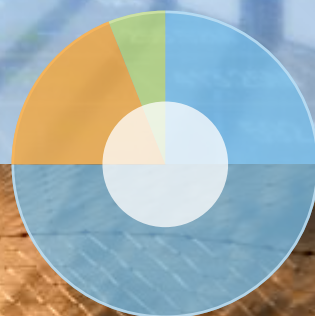




HANDBOOK ON FISHERIES STATISTICS 2022



Department of Fisheries
Ministry of Fisheries, Animal Husbandry & Dairying
Government of India, New Delhi



HANDBOOK ON FISHERIES STATISTICS 2022

**Department of Fisheries
Ministry of Fisheries, Animal Husbandry & Dairying
Government of India, New Delhi**

November, 2022

Compiled by

Fisheries Statistics Division

Department of Fisheries

Ministry of Fisheries, Animal Husbandry & Dairying

Government of India

परशोत्तम रूपाला
PARSHOTTAM RUPALA



MESSAGE

मंत्री
मत्स्यपालन, पशुपालन एवं डेयरी
भारत सरकार
MINISTER
FISHERIES, ANIMAL HUSBANDRY & DAIRYING
GOVERNMENT OF INDIA

D.O. No. 1505/MIN(FAH&D)/2022-23

16 NOV 2022

I am happy to inform that Department of Fisheries is bringing out the new edition of the Handbook on Fisheries Statistics on the occasion of World Fisheries Day 2022. The Handbook is an outcome of our endeavour to inform and educate stakeholders about the fisheries sector, its latest policies, programmes and initiatives of the Government of India to empower better Indian fisher communities through the development of the fisheries sector.

The Handbook on Fisheries covers the latest data and information related to various domain of Fisheries sector mainly Fish Production and Productivity, Disposition of Fish, Consumption of Fish, Fisheries Economy, Expenditure on Fisheries sector, Export, Fishermen Population, Fisheries Resources, Fisheries Welfare, Fisheries Institutes, International Scenario, Post-harvest Infrastructure and Fisheries Development.

Dear Readers, the last 24 months have been eventful and exhilarating in our quest to reach greater heights and development of the fisheries sector. Fisheries sector plays an important role in the Indian economy. It contributes to the national income, exports, food and nutritional security and in employment generation. This sector is also a principal source of livelihood for a large section of economically underprivileged population.

I am glad to inform that we have made an outstanding progress in terms of production of fish and employment generation; Human resource development etc. which confirms that fisheries sector is booming and contributing to the economic growth of the nation.

I am confident that this Handbook would serve as an important platform to disseminate information, best practices, latest development and various initiatives under fisheries sector. I would like to extend my appreciation to Shri Jatindra Nath Swain, IAS, Secretary, Department of Fisheries Joint Secretary Dr. Jujjavarapu Balaji, and Joint Secretary Shri Sagar Mehra along with his team for the initiative and wish the sector would grow higher by referring this book from time to time.

(Parshottam Rupala)

डॉ. एल. मुरुगन
Dr. L. MURUGAN



सत्यमेव जयते



राज्य मंत्री
सूचना एवं प्रसारण मंत्रालय और
मत्स्य पालन, पशुपालन और डेयरी मंत्रालय
भारत सरकार

MINISTER OF STATE FOR
INFORMATION & BROADCASTING AND
FISHERIES, ANIMAL HUSBANDRY AND DAIRYING
GOVERNMENT OF INDIA

16 NOV 2022

Message

I am delighted to note that the Department of Fisheries of Government of India is releasing the Handbook of Fisheries Statistics 2022. The statistical data reflects the journey of the sector & highlights its achievements. It also helps the policy makers to understand the trend of various parameters that essentially indicate the health of the sector.

The Indian fisheries has literally seen a sea change in last eight years under the dynamic leadership of Hon'ble Prime Minister Shri Narendra Modi. The core reforms unleashed in this sector through Blue Revolution, Fisheries & Aquaculture Infrastructure Development Fund, Pradhan Mantri Matsya Sampada Yojana & many other reforms have uplifted the Indian fisheries. The formation of separate Ministry for Fisheries, Animal Husbandry and Dairying has given the much wanted focus to the sector. The unprecedented growth in the fish production & exports in year 2021-22, despite the global Covid pandemic, is the result of these reforms and initiatives taken since year 2014.

I am confident that Handbook captures the important facts and figures related to fish production, exports, technology infusion and many other outcomes. The important handbook will surely help the fishery students, researchers, policy makers as well as the entrepreneurs and other stakeholders in this sector.


(Dr. L. Murugan)

जतीन्द्र नाथ स्वेन, भा.प्र.से.
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Secretary



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16 NOV 2022

FOREWORD

The 21st century has brought about the data revolution in a way that we have never imagined; massive volumes of data are generated every day. Repository of such data is a virtual gold mine for policy makers, researchers and businesses to formulate objectives, schemes, products and services. Therefore, there is a need for systematic and intelligent compilation of such data in usable form. Fisheries sector in India, in particular, generates huge amount of data because of its sheer size, disaggregated nature of production and consumption, multiple levels & types of technologies and impact of various agroclimatic and socio-economic factors. This data needs to be presented in a usable form so that practitioners & entrepreneurs across the country can benefit from it. In this context, Department of Fisheries, Government of India has been consistently working to improve data collection, quality and consistency and has been bringing out Statistical Handbooks from 2006 onwards. Now it is bringing out the **fifteenth edition of the 'Handbook on Fisheries Statistics, 2022'**. The Handbook contains data for the years 2021 and 2022 and is a consolidation of the latest information on various domains of Fisheries sector namely, fish production and productivity, disposition of fish catch, consumption of fish, fisheries economy, expenditure on fisheries sector, exports, fishers' population, fisheries resources, fishers' welfare, fisheries institutes, international scenario, post-harvest infrastructure and fisheries development.

