to monitor vessel movements through remote base stations

at Haldia, Garden Reach (GR) Jetty, Tribeni, Swaroopganj, Kumarpur, Ballia and Farakka. These stations were integrated into two control stations at Farakka and GR Jetty. Both the control stations would monitor the vessels plying in this river stretch via Automatic Identification System (AIS) and communicate with vessels via VHF. 30 IWAI vessels were equipped with Inland AIS system, short range radar and VHF.

Multimodal terminal at Varanasi

- 7.10 The multimodal terminal, with a capacity of 1.26 MTPA was inaugurated by the Hon'ble Prime Minister on 12.11.2018. The construction of a 650 mtr long two-lane road connecting the Multi-Modal Terminal with NH-7 and a 35 mtr long and 5.8 mtr wide Truss Bridge) was completed and operationalised on 11.01.19. Rail connectivity from the IWT Terminal to Jeonathpur railway station on the Eastern Dedicated Freight Corridor (EDFC) is planned. The rail alignment is under finalisation in consultation with the Dedicated Freight Corridor Corporation of India and North Central Railway.
- 7.11 The proposal for Equip, Operate and Transfer (EOT) at the multimodal terminal at Varanasi to be awarded to a private operator under the PPP Model on was appraised and recommended for approval by the Standing Finance Committee (SFC), chaired by Secretary, Ministry of Ports, Shipping and Waterways, on 23.04.2020. Bid documents for the same were released on 14.05.2020. Two pre-bid meetings



were conducted viz. 10.07.2020 and 26.08.2020. Tariff proposal (to be applicable) for Varanasi MMT EOT bidding was approved by the IWAI Board during the 173rd Board meeting on 22.10.2020.

- 7.12 The Standing Committee of National Board for Wildlife, in its meeting held on 15.05.2017, had recommended grant of permission for movement and plying of inland vessels through the Kashi Turtle Wild Life Sanctuary at Varanasi subject to IWAI taking the standard mitigation measures prescribed by the Wildlife

Institute of India and conditions prescribed by the State Chief Wildlife Warden. IWAI has complied with/is complying with these mitigation measures as per the stipulations. Further, Govt. of UP vide notification dated 17.03.2020 has de-notified the existing Turtle Sanctuary.

Multimodal Terminal at Sahibganj

- 7.13 The multimodal terminal, with a terminal capacity of 3.03 MTPA, is constructed in two phases in Samdanala Village of Sahibganj. Hon'ble Prime Minister inaugurated the terminal on 12.09.2019.



- 7.14 Rail connectivity is proposed from the terminal to Sakrihali railway station. The rail alignment is under finalization. The operation, management and development of the multimodal terminal at Sahibganj is proposed to be awarded to a private operator under the PPP Model on tender-cum-auction basis. RFQ has been issued on 14.08.2019. Pre-application meeting was held on 24.09.2019. The PPPAC Memo has been referred for appraisal to the Department of Economic Affairs.



Photos of the Sahibganj multimodal terminal

7.15 Sahibganj MMT OMD project was appraised and recommended for approval by the Public Private Partnership Appraisal Committee (PPPAC), chaired by Secretary, Department of Economic Affairs, on 01.06.2020. Final approval was received from Ministry of Ports, Shipping and Waterways on 09.11.2020 and RFQ for the same was released on 12.11.2020. Since a two-stage procurement process is being followed for this project, bid documents will be released to qualified bidders identified during the RFQ process.

Multimodal Terminal at Haldia

7.16 The multimodal terminal at Haldia, with a terminal capacity of 3.07 MTPA, is being constructed in two Phases on a 61 acres land in the Haldia Dock Complex leased from the Kolkata Port Trust (KoPT) on 30 year tenure. The work on Phase-I was awarded to M/s ITD Cementation at a cost of Rs. 517.36 Crore on 30.06.2017, The

physical progress is 94.06% and financial progress is Rs. 441.85 Crore as on November, 2020. Rail alignment for connectivity from the terminal is under finalisation in consultation with the Haldia Dock Complex.



Photos of the under construction Haldia multimodal terminal

7.17 The proposal for Equip, Operate and Transfer (EOT) at the multimodal terminal at Haldia to be awarded to a private operator under the PPP Model on was appraised and recommended for approval by the Expenditure Finance Committee



MINISTRY OF PORTS, SHIPPING & WATERWAYS

(SFC), chaired by Secretary, Ministry of Ports, Shipping and Waterways, on 23.04.2020. Bid documents for the same were released on 14.05.2020. Two pre-bid meetings were conducted viz. 10.07.2020 and 26.08.2020. Tariff proposal (to be applicable) for Haldia MMT EOT bidding was approved by the IWAI Board during the 173rd Board meeting on 22.10.2020.

Navigational Lock at Farakka

7.18 The new navigational lock is being constructed on 14.86 ha of land in the Farakka Barrage Project (FBP), taken on transfer from the FBP on 02.03.2016. The construction work of this lock, awarded to M/s Larsen & Toubro Ltd. on 24.11.2016 at a cost of Rs. 359.19 Crore has achieved physical progress of 74.46% (November,2020) and financial progress of Rs. 250.00 Crore as on 30.11.2020.

Intermodal terminal at Kalughat and Ghazipur

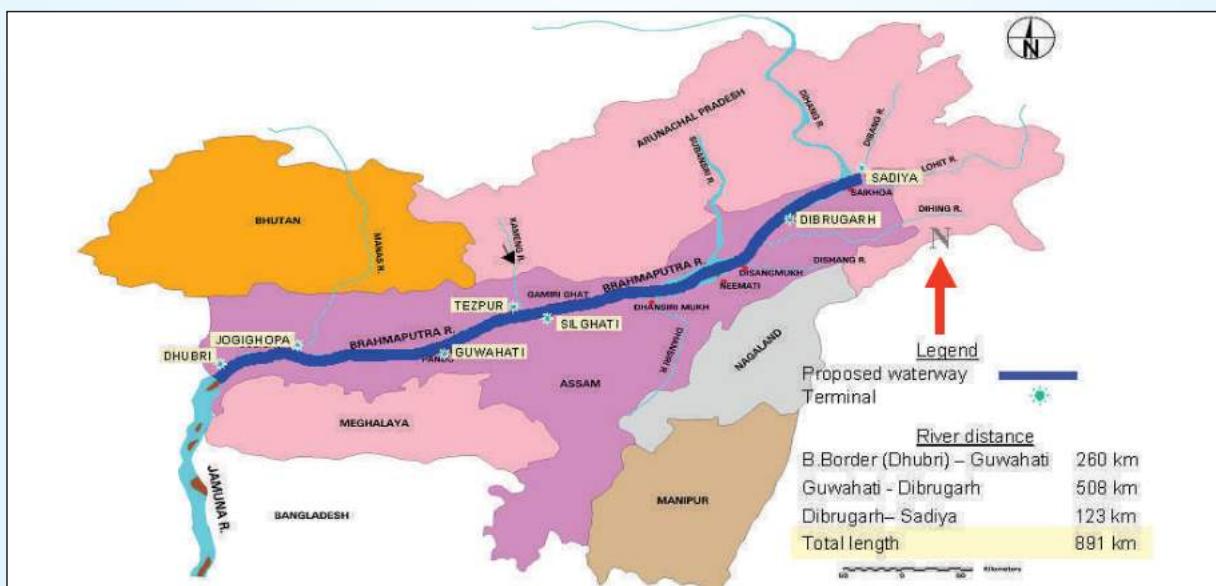
7.19 An intermodal terminal is proposed to be constructed on 5.159 ha (12.80 acres) of

land in Kalughat, Saran district of Bihar, with road connectivity to NH-19. SIA study of the proposed land is completed. Possession Certificate of 13.17 acres of land received on 26.09.2020. DPR is ready and tender process for award of work is in progress. The Terminal is being planned to handle mostly container traffic destined to Nepal.

7.20 An intermodal terminal is proposed to be constructed on 8.917 ha of land in Ghazipur, Uttar Pradesh. 4.386 ha of land has already been acquired and registered with IWAI. Balance 4.531 hac. of land is at an advanced stage of acquisition. DPR is ready. Tender process has been kept on hold due to poor response shown by the prospective bidders in a stakeholder meeting held in Mumbai.

National Waterway-2

7.21 National Waterway-2 comprises of river Brahmaputra from Dhubri to Sadiya , a stretch of 891 km in the state of Assam. A navigable fairway of minimum 45 m width and 2.5 m Least Available Depth (LAD) was



maintained by the IWAI in Dhubri-Pandu (255 km) and Pandu-Neamati (374 km) stretch. In Neamati-Dibrugarh stretch, 2.5 m LAD was maintained for 330 days. In Dibrugarh-Sadiya (Oriumghat) stretch, LAD of 1.5 m was maintained for 330 days. Night navigation facilities provided between Dhubri and Silghat can be extended in a short period of time depending upon demand.

7.22 Currently, there are three road bridges across river Brahmaputra at Guwahati, Tezpur, Sadiya and three rail cum road bridges at Jogighopa, Guwahati and Bogibeel for connectivity between southern and northern parts of Assam. People residing on either side of the river need to cross the river using conventional ferry service at various locations for their day to day needs.



Containerized cargo transportation from Haldia on NW-1 to Pandu on NW-2

7.23 Earlier, IWAI had started a similar Ro-Ro service between Dhubri and Hatsingimari which reduced the travel distance by 190 km. A permanent Ro-Ro terminal was constructed at Dhubri for the purpose to provide a direct link between Assam and Meghalaya avoiding circuitous route of 220 km through Jogighopa, Ro-Ro

operation between Dhubri&Hatsingimari has been established. WAI has deployed its own modern Ro-Ro Vessel M.V. Gopinath Bordoloi for Ro-Ro operation in this route from July, 2017. Two Ro-Ro routes are under operation viz. (i) between Neamati to Kamalabari and (ii) between Hatsingimari and Dhubri. Ro-Ro terminals



are also proposed at Neamati-Kamalabari and Maijan (Dibrugarh) to Sengajan are proposed for which DPR has been prepared. IWAI have deployed 4 nos. of Departmental Dredgers and 6 nos. of Survey Launches in NW-2.

7.24 The IWAI had launched a Roll on-Roll off (Ro-Ro) service from 11th October-'2018 in Assam from Neamati to Majuli Island. The new Ro-Ro facility has been started in collaboration with the Government of Assam to provide the much-needed connectivity for Majuli Island. This service has reduced the road route distance of 423 km that trucks take from Neamati to Majuli Island via Tezpur Road Bridge to only 12.7 km with the use of river route. Majuli is one of the biggest riverine islands (144 km²) in the world located on river Brahmaputra and faces serious challenges of connectivity. It has 144 villages with a population of over 1,50,000.

7.25 The IWAI had procured a new vessel MV Bhupen Hazarika at a cost of Rs 9.46 Crore for the new service from Neamati to Majuli island and is also providing the needed terminal infrastructure. The 46.5 metre long, 13.3 metre wide vessel has the carrying capacity of eight trucks and 100 passengers. The IWAI is also planning to procure more such Ro-Ro vessels for use on river Brahmaputra.

National Waterway (NW)-3

7.26 On NW-3 in Kerala, the important works carried out during 2019-20 which include development of the navigation channel with the specified dimensions by

undertaking dredging in all stretches except a 1.00 km long shoal in Kayamkulam Kayal and 1.10 km to be dredged in various shoals in Edappallikotta –Kollam stretch.

7.27 The progress of capital dredging and widening of narrow sections in NW-3 has been experiencing delay over the years due to various local issues related to disposal of dredged material, demand for extra bank protection and dredged spoil, frequent stoppage of works and litigations by the local people and objection by the fishermen. With new regulations regarding protection of wet lands etc., identifying disposal sites for material dredged from National Waterway has become extremely difficult. To resolve such problems and take the works forward, IWAI is regularly interacting with the State Government, but still, the long-drawn process for allotting dumping sites is causing considerable underutilization of IWAI's dredging capacity in NW-3.

7.28 The Irrigation Department of Govt. of Kerala was entrusted with reconstruction of new navigational lock at Thrikkunnappuzha (with dimensions of 61m long, 14.75m wide and 6m (above HFL) vertical clearances), at a cost of Rs. 38 Crore on deposit basis. IWAI has deposited a total amount of Rs. 27 Crore to Govt. of Kerala. The construction of lock-gate is in progress by Irrigation Department, Govt. of Kerala on deposit basis.

The Irrigation Department Government of Kerala was entrusted with the modernization work of 40 feet wide lock

gate at Thannermukkam for the replacement of old Mild steel shutters to stainless steel shutters at a total cost of Rs. 2.85 Crore on deposit basis. As a result, the shutters are free from corrosion so that the maintenance cost of the lock can be reduced in large extend. The project was completed during the year and commissioned on 17.03.2020 after satisfactory trial run. Now the lock is ready for operation and facilitating movement of larger vessels through the lock towards upstream and downstream of west coast canal (NW.3)

- 7.30 Cargo terminals have been constructed at 9 places (viz. Kottappuram, Aluva, Maradu, Vaikkom, Thanneermukkam, Alappuzha, Thrikkunnappuzha, Kayamkulam, and Kollam). The above terminals are not attracting expected cargo mainly due to reluctance on the part of consigners and consignees to accept a mode shift to IWT mode. Hence 3 terminals handed over (Kottappuram, Aluva and Kollam) to KSWC (Kerala State Warehousing Corporation) for utilization of terminals on lease basis.
- 7.31 Two Roll-on/Roll-off terminals within the Cochin Port area, one at Bolghatty and the

other at Willington Island have been constructed by IWAI through Cochin Port Trust to provide connectivity with ICTT, Vallarpadam. By utilizing this facility, trucks/ trailers bound for Vallarpadam need not pass through the congested roads of Kochi city. These terminals were in operation from February-2011 to June-2017. Total 2.58 lakh TEU's have been transported between these terminals by a Ro-Ro vessel operated under a contract with a private operator, till the operation was terminated in June 2017 due to the dispute between Operator and CoPT. In terms of tones, total cargo moved in NW-3 in an organized way by barges during 2019-20 was 5.74 lakh tones, which mainly consists of Sulphur, Phosphoric Acid, Liquefied Ammonia Gas, Rock Phosphate etc.

- 7.32 A total number of 312 Solar powered lighted FRP buoys and 17 Beacon lamp posts were maintained by IWAI along Champakkara & Udyogmandal Canals and Kottapuram – Kollam (West Coast Canal) stretches of NW-3 to facilitate round the clock safe navigation.



Solar Powered FRP Buoy installed in NW-3



Beacon lamp in NW-3



MINISTRY OF PORTS, SHIPPING & WATERWAYS

National Waterways (NW-4)

- 7.33 Development work has been initiated on NW-4 between Vijayawada and Muktyala stretch of Krishna River at a cost of Rs. 96

Crore. Land acquisition for the construction of Ro-Ro terminals is in progress in consultation with the Government of Andhra Pradesh.

National Waterway (NW)-5

- 7.34 The Phase-wise break up for the development of NW-5 are as under:-

Paradip/Dhamra to Pankapal (viaKani River)	212 km
Pankapal to Talcher (River Brahmani)	112 km
East Coast Canal (Charbatia to Geonkhali) & Matai Riever (Charbatia to Dhamra)	256 km
Total	588 km

- 7.35 Based on the feasibility studies conducted, DPR prepared during 2016 and also keeping in view the potential of cargo movements as emanated through various studies, it was decided to initially develop 332 km of economically & commercially viable stretch of NW-5 between Paradip/ Dhamra and Talcher in following two phases:-

- a) Phase-I: Between Paradip / Dhamra and Pankapal – 212 km.

- b) Phase-II: Pankapal to Talcher – 120 km.

- 7.36 Preparatory work in Phase-I covering 212 km between Paradip / Dhamra and Pankapal is being taken up. Preliminary activities such as thalweg survey & studies are in finalized stage and Hydrographic survey in Phase-II covering 120 kms. from Pankapal to Talcher has completed in October, 2020.

- 7.37 Consultancy service for preparation of Detailed Project Report (DPR) followed by

Front End Engineering Design (FEED) for construction of 4 Weirs/Barrages with 3 navigational locks, 2 Check Dams & 1 Rubber Dam with navigational lock etc. between Paradip / Dhamra and Pankapal stretch (Phase – I, 212 km) on NW- 5, Odisha was awarded to M/s Tractebel Engineering Pvt. Ltd. The Draft design of W1, W2, W3, W4, W5, C1&C2 have been prepared and submitted to CWC for examination and vetting under intimation to WRD, Odisha on dated 03-09-2019, 27-09-2019, 05-11-2019, 22-11-2019 & 06-12-2019. Vetting from CWC, New Delhi is awaited.

Status of 106 New National Waterways (Nws) :

- 7.38 Under the National Waterways Act, 2016, 106 new NWs were declared as NWs in addition to the existing five NWs. The feasibility study and the DPRs of 106 NWs have been completed. After detailed analysis of the outcomes and recommendations of the FRs/ DPRs, input