This edition of the Handbook has attempted to include data on additional parameters & socio-economic attributes and to improve the presentation of data contained therein. As the sector is growing at a rate of 8-10% in last 10 years, I expect more & more entrepreneurs to enter into this sector and this will drive the need for more and more data on production, productivity, technologies, markets and preferences. At the same time, Governments and policy makers will need the necessary data to fine tune and upgrade the policy framework to be able to handle this load & to promote ease of doing business. I am sure this publication will go a long way towards satisfying such needs. I urge practitioners, researchers & planners in the fisheries space among others to make best use of this hand book and give suggestions for improvements, if any.

I wish to congratulate the Fisheries Department of all the States / UTs, National Statistics Office (NSO), Ministry of Co-operation, Ministry of Agriculture and Farmers Welfare, Marine Products Export Development Authority (MPEDA), Fisheries Institutes of the Department of Fisheries, Indian Council of Agricultural Research (ICAR) and National Fisheries Development Board (NFDB) for their continued support and contribution extended during the preparation of this Handbook. I would also wish to place on record my appreciation and efforts made by all the officers and staff of the Department of Fisheries, especially the Fisheries Statistics Division for bringing out this publication.

Jatindra Nath Swain
(Jatindra Nath Swain)

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SUMMARY AT A GLANCE 2021-22

162.48 Lakh Tonnes

Total Fish
Production

41.27 Lakh Tonnes

Marine Fish
Production

121.21 Lakh Tonnes

Inland Fish
Production

13,69,264 Tonnes

Quantity of Fisheries
Export

Rs. 2,32,620 Crore

Contribution of
Fisheries sector in
Indian Economy
(GVA):2020-21

1.1%

Contribution of
Fisheries sector in Indian
Economy:2020-21

6.72%

Contribution of
Economy
of Fisheries sector in
Agriculture :2020-21

Rs. 57,586.48 Crore

Value of Fisheries
Export

6.31

Per- capita
Consumption of Fish

Fish landing
centres -**1547**
Major Fishing Harbours
Commissioned-**7**
Minor Fishing Harbours
Commissioned- **67**

8%

Contribution of
India to World Fish
Production

10.34%

Annual
Growth Rate in
Fish Production

EXECUTIVE SUMMARY

The fifteenth edition of the “Handbook on Fisheries Statistics 2022” covers the latest data for the FY year 2020-2021, 2021-2022 and significant information related to various domain of Fisheries sector mainly fish production and productivity, disposition of fish, consumption of fish, fisheries economy, expenditure on fisheries sector, exports, fishermen population, fisheries resources, fishers’ welfare, fisheries institutes, international scenario, post-harvest infrastructure and fisheries development. The main objective for making this handbook is to provide a platform to disseminate information about the latest development, improvements, achievements and knowledge about various initiatives under fisheries sector for the benefits of researchers, planners, entrepreneurs & other stakeholders.

Fisheries and Aquaculture remains to be an important source of food, nutrition, income, and livelihood to millions of people. Fish is an affordable and good source of animal protein, a good option to reduce hunger and malnutrition in the country. Indian Fisheries sector evolved gradually over the years and became an important socio-economic attribute for the nation. India is the third-largest fish and aquaculture-producing country and accounts for about 16% of total inland and 5% of total global marine fish production respectively. In 2021-22, India's total marine and inland fish production stood at 162.48 lakh tonnes, which includes 121.21 lakh tonnes and 41.27 lakh tonnes from inland and marine sectors, respectively. Fisheries sector plays a crucial role in the national economy and is one of the key contributors to the country's foreign exchange earnings. The Fish Production in India has increased from 56.56 lakh tonnes in 2000-01 to 162.48 lakh tonnes in 2021-22. Andhra Pradesh, West Bengal, Karnataka, Odisha and Gujarat evolve to be the five major fish-producing states in India during 2021-22.

Disposition of Fish Catch covers activities such as Marketing Fresh, Frozen, Curing, Canning, Reduction etc. Marketing of the Fresh Fish is the highest practiced activity. India has been facing a constant growth in disposition of Fish catch during 2013-2021. Andhra Pradesh, West Bengal and Odisha have highest disposition of Fish Catch in 2020-21.

Fish has been an important dietary source of protein and other nutrients throughout human history. Fish can be prepared in a variety of ways. It can be served uncooked (raw food, e.g., sashimi); cured by marinating (e.g., ceviche), pickling (e.g., pickled herring) or smoking (e.g., smoked salmon); or cooked by baking, frying (e.g., fish and chips), grilling, poaching or steaming. Many of the preservation techniques used in different cultures have since become unnecessary but are still performed for their resulting taste and texture when consumed. Total Fish Consumption is highest in states such as Uttar Pradesh, Odisha, Bihar, Kerala, Tamil Nadu etc. and per capita consumption of fish and prawn is highest in Lakshadweep, Kerala respectively. Tripura comes out to be the state with highest no. of households (rural/ urban) consuming fishes.

India is among the top 5 fish exporting countries in the world at third place precluded by China & Indonesia. About 1.1% contribution is of Fisheries sector in Indian economy and about 6.72% contribution is in agriculture. In 2021-22, the country exported 1.36 million MT of seafood worth US \$ 7.76 billion which is all time high export by value. India has exported marine products to 123 countries. USA and China are the major importers of Indian seafood. India mainly exports frozen shrimps, fish, cuttlefish, squids, and dried items, live and chilled items. Out of these, frozen shrimp is the major exported marine product contributing to more than 53.18% of the total quantity and about 75.11% of the total export value. In 2021-22, the frozen fish, cuttlefish and squid contributed 6%, 3% and 5% of the total marine products export value respectively. Our present annual fish production through capture and culture fisheries is 16.25 million tonnes, and provides a cheap source of protein which helps in ensuring nutritional security of our people. Further, through the export of fish and fishery products, our country earns foreign exchange annually.