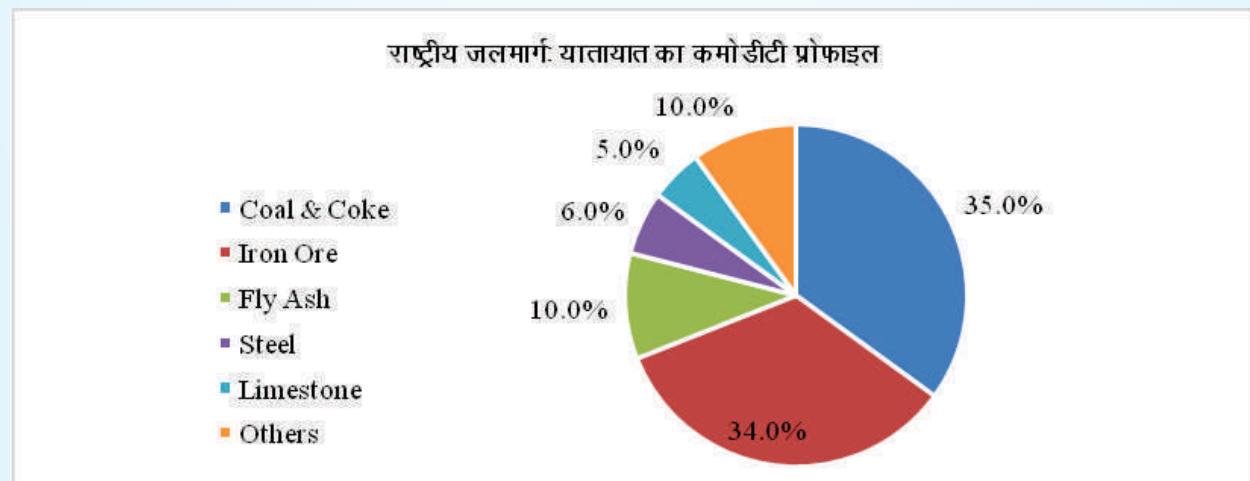
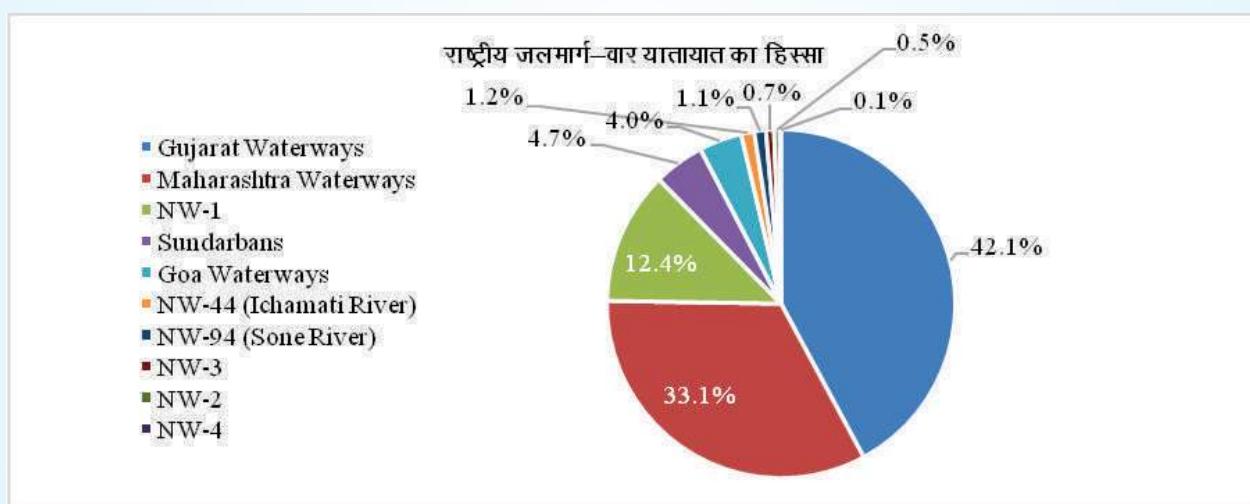
from stakeholders, 106 NWs have been categorized into three categories and mentioned below:-

1.	Category 'A': Feasible NWs with Cargo	18 Nws
2.	Category 'B': Feasible NWs with only Tourism potential/ Ferry/ Cruise	25 Nws
3.	Category 'C': NWs not feasible for Cargo/ Cruise	63 Nws
Total		106 Nws

Traffic Highlights

7.39 The total traffic movement on NWs in the FY-20 was recorded at 73.64 million tonne as against 72.3 million tonne in FY-19 thereby recording a YoY growth of approx. 2%. The number of operational NWs in FY-

20 increased to 16 as against 13 in FY-19. In FY-20, traffic movement on NW-16 (River Barak), NW-44 (River Ichhamati) and NW-94 (River Sone) was included. The following table presents the details of traffic movement on different NWs.





MINISTRY OF PORTS, SHIPPING & WATERWAYS

Key developments / initiatives taken place during FY 2019-20 and FY 2020-21

Agreement on addition of new routes and Ports of call under PIWT&T

- 7.40 2nd Addendum to the Protocol on Inland Water Transit & Trade (PIWT&T) between the Government of India and Bangladesh was signed on 20th May, 2020 with additional new routes (Badarpur, Sonamura, Kolaghat, Maia and Jogighopa in India and Ghorasal, Daudkandi, Sultanganj, Aricha and Bahadurbad in Bangladesh).



Delegates from India and Bangladesh at 20th SCM of PIWT&T

Transportation of transit cargo from Bhutan to Bangladesh

- 7.41 Transit transportation of Bhutanese bulk cargo (Stone aggregates) to Bangladesh via NW-2 and IBP routes commenced on 11th July 2019. The IWAI vessel MV AAI carrying stone aggregates was digitally flagged off from Dhubri on NW-2 by Hon'ble Minister of State (Independent

Charge) for Shipping. After that, more than 28 movements of Bhutanese cargo from Dhubri to Bangladesh via NW-2 / IBP routes took place in FY-20 and FY-21 using shallow draft Bangladeshi vessels. The route has the potential to become a popular mode of choice for trade between Bhutan & Bangladesh.



Hon'ble Minister of State (Independent Charge) for Shipping, Shri Mansukh Mandaviya digitally flagged off first movement of Bhutanese Goods from Dhubri destined to Bangladesh

Stakeholder consultation events

7.41 IWAI carried out stakeholder consultations at six different locations (Kolkata, Kochi, Mumbai, Patna, Goa and Dhaka) in FY 19-20. Cumulatively, these interactions were attended by approx. 500 stakeholders and

helped in promoting waterways as a mode of transportation and understanding expectations and feedback of stakeholders. IWAI is undertaking targeted initiatives to address the expectation and feedback received to further enhance traffic on NWs.



Dr. Amita Prasad, Chairperson, IWAI making a presentation on Goa Waterways



Dr. Amita Prasad, Chairperson IWAI making a presentation on emerging opportunities due to operationalization of IBP route at the stakeholder conference



National Inland Navigation Institute (NINI) at Patna

7.42 NINI was established by IWAI at Patna and has been functional from February 2004. Induction courses for deck and engine ratings, preparatory courses for Serang and engine drivers, basic and advanced dredging courses, refresher courses for hydrographic surveyors, courses for repair and maintenance of vessels, etc. are conducted in NINI regularly. So far, a total 10130 candidates have been trained at NINI till 30th November, 2020.

INTERNATIONAL COOPERATION

Bangladesh

Indo Bangladesh Protocol on Inland Water Transit & Trade (PIWTT)

7.43 A Protocol on Inland Water Transit and Trade (PIWTT) exists between India and Bangladesh under which the two Governments have made mutually beneficial arrangements for the use of their waterways for movement of cargo between the two countries for passage of goods between two places in one country through the territory of the other, in accordance with the laws of the country through the territory of which goods are moving. The Protocol is valid upto June 2025. Under this Protocol, Inland vessels of both the countries can ply on the

designated protocol route and dock at Ports of Call in each country, notified for loading / unloading of cargo. There has been significant improvement in the movement of cargo vessels in an organized manner on the Protocol route carrying both the transit cargo to NE region of India and vice-versa and export-cargo to Bangladesh. The Indian transit cargo is mainly coal, fly-ash, POL and ODC for power projects in NE region. The other potential cargo for movement is fertilizers, cement, food grains, agricultural products, containerized cargo etc. The export cargo from India to Bangladesh is mainly fly-ash which is to the tune of 30 lakhs MT per annum. Around 638 inland vessels (including 600 Bangladeshi flag vessels) completed approximately 4000 loaded voyages annually on IBP routes.

7.44 For making the Protocol more effective, many landmark decisions were taken in the last two Secretary Shipping Level Talks held in October, 2018 in New Delhi and in December, 2019 in Dhaka. Some of the decisions taken during these talks included extension of protocol routes, inclusion of new routes and declaration of new Ports of Call to facilitate trade between the two countries. These decisions are given effect with the signing of 2nd addendum under PIWT&T on 20th May, 2020 at Dhaka, Bangladesh.



Secretary, M/o PSW of India and Secretary, M/o Shipping, Bangladesh
exchanging documents at Dhaka, Bangladesh

Use of Chattogram and Mongla ports for movements of transit goods from India

7.45 Bangladesh has allowed India use of its Chattogram and Mongla Ports for transit movement of Indian goods through waterways, rail, road or multi-modal transport in its territory for which a Standard Operating Procedure (SOP) was signed by the two countries on 5.10.19. The alternative connectivity is expected to boost development of the North East Region (NER) by increasing trade volumes and reducing logistic costs. Eight routes are provided under the Agreement which would enable access of NER via Bangladesh.

Development of fairway from Sirajganj to Daikhowa and Ashuganj to Zakiganj on Indo-Bangladesh Protocol route

7.46 India and Bangladesh have signed an MoU for development of fairway from Sirajganj to Daikhowa (175 km) and Ashuganj to Zakiganj (295 km) on Indo-Bangladesh Protocol route for dredging and to develop and maintain fairway of 2.5 m depth and 30 m width for 07 years wherein the cost of dredging is to be borne in a 80:20 ratio between India and Bangladesh. The estimated cost of the project is Rs. 305 Crore, out of which Rs. 244 Crore is to be borne by India.



Dredging in progress on IBP route in Bangladesh

7.47 On the dredging in the Ashuganj-Zakiganj (295 km) stretch of Kushiyara river, Bangladesh Inland Water Transport Authority (BIWTA) has awarded the work to M/s Dharti-Banga JV on 04.10.2018 at a total cost of BDT 95.49 Crore through open tendering. The dredging work has commenced from March'2019 and initial dredging is expected to be completed by March'2021. The channel shall be maintained for next five years under the existing contract.

Myanmar

7.48 The Kaladan Multimodal Transit Transport Project (KMTTP) was conceptualized by the Ministry of External Affairs (MEA) to provide an alternative connectivity of

Mizoram with Haldia/Kolkata ports through Kaladan River in Myanmar. The project envisages road transport from Mizoram to Paletwa (Myanmar), thereafter from Paletwa to Sittwe (Myanmar) by IWT and from Sittwe to Haldia/Indian Ports by maritime shipping. The project is piloted and funded by the MEA which has appointed IWAI as their Project Development Consultant (PDC) for Port & IWT components of the project. The Phase-I work of Port & IWT component in KMTTP is completed. Under Phase II Wreck removal from Sittwe Port Basin area, appointment of O&M agency and DPR preparation for the construction of Container handling facility at Sittwe/Paletwa are completed.

Chapter - VIII

TRANSPORT RESEARCH & DEVELOPMENT WING

TRANSPORT RESEARCH

- 8.1 The Transport Research Wing (TRW) provides research and data support to the Ministry of Shipping for policy planning and formulation. TRW is the nodal agency for collection, compilation and dissemination of information and data on Ports, Shipping, Ship-building & Ship-repairing industry and Inland Water Transport (IWT) at the National level. Apart from collection, compilation and publication of transport data pertaining to ports, shipping and inland waterways, it also scrutinizes and validates data received from various primary/ secondary sources for consistency and comparability. TRW is associated with review meetings on policy issues pertaining to Port, Shipping and IWT Sectors.
- 8.2 Apart from publications, Transport Research Wing coordinates with various other Ministries/ Department/ States/ UTs Governments like Ministry of Finance, Ministry of Commerce, NITI AAYOG, Central Statistical Office (CSO) and National Sample Survey Office (NSSO), of Ministry of Statistics & Programme Implementation and State Governments etc.

- 8.3 The following publications have been released during the year 2020-21
- a) Basic port Statistics of India – 2018-19
 - b) Half-Yearly update on Indian Port Sector for period ending 30th September, 2019 and 31st March, 2020
 - c) Indian Shipping Statistics 2019
 - d) Statistics of India's Ship-building & Ship-repairing Industry 2018-19
 - e) Statistics of Inland Water Transport 2018-19
- 8.4 The publications are on the website of Ministry of Shipping: www.shipmin.gov.in under the head, "Transport Research Wing". The work relating to the preparation of publications "Basic Port Statistics- 2019-20", "Half-Yearly update on Indian Port Sector for period ending 30th September, 2020", "Indian Shipping Statistics 2020", "Statistics of Inland Water Transport 2019-20" and "Statistics of India's Ship-building & Ship-repairing Industry 2019-20" is under progress.
- 8.5 Apart from publication and dissemination of data, TRW also prepare monthly cargo traffic handled at Major ports and Non-Major Ports on the basis of information received from Major and Non-Major Ports



MINISTRY OF PORTS, SHIPPING & WATERWAYS

in Port Data Management Portal (PDMP), which is also uploaded on Ministry's website. TRW prepare a monthly progress report of the projects under Ministry of Shipping costing Rs. 150 crore and above and updates on OCMS (Online Computerized Monitoring System) of Ministry of Statistics & Programme Implementation. TRW has also taken initiative for compilation of service price indices for Port Sector and providing data for compilation of Global Indices like Linear Shipping Connectivity Index to Ministry of Commerce and Industry.

DEVELOPMENT WING

8.6 The Development Wing is Apex Technical Organization of the Ministry headed by Development Advisor (Ports). This Wing deals with the subjects of port development and renders technical advice on matters relating to the development of Major Port Projects, Andaman & Lakshadweep Harbour Works (ALHW) and the Dredging Corporation of India, etc. This Wing also renders technical advice to other Ministries in the case of

Fishing Harbour and also Maritime State Governments as and when requested regarding Minor Ports. This Wing also renders advice in techno-commercial dispute between ports and the contracting firms as and when required. The Wing is associated with Bureau of Indian Standards (BIS) for formulation/upgradation of Indian Standards on Port & Harbour Engineering and also onequipments and floating crafts.

8.7

The Development Wing is associated with processing the technical and administration matters related to the International Navigation Association – Permanent International Association for Navigational Congress, (INA-PIANC) wherein Government of India is a member country. The Development Wing is associated for implementation of their "National oil spill Disaster contingency plans" at the major ports for which Indian Coast Guard is the nodal agency. This Wing also coordinates the Research Committee Works related to Port Sector of the Ministry.

Chapter - IX

INTERNATIONAL COOPERATION

COOPERATION WITH MULTILATERAL ORGANIZATIONS

- 9.1 India became a member of the International Maritime Organization (IMO) in 1959, which is the global standard setting authority for the safety, security and environmental performance of shipping and ensures that such standards are fair and effective and are universally adopted and implemented. India has been an active participant at the IMO. In fact, participation of India in the functioning of IMO has helped India to voice its developmental concerns to the international maritime community. India has been a member of the IMO Council and has got re-elected as Member of the IMO Council for biennial 2020-21 under Category 'B', representing nations with the largest interest in international seaborne trade, for biennial 2020-21 during the IMO Council election held on November 29, 2019.
- 9.2 IMO adopts and implements various treaties in the form of conventions/ protocols. From time to time, keeping in mind our national interests and the international standards evolved by IMO through its treaties, India has been becoming party to the treaties adopted by IMO. As on date IMO has adopted 59 treaties which are open for countries to

become parties. Out of these 59 treaties, India is a party to 35 treaties (conventions/ protocols) which have been suitably incorporated into the Indian domestic legislation i.e. the Merchant Shipping Act, 1958.

9.3 Currently, there are two IMO Conventions namely, (a) International Convention on Civil Liability for Bunker Oil Pollution Damage 2001; and (b) International Convention for the Control and management of Ships' Ballast Water and Sediments, 2004 which are under consideration in the Ministry for India to sign an instrument of accession.

9.4 India has become a prime destination for green ship recycling with the passing and enactment of the landmark Recycling of Ships Act, 2019. The new Act provides a legislative framework for implementation of the provisions of the Hong Kong Convention. It also contains provisions of the Convention which are not covered in the Ship breaking Code (Revised), 2013. With enactment of this Act, ship recycling volume is expected to double by 2024.

9.5 India has also acceded to IMO's Hong Kong International Convention for Safe and Environmentally Sound Recycling of Ships in November, 2019. Accession to IMO's Hong Kong International Convention will give boost to the Domestic ship recycling



industry in India which is one of the world's five major ship recycling countries.

- 9.6 India is also a party to two important Conventions of the International Labour Organization (ILO) meant for welfare of seafarers, namely the Maritime Labour Convention and the Seafarer's Identity Document Convention. India contributes approximately 10 percent of the total workforce in the shipping industry. India is home to the second largest number of seafarers after the Philippines. The International Labour Organization (ILO) has mandated standards for the maritime industry too. The Maritime Labour Convention is a single, coherent instrument which replaces and consolidates 37 separate ILO maritime labour conventions adopted since 1920.
- 9.7 Apart from IMO, India has been contributing significantly to the other

multilateral organizations/agreements such as ASEAN (Association of South East Asia Nations); Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation (BIMSTEC); India, Brazil and South Africa (IBSA); Indian Ocean Rim-Association for Regional Cooperation (IORA); International North South Transport Corridor (INSTC), etc.

MARITIME TRANSPORT COOPERATION INSTRUMENTS/ARRANGEMENTS:

A. Bilateral cooperation arrangements

- 9.8 India has entered into cooperation instruments/arrangements with the following maritime countries and regional groupings by way of Agreements or MoUs, to foster growth of the Indian maritime sector as well as to safeguard India's maritime interests:-

Sweden	Jordan	China
Maldives	Iran	Russian Federation
Denmark	Vietnam	Singapore
Malta	Austria	Turkey
Republic of Korea	Sri Lanka	Federal Republic of Germany
Cyprus	The Netherlands	Finland
Bangladesh	Pakistan	Poland
United Arab Emirates	South Africa	Trilateral Transit Transport Agreement with Iran and Afghanistan (Chabahar Agreement)
Egypt	United States of America	IBSA (Trilateral Agreement with Brazil and South Africa).
Belgium	Morocco	Portugal
Oman		

B. Unilateral Agreements

9.9 India has signed agreements for Mutual Recognition of Certificates of Competence (CoC) of Seafarers with Sweden, Malaysia, UAE and Republic of Korea. India's CoC is unilaterally recognized by the following countries:-

- | | |
|------------------------|-------------------------|
| 1. Vincent/ Grind Anes | 18. Luxemburg |
| 2. Dominica | 19. Cyprus |
| 3. Hellenic Republic | 20. Malta |
| 4. Georgia | 21. Norway |
| 5. Vanuatu | 22. France |
| 6. Thailand | 23. Denmark |
| 7. Liberia | 24. Ire Land |
| 8. Marshal Islands | 25. Bangladesh |
| 9. Kuwait | 26. Ghana |
| 10. Bahamas | 27. Latvia |
| 11. Qatar | 28. Antigua and Barbuda |
| 12. Barbados | 29. Vietnam |
| 13. Netherlands | 30. Australia |
| 14. Japan | 31. Singapore |
| 15. Belize | 32. Hong Kong |
| 16. Jamaica | 33. Panama |
| 17. Isle of man | |

Joint Working Group (JWG) Meetings held during the year 2020

- | | | | |
|----|--|----|--|
| a) | 9th meeting of the Joint Committee on Ports and Maritime Cooperation between India and Iran was held in Delhi on 04.02.2020. | d) | 2nd Joint Working Group on maritime between India and Myanmar was held through video conference on 05.11.2020 |
| b) | 2nd meeting of the Joint Working Group on Shipping with Denmark was held in Delhi on 04.02.2020. | e) | 1st trilateral Joint Working Group between India, Iran and Uzbekistan to discuss joint use of Chabahar Port (Iran) was held through video conference on 14.12.2020 |
| c) | 2nd meeting of the Joint Maritime Commission (JMC) with Russia was held through video conference on 14.02.2020 | f) | 3rd meeting of the Joint Working Group on Shipping between India and Denmark was held through video conference on 16.12.2020 |



Chapter - X

ADMINISTRATION AND FINANCE



Secretary (P,S&W) and Senior Officers of Ministry of Ports, Shipping & Waterways taking pledge and celebrating Samvidhan Diwas on 26.11.2020 in Sagarmanthan Conference Hall.