The value of marine products exported in 2022 reached US\$ 7.76 billion. This is an increase of about 30% over previous year. Details of fishermen insured under the sub-component of Group Accident Insurance, details of relief assistance provided to fishermen and financial releases made under the sub-component of Saving-cum-Relief (SCR) of the Blue Revolution Scheme during 2019-20 and 2018-19 are covered. Also, there are several training courses conducted by CIFNET, Skill Development/ Awareness Training Programme for Fishermen by CIFNET, Training of Trainers Programme under PMMSY etc that acts as an immense source for human resource development. This handbook serves as a multipurpose book as it also contains an overview about different Fisheries Institutes such as NFDB, CIFNET, NIFPHATT, FSI, CICEF and CAA. It also contains information regarding different ongoing schemes viz Kisan Credit Card, Fisheries and Aquaculture Infrastructure Development Fund (FIDF), PMMSY wherein the total number of 1,13,076 numbers of KCCs for fisherman & fish farmers have been sanctioned and 105 Nos of proposals have been approved under FIDF with the total cost of the approved proposals is Rs. 4923.94 crores.



CHAPTER 1

FISH PRODUCTION IN INDIA



Table 1.1: Fish Production in India for the period 1980-81 to 2021-22

Year	Fish production (In Lakh Tonnes)			Annual Average Growth Rate (Percent)		
	Marine	Inland	Total	Marine	Inland	All India
1980-81	15.55	8.87	24.42	4.22	4.60	4.36
1981-82	14.45	9.99	24.44	-7.07	12.63	0.08
1982-83	14.27	9.40	23.67	-1.25	-5.91	-3.15
1983-84	15.19	9.87	25.06	6.45	5.00	5.87
1984-85	16.98	11.03	28.01	11.78	11.75	11.77
1985-86	17.16	11.60	28.76	1.06	5.17	2.68
1986-87	17.13	12.29	29.42	-0.17	5.95	2.29
1987-88	16.58	13.01	29.59	-3.21	5.86	0.58
1988-89	18.17	13.35	31.52	9.59	2.61	6.52
1989-90	22.75	14.02	36.77	25.21	5.02	16.66
1990-91	23.00	15.36	38.36	1.10	9.56	4.32
1991-92	24.47	17.10	41.57	6.39	11.33	8.37
1992-93	25.76	17.89	43.65	5.27	4.62	5.00
1993-94	26.49	19.95	46.44	2.83	11.51	6.39
1994-95	26.92	20.97	47.89	1.62	5.11	3.12
1995-96	27.07	22.42	49.49	0.56	6.91	3.34
1996-97	29.67	23.81	53.48	9.60	6.20	8.06
1997-98	29.50	24.38	53.88	-0.57	2.39	0.75
1998-99	26.96	26.02	52.98	-8.61	6.73	-1.67
1999-00	28.52	28.23	56.75	5.79	8.49	7.12
2000-01	28.11	28.45	56.56	-1.44	0.78	-0.33
2001-02	28.30	31.26	59.56	0.68	9.88	5.30
2002-03	29.90	32.10	62.00	5.65	2.69	4.10
2003-04	29.41	34.58	63.99	-1.64	7.73	3.21
2004-05	27.79	35.26	63.05	-5.51	1.97	-1.47
2005-06	28.16	37.56	65.72	1.33	6.52	4.23
2006-07	30.24	38.45	68.69	7.39	2.37	4.52
2007-08	29.20	42.07	71.27	-3.44	9.41	3.76
2008-09	29.78	46.38	76.16	1.99	10.24	6.86
2009-10	31.04	48.94	79.98	4.23	5.52	5.02
2010-11	32.50	49.81	82.31	4.70	1.78	2.91
2011-12	33.72	52.94	86.66	3.75	6.28	5.28
2012-13	33.21	57.19	90.40	-1.51	8.03	4.32
2013-14	34.43	61.36	95.79	3.67	7.29	5.96
2014-15	35.69	66.91	102.60	3.66	9.04	7.11
2015-16	36.00	71.62	107.62	0.87	7.04	4.89
2016-17	36.25	78.06	114.31	1.14	8.63	6.12
2017-18	37.56	89.48	127.04	3.61	14.62	11.13
2018-19	38.53	97.20	135.73	2.58	8.62	6.84
2019-20	37.27	104.37	141.64	-3.2	7.37	4.35
2020-21	34.76	112.49	147.25	-6.7	7.80	4.0
2021-22	41.27	121.21	162.48	18.7	7.76	10.34

Source: Department of Fisheries, State Govt. / UT Administration

Fig 1: MARINE FISH PRODUCTION: 2021-22 (In Lakh Tonnes)