Administration

10.1 Administration Wing of the Ministry of Ports, Shipping & Waterways is headed by Joint Secretary (Administration) who is assisted by Deputy Secretary (Administration), Under Secretary (Administration) supervising the work of Establishment Section, General Administration Section and Cash Section. The Establishment Section is entrusted with the service and administrative matters of 295 regular employees of (Group A, B, and C) of the Ministry. This includes the management of the various Cadres such as Central Secretariat Service (CSS), Central Secretariat Stenographers

Service (CSSS), Central Secretariat Clerical Service (CSCS), Development Wing and Chartering Wing. Establishment Section implements all administrative orders issued by Department of Personnel & Training, Department of Pension & Pensioners' Welfare, Ministry of Finance, Union Public Service Commission, Central Information Commission, Central Vigilance Commission etc.

10.2 Special efforts have been made by the Ministry to ensure compliance of the orders issued from time to time regarding reservation for SC/ ST/ OBC in filling up vacant posts in the Chartering Wing and the Development Wing of this Ministry.

Information with regard to the total number of Government Servants, separately for Secretariat and Non-Secretariat side (Group-wise) and representation of SC/ST employees in the Ministry is given at ANNEXURE- III.

Welfare

10.3 In the Ministry of Ports, Shipping & Waterways, several welfare measures for all employees including the women employees of the Ministry were undertaken. There is an Internal Complaints Committee on sexual harassment to look after the grievances of women employees relating to sexual/Gender based harassment. Further, as part of the welfare measure for employees in the Ministry, a new initiative has been

started to greet the employees on their birthday by giving a card, bouquet and a token gift, so as to keep their morale and motivation high.

10.4 To oversee the implementation of the Prohibition of Smoking in Public Places' Rules, 2008 in the Central Govt. Offices/Buildings, the Ministry of Ports, Shipping & Waterways has constituted a Committee for surprise checking in the premises of the Ministry. The Ministry of Ports, Shipping & Waterways is one of the few Ministries, which have successfully completed online APARs of all the officers of Ministry of Ports, Shipping & Waterways through SPARROW. The Biometric Attendance System has also been implemented in this Ministry.



Celebration of Swachhta Pakhwada



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10.5 Important Days of national importance viz. Anti – Terrorism Day, Communal Harmony Day, Sadbhavana Diwas, Swachhta Diwas, Constitution Day, International Yoga Day, Vigilance Awareness Week, Red Cross Day, Red Cross Raffle Draw, etc. were observed and “Pledge” taken by the employees of the Ministry of Ports, Shipping & Waterways. Contributions were also raised and collected towards “Flag Day”. Essay competitions both in Hindi and English were conducted during Communal Harmony Week / Vigilance Awareness Week. The Participants are rewarded for participating in these events.

E-Office

10.6 E-Office system has been implemented fully for all the officers and their supporting staff in the Ministry. This Ministry has also migrated to e-file system w.e.f. 1st January, 2017 and is one of those Ministries which have switched over to e-filing system completely. All the existing physical files/ records have been digitized. Scanners have been provided to all the Sections/Officers for scanning of daily routine papers/receipts/dak etc.

Right to Information Act

- a) Detailed information relating to obligations listed in Section 4 of the RTI (Publications of Manuals) has been uploaded / hosted in the websites of the concerned organizations.
- b) For the implementation of the RTI Act, Ministry of Ports, Shipping & Waterways has exclusively created a new cell and an Information and Facilitation Counter (IFC)

c) at the Reception for the convenience of the general public who visit personally.

In the Ministry of Ports, Shipping & Waterways (Main Sectt.), we have appointed/designated 23 CPIOs and 15 Appellate Authorities based on the Divisions, who are in the rank of Under Secretary and Deputy Secretary/Director and equivalent respectively. Notifications/ Orders indicating the appointment of CPIOs/ Appellate Authorities under the Act have been published and uploaded /hosted on the website of the Ministry of Ports, Shipping & Waterways i.e. www.shipmin.gov.in.

d) Whenever a request is received from the public/citizen by the CPIO/IFC, the same is passed/transferred to the RTI Cell, where the application is registered after ensuring that fee has been deposited. Thereafter the request is sent to the concerned CPIOs/Appellate Authorities to provide desired information to the applicants / for disposal of First Appeal. A monthly statement in this regard is sent to DoP&T.

e) Copies of the RTI Act and circulars received from DOPT on RTI are circulated promptly to all the organizations for compliance.

f) Useful guidance material/instructions are also circulated to all CPIOs/ Appellate Authorities.

g) An internal procedure has been established and circulated to all the concerned CPIOs/ Appellate Authorities and all Sections for guidance, while dealing with the requests/appeals from public seeking information.

- h) All the useful records are duly maintained.
- i) The Quarterly details of RTI Applications and RTI Appeals received and disposed of

by this Ministry during the period from 01.01.2020 to 31.12.2020 are as under:-

Sl. No.	Period	RTI Applications received and disposed of	RTI Appeals received and disposed of
1	January – March	103	2
2	April – June	66	2
3	July – September	98	9
4	October – December	85	4
	Total	352	17

Accounts and Budget

10.7 Ministry of Ports, Shipping & Highways is headed by Secretary to the Government of India and he is the Chief Accounting Authority for the Ministry. He discharges his responsibilities through the Financial Advisor (FA) and the Pr. Chief Controller of Accounts. The Accounts and Budget Wings of the Ministry are functioning under the Pr. Chief Controller of Accounts. The office of the Pr. Chief Controller of Accounts is inter-alia responsible for making all authorized payments of the Ministry, compilation of Monthly and Annual Accounts, conducting Internal Audit of all the Units under the Ministry to ensure compliance of the prescribed Rules etc. Pr. CCA office has the responsibility of preparation of Receipt Budget, Statement of Central Transactions, Finance Accounts and Appropriation Accounts, making payments of bills, expenditure monitoring PFMS implementation till agency level. Pr. CCA also renders Technical advice to the

Ministry on financial and accounting matters, cash management and coordinates with the Controller General of Accounts, Comptroller & Auditor General of India, Finance Ministry and other related agencies for accounting and pension related work.

10.8 The Pr. Chief Controller of Accounts organization comprises Pr. Chief Controller of Accounts, one Controller of Accounts and one Dy. Controller of Accounts and two Assistant Controllers of Accounts. The Budget Section consists of one Under Secretary (Budget), who report directly to Pr. CCA. There are 6 PAO'S/RPAO's under the administrative control of Pr. CCA located at New Delhi (two), Noida, Mumbai, Kolkata, Port Blair. The detailed responsibilities assigned to the office of the Pr. Chief Controller of Accounts Ministry of Ports, Shipping & Highways and its offices throughout the country are as under:-



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Payments

- a) Making payments on behalf of the Ministry after conducting pre-check of the presented bills as per approved budget.
- b) Making payments to the subordinate attached offices, Autonomous Bodies, Societies Associations, Public Sector Undertaking and State Governments.
- c) Release of authorization to other Ministry to incur expenditure on behalf of the Ministry.

Receipts

- a) Accepting, budgeting and accounting the receipts of the Ministry.
- b) Monitoring the repayment of loans and interest thereon received from State Governments and Public Sector Undertakings.
- c) Receipt & Payment under New Pension Scheme.
- d) Submission of Accounts & Report
- e) Preparation of Monthly Accounts of the Ministry, Statement of Central Transaction, Statements of Finance Accounts, Head wise and stage wise Appropriation Accounts and their submission to the Controller General of Accounts, Ministry of Finance, Department of Expenditure and the Director General of Audit, Central Revenues.
- f) Preparation of Annual Budget including the Outcome Budget and coordination with the Ministry of Finance in the Budget process during the financial year.

g) Monitoring of Internal Extra Budgetary Resources (IEBR) and its submission to the office of the CGA.

h) Monitoring and submission of mandatory information as per Fiscal Responsibility and Budget Management (FRBM) Act and Rules.

i) Preparation of Management Information Reports based on accounting, budget & audit data for submission to various authorities.

j) Preparation of financial statistics on monthly basis regarding receipts and expenditure for uploading on Ministry's website.

k) Preparation of Monthly expenditure/ Weekly expenditure based on Budget and submission to various authorities viz. AS & FA, Secretary etc. for monitoring the expenditure.

l) Preparation of material for Annual Report for submission to Ministry, Accounts at a Glance and flash figure of expenditure and to submit to CGA and preparation of provisional Accounts and to submit to the Ministry.

m) Preparation of State wise monthly expenditure in respect of All RPAOs/PAOs for further submission to Ministry.

Budget

- a) Preparation and submission of Annual Budget Estimates and Revised Estimates re-appropriation of funds and Supplementary Demands for Grants of the Ministry and Coordination with the

- Ministry of Finance and other Departments in all budget matters.
- b) Vetting of Demands for Grants yearly after incorporating actual expenditure and printing of Detailed Demands for Grants of the Ministry of Ports, Shipping and Waterways
 - c) Preparation of Annual Estimates of Revenue Receipts, Interest Receipt & Public Accounts.