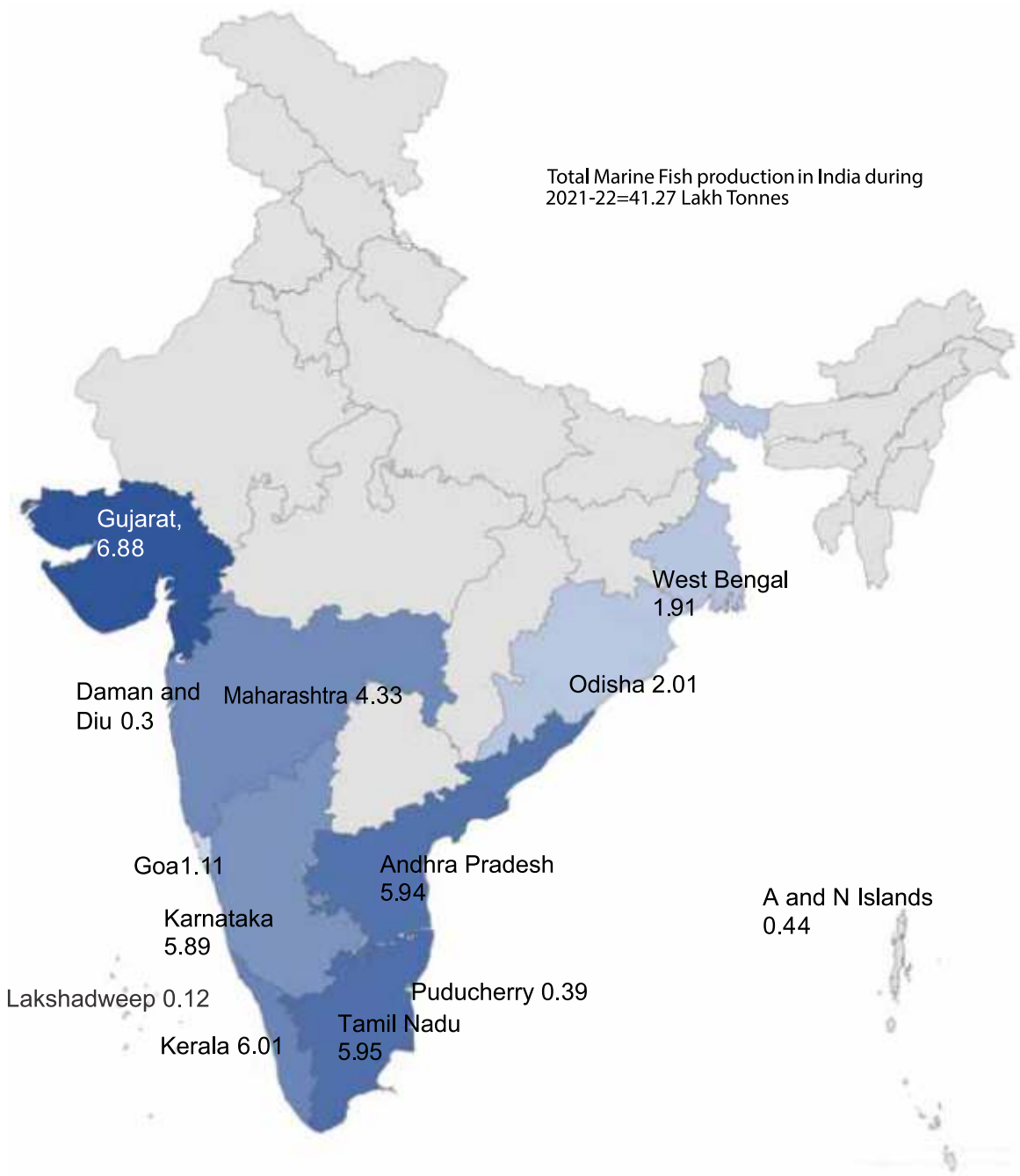


Table 1.2 State-wise Fish Production, India (In Lakh Tonnes)

State/UT	2017-18		2018-19		2019-20		2020-21		2021-22	
	Inland	Marine	Inland	Marine	Inland	Marine	Inland	Marine	Inland	Marine
Andhra Pradesh	28.45	6.05	33.91	6	36.1	5.64	40.7	5.54	42.19	5.94
Arunachal Pradesh	0.04	0	0.05	0	0.05	0	0.05	0	0.05	0.00
Assam	3.27	0	3.31	0	3.73	0	3.93	0	4.17	0.00
Bihar	5.88	0	6.02	0	6.41	0	6.83	0	7.62	0.00
Chhattisgarh	4.57	0	4.89	0	5.72	0	5.77	0	5.91	0.00
Goa	0.06	1.18	0.05	1.15	0.04	1.01	0.05	1.06	0.05	1.11
Gujarat	1.38	7.01	1.42	6.99	1.58	7.01	1.57	6.83	1.86	6.88
Haryana	1.9	0	1.8	0	1.91	0	2.03	0	2.08	0.00
Himachal Pradesh	0.13	0	0.13	0	0.14	0	0.15	0	0.16	0.00
Jharkhand	1.9	0	2.08	0	2.23	0	2.38	0	2.57	0.00
Karnataka	1.88	4.14	1.98	3.9	2.29	4.03	2.61	3.47	4.85	5.89
Kerala	1.89	4.84	1.92	6.09	2.05	4.75	2.24	3.92	2.25	6.01
Madhya Pradesh	1.43	0	1.73	0	2	0	2.49	0	2.93	0.00
Maharashtra	1.31	4.75	1	4.68	1.18	4.43	1.25	3.99	1.57	4.33
Manipur	0.33	0	0.32	0	0.32	0	0.33	0	0.33	0.00
Meghalaya	0.12	0	0.13	0	0.14	0	0.16	0	0.18	0.00
Mizoram	0.08	0	0.07	0	0.07	0	0.05	0	0.05	0.00
Nagaland	0.09	0	0.09	0	0.09	0	0.09	0	0.09	0.00
Odisha	5.34	1.51	6	1.59	6.6	1.58	7.01	1.72	7.89	2.01
Punjab	1.37	0	1.35	0	1.51	0	1.65	0	1.90	0.00
Rajasthan	0.54	0	0.55	0	1.16	0	0.6	0	0.66	0.00
Sikkim	0	0	0	0	0	0	0	0	0.00	0.00
Tamil Nadu	1.85	4.97	1.7	5.2	1.74	5.83	1.75	5.48	2.12	5.95
Telangana	2.7	0	2.84	0	3	0	3.49	0	3.90	0.00
Tripura	0.77	0	0.7	0	0.78	0	0.82	0	0.82	0.00
Uttar Pradesh	6.29	0	6.62	0	6.99	0	7.46	0	8.09	0.00
Uttarakhand	0.05	0	0.05	0	0.05	0	0.06	0	0.06	0.00
West Bengal	15.57	1.85	16.19	1.63	16.19	1.63	16.69	1.55	16.52	1.91
A and N Islands	0	0.39	0	0.4	0	0.4	0	0.43	0.00	0.44
Chandigarh	0	0	0.01	0	0.01	0	0	0	0.00	0.00
D & Nagar Haveli and Daman and Diu	0	0.24	0	0.28	0	0.32	0	0.3	0.00	0.30
Delhi	0.01	0	0	0	0.01	0	0.01	0	0.01	0.00
Jammu & Kashmir	0.21	0	0.21	0	0.21	0	0.21	0	0.25	0.00
Ladakh	-	-	-	-	0	0	0	0	0.01	0.00
Lakshadweep	0	0.21	0	0.22	0	0.2	0	0.15	0.00	0.12
Puducherry	0.07	0.42	0.07	0.4	0.07	0.44	0.05	0.34	0.08	0.39
India	89.48	37.56	97.2	38.53	104.37	37.27	112.48	34.77	121.21	41.27