Internal Audit

10.9 The Internal Audit Wing in the Pr.CCA organization of Ministry of Shipping has been established as an effective tool for identifying the systematic errors/lapses in the functioning of various departments in the Ministry and advising the management for necessary action/rectification. This has proved to be an immense management tool to bring about objectivity and financial propriety in day to

day functioning and by bringing greater sensitivity for financial prudence. The officers of the Internal Audit Wing as well as officers posted in other section have been imparted various trainings related to Internal Audit in the past. This year three AAOs have been imparted training in Risk Based Audit. Consequent upon the effective utilization of Internal Audit mechanism during the past few years by the Pr. CCA's organization, there has been a significant improvement in maintenance of Accounts in all offices of the Ministry of Shipping. Internal Audit paras and CGA's Audit Paras which involve major irregularities/deficiencies are brought to the notice of Head of Departments and matter perused for settlement on paras and review meeting are also arranged by Pr.CCA office to settle the outstanding paras. The details of the outstanding paras raised by the IAW are as under:-

	Number of paras outstanding at the beginning of the year	Number of paras settled during the year	Number of paras raised during the year	Number of paras outstanding at the end of the year
Internal Audit paras	584	154		172602
CGA's Audit paras (Pr.AO/PAO)	52	11		04 1

10.10 Summary of important audit observations made during recent audit reports are enclosed at **ANNEXURE-IV**.

Computerization of Accounts

E-Lekha

10.11 A web-based application for generating daily/monthly MIS/Expenditure of accounting information. All the PAO's/ RPAO's have been fully integrated with the based accounting portal E-Lekha. They are required to upload their daily transactions



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in this portal so that the date of expenditure and receipts are available on daily basis. This has enabled availability of real time data on expenditure and receipt which is crucial for effective monitoring of expenditure/receipts and budgetary controls. The reports generated from the Management Information System of this portal are important managerial tools and are being used by various Departments of the Ministry.

PFMS

10.12 PFMS was initially started for release of funds under plan schemes of Govt. of India. Now the scope of PFMS has been expanded to integrate various existing standalone systems being used by DDO's and PAO for online processing of sanctions, bills and payments of all types of expenditure. This is being implemented in different phases. In the first phase, it is proposed to make all payments of PAO except Salaries, Pension & GPF through PFMS. The CGA has decided to roll out phase I w.e.f. 1.10.2015 in Delhi/NCR based PAO/NCDDO's (This would mean a spread of around 40 departments including nearly 90 PAOs and 500 DDOs). PFMS has since been rolled out in all RPAOs/CDDOs.

Grant No. 90 – Ministry of Shipping

10.13 The position of savings/excess in respect of above mentioned Grant No. 90 for the year 2020-21 and actual expenditure for the year 2020-21 (upto 31st December, 2020) has been reflected in ANNEXURE-V.

The Head-wise Details of Receipts as per the Statement of Central Transaction (SCT) for the last three years have been reflected in **ANNEXURE-VI**. Head wise details of expenditure for 2018-19 to 2020-21 (upto 31st December, 2020) are given in **ANNEXURE-VII**. Profile of actual Expenditure in 2020-21 (upto 31st December, 2020) is at **ANNEXURE-VIII**. The Ministry of Shipping is maintaining two funds viz. Depreciation Reserve Fund and General Reserve Fund for providing certain services required to develop transportation facilities in the country. Details are at **ANNEXURE-XI**.

Vigilance

- 10.14 The Vigilance Wing of the Ministry coordinates and supervises the vigilance activities within the Ministry as well as the PSUs and autonomous bodies under its administrative control. The Wing is headed by the Chief Vigilance Officer (CVO) of the rank of Joint Secretary appointed with the approval of Chief Vigilance Commission.
- 10.15 There are 30 attached/subordinate/ PSE/autonomous bodies under the Ministry and each organization has either a part-time or full-time CVO. The part-time CVOs are appointed from amongst the officers of the concerned organization in consultation/concurrence with the CVC. The full-time posts of CVOs, wherever such posts exist, are filled-up by officers of organized services through DoP&T.
- 10.16 The emphasis has been laid on the role of preventive vigilance by taking prompt

- administrative actions and ensuring transparency including simplification of procedures and use of e-technology etc. Special emphasis was laid on the strengthening of vigilance machinery in various organizations under the Ministry of Port, Shipping & Waterways particularly the Port Trusts. Punitive action has been taken wherever required in consultation with CVC against the delinquent officials.
- 10.17 During the Vigilance Awareness Week, a pledge was administered to the staff and officers of the Ministry. The banners, posters were displayed at the prime locations of the building and Notice Board of the Ministry. Vigilance Awareness Week was also observed in the attached/subordinate/PSE/autonomous bodies under the Ministry.
- 10.18 Vigilance activities in various organizations under this Ministry are being reviewed periodically through their reports/returns and also through interactions with CVOs/Head of the Organizations during periodical meetings.



Chapter - XI

USE OF OFFICIAL LANGUAGE

11.1 Hindi Section has been established in the Ministry of Ports, Shipping and Waterways for implementation of the Official Language Policy of the Union Government. Presently it is under the administrative control of Economic Advisor, assisted by Assistant Director (OL). The Hindi section consists of one Joint Director (OL)- (Currently vacant), one Assistant Director (OL), two Senior Translation Officers, one Junior Translation Officer and one Stenographer. Hindi section monitors the implementation of Official Language (Hindi) Policy in the Ministry as well as in all the offices under its administrative control.

11.2 Keeping in view the Annual Programme issued by the Department of Official Language, Ministry of Home Affairs, each year, Ministry of Shipping continued its efforts to do maximum official work in Hindi for implementation of the Official Language Policy of the Union Government.

Compliance of Section 3(3) of the Official Language Act, 1963 (as amended 1967)

11.3 In pursuance of the Official Language Policy of the Government of India, all documents covered under section 3(3) of the Official Language Act, 1963 (as amended 1967) in Ministry were issued both in English and Hindi during the reporting period.

Official Language Implementation Committee (OLIC)

11.4 There is an Official Language Implementation Committee (OLIC) constituted in the Ministry under the Chairmanship of Economic Advisor. The Committee reviews the progress made in the use of Hindi in the Ministry on quarterly basis. It gives appropriate suggestions and recommends measures to be taken for the effective implementation of the Official Language Policy. Two meetings of the Committee were held during the year 2020-21 (upto 31-12-2020).

Inspections to assess the progressive use of Hindi

11.5 Due to outbreak of Covid-19 pandemic very few offices could be inspected during 2020-21 (upto 31-12-2020). The details of the inspections carried out by First Sub Committee of Parliament on Official Language and the Officials of this ministry during the reporting period to assess the progress of implementation of the Official Language Policy of the Union Government are given below:-

Inspections of the Committee of Parliament on Official Language:

11.6 Hindi section reviews the questionnaire of the offices under its control during the inspection by First Sub Committee of Parliament on Official Language and

imparts necessary guidance to them. The said committee inspected Office of the Chairman, Inland waterways authority of India (IWAI), NOIDA on 14 October, 2020 during the year 2020-21 (as on 31-12-2020).

Inspection in the offices under the control of ministry of Shipping:

- 11.7 The officials of the Ministry of Shipping inspected two offices under its control during the reporting period namely:
- I. Directorate General of Lighthouse and Lightships, NOIDA : 23.12.2020
 - II. Syama Prasad Mookerjee Port, Kolkata : 24.12.2020

Organization of Hindi Pakhwada (fortnight)

- 11.8 In order to encourage the use of Hindi in official work and to propagate Hindi, 'Hindi Pakhwada' was organized in the Ministry from 14-09-2020 to 28-09-2020. During Hindi Pakhwada various competitions were held. Prizes were distributed to the winners of the competitions held during Hindi Pakhwada. This year there were total 35 Prizes for 05 Competitions in which 35 Officers and Staff participated and 19 participants won total 35 Prizes.

Organization of Hindi workshop

- 11.9 One online virtual Hindi workshop was organized during the reporting period. It was conducted by Sh. Kewal Krishan, Rtd. Director (Technical), Department of Official Language on 15-12-2020. In this workshop, participants were trained on 'Use of IT tools in translation and doing

official work in Hindi'. 11 participants from various sections attended the workshop.

Award scheme for the books originally written in Hindi and translated into Hindi from other languages on the subjects relating to Indian ports, Shipping and Inland Water Transport:-

- 11.10 Ministry of Shipping is running an Award Scheme on annual basis with an objective to promote book writing originally in Hindi and translation of books from other languages into Hindi on subjects related to Indian Ports, Shipping and Inland Water Transport, under which first, second and third prizes are given in both categories separately. Entries were invited under the scheme for year 2018-19 till 31st August, 2020 but no entry was received. The scheme will be implemented for the year 2019-20 also.

Rajbhasha Shield Scheme:-

- 11.11 To promote use of Hindi in the headquarters of offices under the control of Ministry of Shipping a Rajbhasha Shield scheme is being run on annual basis, under which region wise offices are awarded with a shield and certificate.