Table 1.3: Species-wise Inland Fish landings by Coastal States and Union Territories: 2020-21 (In Lakh Tonnes)

State/UT	Major Carps (Catla, Rohu, Marigal)	Minor Carps	Exotic Carps	Murrels (Ophiocephalus spp.)	Catfishes (Wallago attu, pangasius)	Other fresh water fishes	Total
Andhra Pradesh	23.14	0	2.91	0	2.97	11.28	40.30
Arunachal Pradesh	0.02	0.00	0.02	0.00	0.00	0.01	0.05
Assam	1.01	0.5	1.01	0.3	0.34	0.77	3.93
Bihar	3.42	1.5	0.14	0.47	0.07	1.23	6.83
Chhattisgarh	4.63	0.06	0.56	0.01	0.48	0.03	5.77
Goa	0	0	0	0	0	0.05	0.05
Gujarat	0.40	0.04	0.00	0.05	0.06	0.85	1.41
Haryana	1.83	0	0.14	0	0.04	0.02	2.03
Himachal Pradesh	0.15	0	0	0	0	0	0.15
Jharkhand	1.96	0.02	0.21	0	0.19	0	2.38
Karnataka	1.29	0.21	0.97	0.00	0.02	0.03	2.52
Kerala	0.21	0	0.01	0	0.02	1.94	2.18
Madhya Pradesh	1.91	0.13	0.36	0	0.08	0.01	2.49
Maharashtra	0.82	0.11	0.13	0.07	0.00	0.11	1.24
Manipur	0.1	0.2	0.01	0	0	0.02	0.33
Meghalaya	0.06	0.01	0.06	0.00	0.01	0.02	0.16
Mizoram	0.02	0.02	0	0	0	0.01	0.05
Nagaland	0.05	0	0.04	0	0	0	0.09
Odisha	4.14	0.42	0.86	0.06	0.10	0.18	5.75
Punjab	0.96	0.03	0.63	0.00	0.03	0.01	1.65
Rajasthan	0.42	0.05	0.11	0	0.02	0	0.60
Sikkim	0	0	0	0	0	0	0.00
Tamil Nadu	0.59	0.01	0.24	0.04	0.03	0.84	1.75
Telangana	2.25	0.04	0.62	0.21	0.16	0.21	3.49
Tripura	0.54	0.09	0.18	0.00	0.01	0.01	0.82
Uttar Pradesh	2.95	1.22	2.95	0	0.33	0.01	7.46
Uttarakhand	0.02	0	0.02	0	0.01	0.01	0.06
West Bengal	10.04	0.64	2.02	0.33	0.52	3.14	16.69
A and N Islands	0	0	0	0	0	0	0.00
Chandigarh	0	0	0	0	0	0	0.00
Daman and Diu, D & N haveli	0	0	0	0	0	0	0.00
Delhi	0.01	0	0	0	0	0	0.01
Jammu & Kashmir	0.01	0.01	0.12	0.00	0.01	0.06	0.21
Ladakh	0	0	0	0	0	0	0.00
Lakshadweep	0	0	0	0	0	0	0.00
Puducherry	0.02	0.01	0.01	0.01	0.02	0.01	0.07
Total	62.97	5.32	14.33	1.55	5.51	20.85	110.52

Source: Department of Fisheries, State Govt. / UT Administration

**Table 1.4 (A) Species-wise Marine/Brackish fish Landings by Coastal States and Union Territories: 2020-21
(In Lakh Tonnes) (East Coast)**

State/UT	Andhra Pradesh	Odisha	Tamil Nadu	West Bengal	A and N Islands	Puducherry	Total
Sharks (Selachimorpha)	0.19	0.02	0.06	0.00	0.01	0.00	0.27
Skates/Guitarfish (Rajidae)	0.17	0.02	0.05	0.09	0.01	0.00	0.33
Rays (Batoidea)	0.11	0.01	0.05	0.00	0.01	0.00	0.18
Eels (Anguilliformes)	0.10	0.04	0.00	0.00	0.00	0.00	0.14
Catfishes (Siluriformes)	0.23	0.14	0.06	0.20	0.00	0.01	0.64
Indian Oil sardine (<i>Sardinella longiceps</i>)	0.59	0.06	0.30	0.05	0.02	0.02	1.04
Other sardines (<i>Sardinella fimbriata</i> and others)	0.17	0.06	0.27	0.00	0.02	0.01	0.53
Hilsa shad (<i>Tenualosa ilisha</i>)	0.08	0.04	0.04	0.20	0.00	0.00	0.37
Other shads (Alosinae)	0.04	0.05	0.04	0.00	0.00	0.00	0.13
Coilia (<i>Coilia</i> spp)	0.04	0.00	0.00	0.00	0.00	0.00	0.04
Setipinna (<i>Setipinna</i> spp)	0.04	0.00	0.00	0.00	0.00	0.00	0.04
Stolephorus (<i>Stolephorus</i> spp)	0.08	0.00	0.16	0.00	0.04	0.00	0.28
Thryssa (<i>Thryssa</i> spp)	0.05	0.01	0.06	0.00	0.00	0.00	0.13
Wolf herring (<i>Chirocentrus</i> spp.)	0.01	0.02	0.05	0.00	0.00	0.00	0.08
Other clupeids	0.42	0.11	0.36	0.00	0.00	0.01	0.90
BOMBAY DUCK (<i>Harpadon nehereus</i>)	0.05	0.02	0.00	0.00	0.00	0.00	0.07
LIZARD FISHES (<i>Synodontidae</i>)	0.03	0.00	0.00	0.00	0.00	0.00	0.03
HALF BEAKS&FULL BEAKS (<i>Hemiramphidae</i> & <i>Belonidae</i>)	0.00	0.01	0.05	0.00	0.00	0.01	0.07
FLYING FISHES (<i>Exocoetidae</i>)	0.00	0.00	0.06	0.00	0.00	0.00	0.06
Rock cods (<i>Lotella rhacina</i>)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Snappers (<i>Lutjanidae</i>)	0.02	0.00	0.00	0.00	0.05	0.01	0.09
Pig-face bream (<i>Lethrinidae</i>)	0.03	0.00	0.09	0.00	0.00	0.00	0.12
Threadfin bream (<i>Nemipteridae</i>)	0.10	0.02	0.10	0.00	0.00	0.00	0.22
Grouper (<i>Epinephelinae</i>)	0.10	0.00	0.00	0.00	0.00	0.01	0.11
Cobia (<i>Rachycentron canadum</i>)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Seabass (<i>Lates calcarifer</i>)	0.00	0.00	0.00	0.00	0.00	0.01	0.01
Other perches & perch like	0.00	0.05	0.13	0.09	0.00	0.01	0.28
GOATFISHES (<i>Mullidae</i>)	0.10	0.00	0.14	0.00	0.00	0.00	0.24
THREADFINS (<i>Polynemidae</i>)	0.10	0.03	0.04	0.00	0.00	0.00	0.18
CROAKERS (<i>Sciaenidae</i>)	0.10	0.12	0.11	0.12	0.01	0.01	0.47
RIBBON FISHES (<i>Trachipteridae</i>)	0.13	0.11	0.11	0.00	0.00	0.01	0.37
Horse Mackerel (<i>Caranx</i> & <i>Trichiurus</i>)	0.01	0.01	0.34	0.20	0.00	0.00	0.56
Scads (<i>Decapterus</i> spp.)	0.01	0.00	0.00	0.00	0.00	0.00	0.01
Leather-jackets (<i>Oligoplites saurus</i>)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Pompano (<i>Trachynotus</i> spp.)	0.00	0.00	0.01	0.00	0.00	0.00	0.01

**Table 1.4(B) Species-wise Marine/Brackish fish Landings by Coastal States and Union Territories: 2020-21
(In Lakh Tonnes) (East Coast)**

State/UT	Andhra Pradesh	Odisha	Tamil Nadu	West Bengal	A and N Islands	Puducherry	Total
Other carangids	0.03	0.06	0.00	0.10	0.04	0.01	0.24
SILVERBELLIES (Gerridae)	0.00	0.01	0.27	0.00	0.03	0.00	0.31
BIG-JAWED JUMPER (<i>Lactarius lactarius</i>)	0.00	0.00	0.05	0.00	0.00	0.00	0.05
Black pomfret (<i>Parastromatius niger</i>)	0.25	0.03	0.05	0.00	0.00	0.01	0.35
Silver pomfret (<i>Pampus argenteus</i>)	0.15	0.03	0.05	0.00	0.00	0.00	0.23
Indian mackerel (<i>Rastrelliger kanagurta</i>)	0.20	0.09	0.13	0.08	0.01	0.02	0.54
Other mackerels	0.14	0.01	0.13	0.00	0.01	0.00	0.29
<i>Scomberomorus</i> spp.	0.00	0.05	0.05	0.00	0.00	0.01	0.11
<i>Acanthocybium solandri</i>	0.00	0.00	0.05	0.00	0.00	0.00	0.05
Kawa kawa (<i>Euthynnus affinis</i>)	0.01	0.01	0.15	0.00	0.00	0.00	0.17
Frigate tuna (<i>Auxis</i> spp)	0.01	0.00	0.12	0.00	0.01	0.00	0.14
Skipjack tuna (<i>Katsuwonus pelamis</i>)	0.04	0.00	0.18	0.00	0.00	0.01	0.23
Longtail tuna (<i>Thunnus tonggol</i>)	0.01	0.00	0.15	0.00	0.00	0.00	0.16
Yellowfin tuna (<i>Thunnus albacares</i>)	0.14	0.00	0.18	0.00	0.00	0.01	0.33
Other tunnies	0.05	0.00	0.10	0.00	0.01	0.00	0.16
BILL FISHES (Xiphiidae)	0.00	0.00	0.00	0.00	0.02	0.00	0.02
BARRACUDAS (<i>Sphyrna</i> spp)	0.00	0.00	0.06	0.00	0.01	0.01	0.08
MULLETS (Mugilidae)	0.14	0.10	0.05	0.08	0.01	0.02	0.40
UNICORN COD (<i>Bregmaceros maclellandii</i>)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Halibut (<i>Hippoglossus</i> spp)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Flounders (Pleuronectoidei)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Soles (Soleidae)	0.00	0.03	0.02	0.00	0.00	0.01	0.05
Penaeid prawns (Penaeidae)	1.15	1.19	0.25	0.07	0.01	0.02	2.69
Non-penaeid prawns (Sergestidae)	0.20	0.05	0.07	0.03	0.00	0.00	0.35
Lobsters (Nephropidae)	0.04	0.00	0.01	0.00	0.00	0.00	0.05
Crabs (Brachyura)	0.07	0.05	0.23	0.00	0.01	0.01	0.37
Stomatopods (Stomatopoda)	0.00	0.02	0.00	0.00	0.00	0.00	0.02
Bivalves (Bivalvia)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Gastropods (Gastropoda)	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Squids (Decapodiformes)	0.00	0.04	0.08	0.00	0.00	0.00	0.12
Cuttlefish (Sepida)	0.00	0.00	0.08	0.00	0.00	0.01	0.09
Octopus (Octopoda)	0.00	0.00	0.08	0.00	0.00	0.00	0.08
MISCELLANEOUS	0.21	0.23	0.22	0.24	0.05	0.05	1.00
Overall Total	5.94	2.98	5.48	1.55	0.43	0.32	16.69