Incentive scheme for doing official work in Hindi

- 11.12 Ministry of Shipping is implementing the cash incentive scheme of Official Language Department in order to encourage officials for doing their official work in Hindi on yearly basis. Under this scheme total ten prizes (cash awards) are to be given namely, Two First prizes of 5000/- Rs. each, Three Second Prizes of 3000/- Rs. each and



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Five Third Prizes of 2000/- Rs. each. Any officer/employee who writes minimum 20,000 or more Hindi words in a financial year in his official work is eligible to participate in this scheme. The word limit for non-Hindi speaking officials is minimum 10,000 words per year and they are given 20% weightage in the number of words. For the year 2019-20 two officials of this ministry have participated under this scheme.

In-House Magazine "Nautarni"

11.13 Ministry's in house Hindi magazine "Nautarni" is being published to promote the creative writing in Hindi in the officers and employees of the ministry of Shipping.

In this magazine creative and informative articles and the articles related to the activities of the Ministry of Shipping are published. Till now 5 issues of this magazine are published and articles have been invited for the Sixth issue of this in house magazine.

Hindi Salahakar Samiti

11.14 With a view to render advice for effective implementation of the Official Language Policy of the Government, the Hindi Salahakar Samiti (Advisory Committee) of the Ministry of Shipping had been constituted and its tenure had expired. The process of reconstitution of the committee is in progress.

Annexure-I

(para 1.5 refer)

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- I. The following subjects which fall within List 1 of the Seventh Schedule to the Constitution of India:
- 1. Maritime shipping and navigation; provision of education and training for the mercantile marine**
 2. Lighthouses and lightships
 3. Administration of the Indian Ports Act, 1908, (15 of 1908) and the Major Port Trusts Act, 1963 (38 of 1963) and ports declared as major ports
 4. Shipping and navigation including carriage of passengers and goods on inland waterways declared by Parliament by law to be national waterways as regards mechanically propelled vessels, the rule of the road on such waterways
 5. Ship-building and ship-repair industry
 6. Ship breaking
 7. Fishing vessels industry
 8. Floating craft industry
- II. In respect of the Union Territories:**
9. Inland waterways and traffic thereon
- III. In respect of the union territories of the Andaman and Nicobar Islands and the Lakshadweep:**
10. Organization and maintenance of mainland islands and inter-island shipping services.
- IV. Other subjects which have not been included under the previous parts:
11. Legislation relating to shipping and navigation on inland waterways as regards mechanically propelled vessels and the carriage of passengers and goods on inland waterways.
 12. Legislation relating to and coordination of the development of minor and major ports.
 13. Administration of the Dock Workers (Regulation of Employment) Act, 1948 (9 of 1948) and the Schemes framed thereunder other than the Dock Workers (Safety, Health and Welfare) Scheme, 1961.
 14. To make shipping arrangements for and on behalf of the Government of India/Public Sector Undertakings/State Governments/ State Government Public Sector Undertakings and autonomous bodies in respect of import of cargo on Free on Board/Free along Site and export on Cost and Freight/Cost Insurance and Freight basis.
 15. Planning of Inland Water Transport.
 16. Formulation of the privatization policy in the infrastructure areas of ports, shipping and inland waterways.
 17. Prevention and control of pollution:

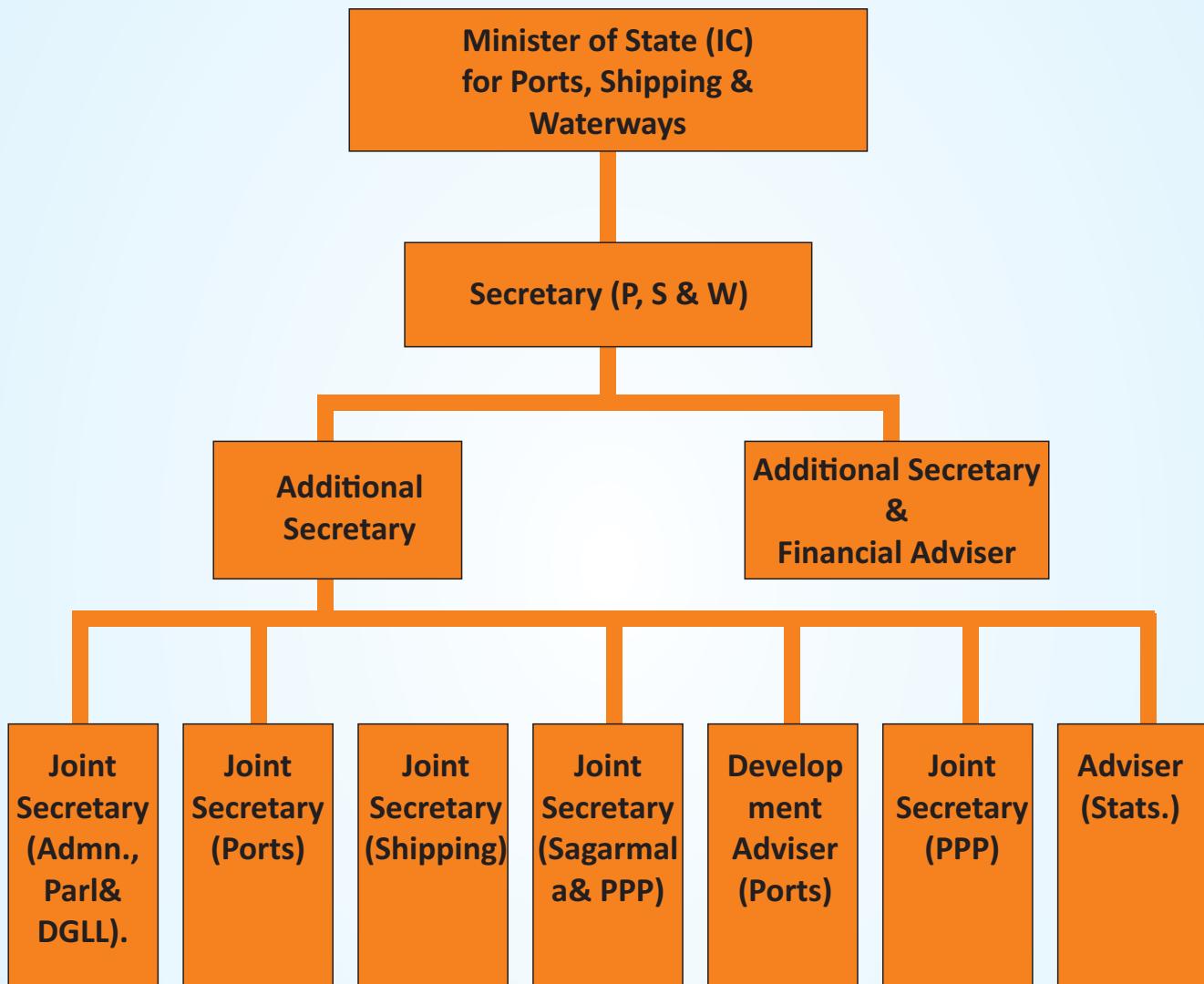


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- (a) Prevention and control of pollution arising from ships, shipwrecks and abandoned ships in the sea, including the port areas;
 - (b) Enactment and administration of legislation related to prevention, control and combating of pollution arising from ships; and
 - © Monitoring and combating of oil pollution in the port areas. The Development of township of Gandhidham
- V Acts and Rules
- The Indian Ports Act, 1908 (15 of 1908)
 - The Inland Vessels Act, 1917 (1 of 1917)
 - The Dock Workers(Regulation of Employment) Act, 1948 (9 of 1948)
 - The Merchant Shipping Act, 1958 (44 of 1958)
 - The Major Port Trusts Act, 1963 (38 of 1963)
 - The Seamen's Provident Fund Act, 1966 (4 of 1966)
 - The Inland Waterways Authority of India Act, 1985 (82 of 1985)
 - The Multimodal Transportation of Goods Act, 1993 (28 of 1993)
 - The Lighthouse Act, 1927

Annexure-II

(para 1.2 refer)





MINISTRY OF PORTS, SHIPPING & WATERWAYS

Annexure-III

(para 10.2 refer)

Annual Statement Showing the Representation of SCs, STs and OBCs as on 1st January, 2021 and
Number of appointments made during the Preceding Calendar year 2020:

Ministry/Department/Attached/Subordinate Office: Shipping Representation of SCs/STs/OBCs/EWSs (As on 01.01.2020)

Group	Total Employee	SCs	STs	OBCs	EWS	Total
A	50	9	02	04	-	15
B	98	16	08	25	-	49
C (Excluding SafaiKaramchari)	38	10	02	05	-	17
C (SafaiKaramchari)	-	-	-	-	-	-
Total	186	35	12	34	-	81

Number of Appointments made during the Calendar Year 2019

BY DIRECT RECRUITMENT					
Group	SCs	STs	OBCs	EWS	Total
A	-	-	-	-	-
B	-	-	-	-	-
C (Excluding SafaiKaramchari)	-	-	-	-	-
C (SafaiKaramchari)	-	-	-	-	-
Total	-	-	-	-	01

By Promotion

Group	SCs	STs	OBCs	Total
A	-	-	-	-
B	-	-	-	-
C (Excluding SafaiKaramchari)	-	-	-	-
C (SafaiKaramchari)	-	-	-	-
Total	-	-	-	-

By Deputation				
Group	VH	HH	OH	Total
A	-	-	-	-
B	-	-	-	-
C (Excluding SafaiKaramchari)	-	-	-	-
C (SafaiKaramchari)	-	-	-	-
Total	-	-	-	-



Annexure-IV

(para 10.10 refer)

(SUMMARY REPORT OF INTERNAL AUDIT PARAS)

(Including Schemes/Banks/PSUs/Grantee Institutions)

S. No.	Nature of irregularities	No of paras	Total amount involved (Rs . in lakhs)
1.	Non-recovery of Government dues from Central Govt. Department/ State Govt./Private Parties	1	0.44
2.	Over payments	2	8.29
3.	Non-adjustment of advances- Contingency Advance- T. A. Advance LTC Advance Long Term Advances	9 11 2 -	503.34 24.00 0.23 -
4.	Blocking of Govt. money	-	-
5.	Non accountal of costly stores/Govt. money	-	-
6.	Items of special nature	27	507.98
	Total	52	1044.28

Annexure-V

(para 10.13 refer)

GRANT FOR THE FINANCIAL YEAR 2020-2021

(upto 31/12/2020)

(Rs in crores)

Grant No. & Name		Original	Supplementary	Total Budget	Actual Expenditure	Saving
Grant No. 90	Revenue Account	1715.00	0.00	1715.00	848.74	NA
	Capital Account	85.00	0.00	85.00	53.48	
	Total	1800.00	0.00	1800.00	902.22	

Source: E lekha.