**Table 1.4 (C) Species-wise Marine fish Landings by Coastal States and Union Territories: 2020-21
(In Lakh Tonnes) (West Coast)**

Species	Goa	Gujarat	Karnataka	Kerala	Maharashtra	D&Diu, D&N Haveli	Lakshadweep	Total
Sharks (Selachimorpha)	0.01	0.2	0.01	0.01	0.05	0.00	0.00	0.28
Skates/Guitarfish (Rajidae)	0	0	0.00	0	0.00	0.00	0.00	0.00
Rays (Batoidea)	0.01	0	0.00	0.01	0.00	0.00	0.00	0.02
Eels (Anguilliformes)	0	0.1	0.00	0.01	0.05	0.00	0.00	0.16
Catfishes (Siluriformes)	0	0.3	0.02	0	0.11	0.01	0.00	0.44
Indian Oil sardine (Sardinella longiceps)	0.02	0	0.09	0.07	0.11	0.00	0.00	0.28
Other sardines (Sardinella fimbriata and others)	0.05	0	0.18	0.42	0.00	0.00	0.00	0.65
Hilsa shad (Tenualosa ilisha)	0	0.11	0.01	0	0.02	0.00	0.00	0.14
Other shads (Alosinae)	0	0	0.02	0.01	0.31	0.00	0.00	0.34
Coilia (Coilia spp)	0	0.2	0.00	0	0.00	0.01	0.00	0.21
Setipinna (Setipinna spp)	0	0	0.03	0	0.00	0.00	0.00	0.03
Stolephorus (Stolephorus spp)	0	0	0.01	0.27	0.00	0.00	0.00	0.28
Thryssa (Thryssa spp)	0	0	0.02	0.07	0.05	0.00	0.00	0.13
Wolf herring (Chirocentrus spp.)	0	0	0.01	0.27	0.00	0.00	0.00	0.28
Other clupeids	0	0.11	0.35	0.07	0.01	0.00	0.00	0.54
BOMBAY DUCK (Harpadon nehereus)	0	0.73	0.00	0	0.27	0.00	0.00	1.00
LIZARD FISHES (Synodontidae)	0	0	0.08	0.15	0.00	0.00	0.00	0.23
HALF BEAKS&FULL BEAKS (Hemiramphidae & Belonidae)	0	0	0.01	0.01	0.00	0.00	0.00	0.02
FLYING FISHES (Exocoetidae)	0	0	0.00	0	0.00	0.00	0.00	0.00
Rock cods (Lotella rhacina)	0	0	0.00	0.04	0.00	0.00	0.00	0.04
Snappers (Lutjanidae)	0	0	0.07	0.02	0.01	0.00	0.00	0.10
Pig-face bream (Lethrinidae)	0	0	0.05	0.01	0.02	0.00	0.00	0.08
Threadfin bream (Nemipteri- dae)	0.01	0	0.23	0.33	0.00	0.00	0.00	0.57
Grouper(Epinephelinae)	0	0	0.00	0	0.00	0.01	0.00	0.01
Cobia (Rachycentron canadum)	0	0	0.00	0	0.00	0.00	0.00	0.00
Seabass (Lates calcarifer)	0	0	0.00	0	0.00	0.00	0.00	0.00
Other perches & perch	0	0.1	0.01	0.08	0.00	0.00	0.00	0.19
GOATFISHES (Mullidae)	0	0	0.00	0	0.04	0.00	0.00	0.05
THREADFINS (Polynemidae)	0	0.05	0.00	0	0.02	0.00	0.00	0.07
CROAKERS (Sciaenidae)	0.02	0.6	0.09	0.06	0.04	0.01	0.00	0.81
RIBBON FISHE (Trachipteridae)	0.03	0.4	0.16	0.01	0.27	0.18	0.00	1.05
Horse Mackerel (Caranx & Trichiurus)	0.02	0	0.11	0.02	0.12	0.00	0.00	0.27
Scads (Decapterus spp.)	0	0	0.16	0.32	0.00	0.00	0.00	0.49
Leather-jackets (Oligoplites saurus)	0.01	0.1	0.01	0	0.00	0.03	0.00	0.15