MINISTRY OF PORTS, SHIPPING & WATERWAYS

Annexure-VI

(para 10.13 refer)

HEADWISE DETAILS OF RECEIPTS AS PER THE STATEMENT OF CENTRAL
TRANSACTION (SCT) FOR THE LAST THREE YEARS

(Rs. in crore)

REVENUE RECEIPTS

Sl. No.	MAJOR HEAD	2018-19	2019-20	2020-21 up to (31-12-2020)
1.	0021-Taxes on Income other than Corporation Tax	19.29	21.34	11.99
2.	0045-Other Taxes & Duties on Commodities & Services	-1.70	-0.27	0.00
3.	0049- Interest Receipts	235.61	64.70	0.27
4.	0050-Dividends & Profits	202.37	194.77	166.04
5.	0070-Other Administrative Services	0.02	0.00	0.00
6.	0071-Contribution & Recoveries towards Pension & Other Retirements Benefits	9.19	9.07	10.17
7.	0075-Miscellaneous General Services	0.00	0.00	0.00
8.	0210-Medical & Public Health	0.42	0.41	0.31
9.	0216-Housing	0.45	0.53	0.36
10.	1051-Ports and Light Houses	306.99	330.37	243.24
11.	1052-Shipping	98.41	86.36	27.94
12.	1054-Roads and Bridges	--	--	55.38
13.	1056-Inland Water Transport	24.72	0.00	29.96
14.	1475 - Other General Economic Services	0.00	0.00	0.00
A	REVENUE RECEIPTS *	895.77	707.28	545.66

CAPITAL RECEIPTS

	MAJOR HEAD	2018-19	2019-20	2020-21 up to (31-12-2020)
1.	4000- Miscellaneous Capital Receipts	0.00	0.00	0.00
2.	6858- Loans for Engineering Indst.	0.00	60.74	0.00
3.	7051- Loans for Port & Light Houses	260.82	63.85	15.67
4.	7056-Loans for Inland Water Transport	0.00	0.00	0.00
5.	7601-Loans & Advances to State Govt.	0.00	0.00	0.00
6.	7610- Loans to Govt. Servants	0.39	0.37	0.22
	CAPITAL RECEIPTS **	261.21	124.96	15.89



MINISTRY OF PORTS, SHIPPING & WATERWAYS

Annexure-VII (para 10.13 refer)

HEADWISE DETAILS OF EXPENDITURE FOR THE LAST THREE YEARS i.e. FROM 2018-19 TO 2020-21 (upto 31/12/2020)

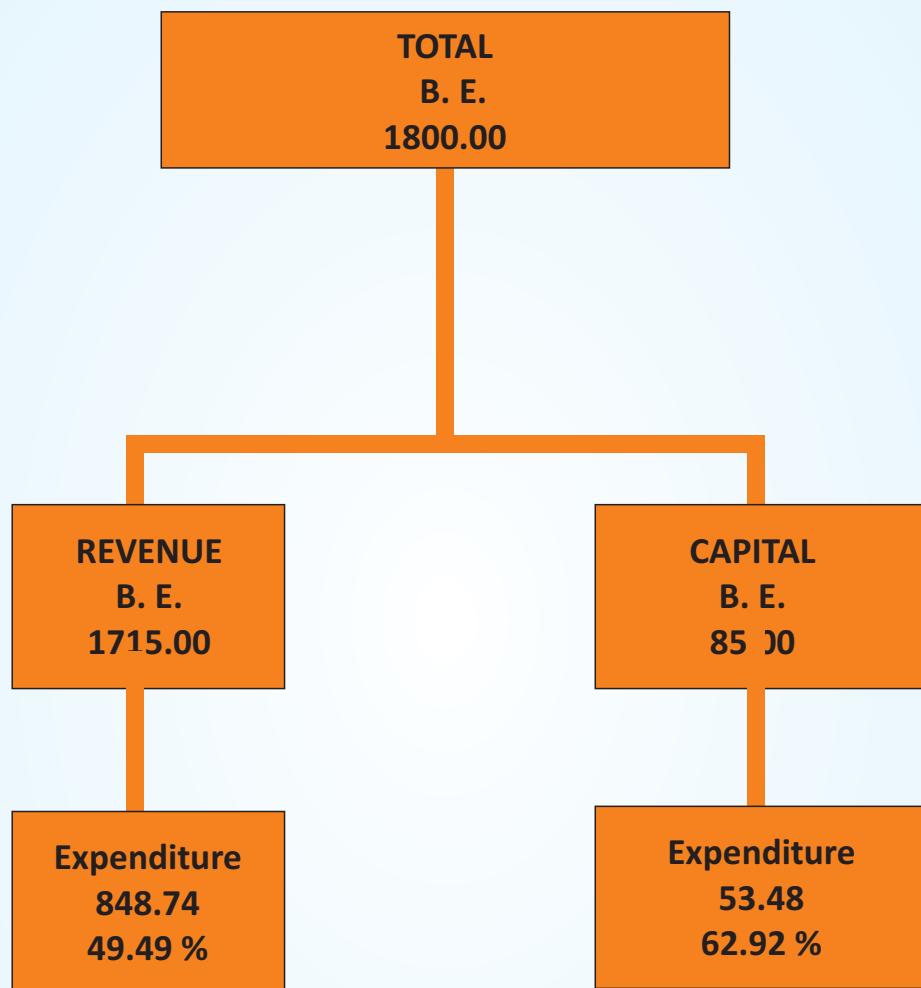
(Rs. in crore)

PARTICULARS	2018-19	2019-20	2020-21 (up to December 2020)
2049-Interest Payment	0.38	11.62	0.33
2071-Pension Payment	30.79	39.07	29.81
2235-Social, Security & Welfare	0.06	0.08	0.04
2852-Industries	29.91	231.28	100.26
3051-Ports & Lighthouses (Gr.No.89)	773.33	697.59	441.84
3051-Port and Lighthouses Andaman & Nicobar administration	9.25	10.51	5.64
3052-Shipping	124.17	89.82	91.58
3056-Inland Water Transport	862.00	506.37	360.28
3451-Economic Services	55.74	53.45	39.91
3601-Grant-in-aid to State Government	100.00	48.61	30.31
TOTAL (Revenue Exp.)	1985.63	1688.40	1100.00
4405-Capital outlay on fisheries	8.18	6.11	2.07
4406-Capital outlay on forestry & wildlife	0.00	0.00	0.00
4801-Capital outlay on Power Proj	1.51	1.40	0.00
5051- Capital outlay on Ports & Lighthouses (Gr.No.89)	177.77	241.61	84.61
5051- Capital outlay on Ports & Lighthouses Andaman & Nicobar administration	5.74	15.56	2.67
5052-Capital outlay on Shipping Andaman & Nicobar administration	2.94	3.50	1.08
5052-Capital outlay on Shipping (Gr.No.89)	-25.26	16.17	3.96
5053-Capital Outlay on Civil Aviation	0.00	0.00	0.00
5075-Other Transport Services	0.00	0.00	0.00
5452-Capital outlay on tourism Andaman & Nicobar administration	1.05	1.37	0.79
6858-Loans for Engineering Industries	0.00	0.00	0.00
7051-Loans for Ports & Light Houses	0.00	0.00	0.00
7610-Loans to Govt. servants	0.33	0.37	0.08
TOTAL (Capital Exp.)	172.26	286.09	95.26
Grand Total (Rev.+Cap.)	2157.89	1974.49	1195.26

Annexure-VIII
 (para 10.13 refer)

PROFILE OF ACTUAL EXPENDITURE (NET) IN 2020-21
 (upto 31/12/2020)

(Rs. in crore)



Source:- Consolidated Classified Abstract

B.E. – Budget Estimate



MINISTRY OF PORTS, SHIPPING & WATERWAYS

Annexure-IX (para 10.13 refer)

MINISTRY OF PORTS, SHIPPING & WATERWAYS

DEPRECIATION RESERVE FUND (8115)	(Rs. in crore)
Opening Balance as on 01.04.2020	245.76
Receipt during Apr-December -2020	19.00
Payment during Apr-December- 2020	0.00
Closing Balance as on 31.12.2020	264.76
GENERAL RESERVE FUND (8121)	
Opening Balance as on 01.04.2020	809.43
Receipt during Apr-December- 2020	40.58
Payment during Apr-December- 2020	0.00
Closing Balance as on 31.12.2020	850.01

Source: Classified Consolidated abstract Account