**Table 1.4 (D) Species-wise Marine fish Landings by Coastal States and Union Territories: 2020-21
(In Lakh Tonnes) (West Coast)**

Species	Goa	Gujarat	Karnataka	Kerala	Maharashtra	D & Diu, D & N Haveli	Lakshadweep	Total
Pompano (Trachinotus spp.)	0	0	0.00	0	0.02	0.00	0.00	0.02
Other carangids ()	0	0.4	0.09	0.22	0.00	0.00	0.00	0.71
SILVERBELLIES (Gerridae)	0.07	0.1	0.07	0.02	0.00	0.00	0.00	0.26
BIG-JAWED JUMPER Lactarius lactarius)	0.01	0	0.06	0.01	0.02	0.00	0.00	0.10
Black pomfret (Parastromatius niger)	0	0.1	0.04	0.05	0.03	0.00	0.00	0.23
Silver pomfret (Pampus argenteus)	0.02	0.12	0.04	0.01	0.14	0.00	0.00	0.33
Indian mackerel (Rastrelliger kanagurta)	0.29	0	0.58	0.61	0.28	0.00	0.00	1.76
Other mackerels	0	0	0.00	0	0.00	0.00	0.00	0.00
Scomberomorus spp.	0.04	0.31	0.07	0.04	0.11	0.00	0.00	0.58
Acanthocybium solandri	0	0	0.00	0	0.00	0.00	0.00	0.01
Kawa kawa (Euthynnus affinis)	0.1	0	0.00	0.04	0.00	0.00	0.01	0.15
Frigate tuna (Auxis spp)	0	0	0.00	0.04	0.00	0.00	0.01	0.05
Skipjack tuna (Katsuwonus pelamis)	0	0	0.00	0.02	0.00	0.00	0.07	0.09
Longtail tuna (Thunnus tonggol)	0	0	0.00	0	0.00	0.00	0.00	0.00
Yellowfin tuna (Thunnus albacares)	0	0.33	0.00	0	0.00	0.00	0.04	0.37
Other tunnies	0	0	0.12	0.03	0.10	0.00	0.01	0.26
BILL FISHES (Xiphiidae)	0	0	0.00	0.03	0.00	0.00	0.00	0.03
BARRACUDAS (Sphyræna spp)	0	0	0.04	0.06	0.02	0.00	0.00	0.12
MULLETS (Mugilidae)	0	0.1	0.00	0	0.00	0.00	0.00	0.10
UNICORN COD (Bregmaceros maclellandii)	0	0	0.00	0	0.00	0.00	0.00	0.00
Halibut (Hippoglossus spp)	0	0	0.02	0	0.00	0.00	0.00	0.02
Flounders (Pleuronectoidei)	0	0	0.00	0	0.00	0.00	0.00	0.00
Soles (Soleidae)	0	0.1	0.04	0.07	0.07	0.00	0.00	0.27
Penaeid prawns (Penaeidae)	0.02	0.2	0.21	0.33	0.45	0.00	0.00	1.21
Non-penaeid prawns (Sergestidae)	0.05	0.3	0.00	0.02	0.34	0.00	0.00	0.71
Lobsters (Nephropidae)	0	0.05	0.00	0	0.00	0.00	0.00	0.05
Crabs (Brachyura)	0.02	0.1	0.04	0.05	0.03	0.00	0.00	0.24
Stomatopods (Stomatopoda)	0	0	0.14	0	0.00	0.00	0.00	0.14
Bivalves (Bivalvia)	0	0	0.00	0	0.00	0.00	0.00	0.00
Gastropods (Gastropoda)	0	0	0.00	0	0.00	0.00	0.00	0.00
Squids (Decapodiformes)	0.02	0	0.14	0.1	0.00	0.02	0.00	0.28
Cuttlefish (Sepida)	0	0.3	0.07	0.07	0.25	0.01	0.00	0.70
Octopus (Octopoda)	0	0	0.01	0.04	0.00	0.00	0.00	0.05
MISCELLANEOUS	0.24	1.48	0.08	0.13	0.59	0.00	0.01	2.53
Overall Total	1.06	6.99	3.56	3.98	3.99	0.30	0.15	20.03

Table 1.5: (A) Preserved and Processed Commodities by states/Union Territories: 2020-21 (In Lakh Tonnes)

State/UT	Tuna Frozen	Marine Fish Frozen	Fish Dried, Un-salted	Fish Dried & Salted or smoked	Shark fins, Dried, Salted etc	Frozen Whole cooked Lobster	Shrimp & Prawn Frozen	Dried Prawn/Shrimp	Frozen Cut-fish fillets	Fish meals soluble
Andhra Pradesh	0.04	0.04	0	0	0	0	2.72	0	0.01	0
Arunachal Pradesh	0	0	0	0	0	0	0	0	0	0
Assam	0	0	0.01	0	0	0	0	0	0	0
Bihar	0	0	0	0	0	0	0	0	0	0
Chhattisgarh	0	0	0	0.02	0	0	0	0	0	0
Goa	0	0	0	0	0	0	0	0	0	0
Gujarat	0	1.17	1.95	1.2	0	0	0.05	0	0	0
Haryana	0	0	0	0	0	0	0	0	0	0
Himachal Pradesh	0	0	0	0	0	0	0	0	0	0
Jharkhand	0	0	0	0	0	0	0	0	0	0
Karnataka	0.04	0.28	0.07	0.15	0.00	0.00	0.08	0.02	0.00	0.03
Kerala	0	0.49	0.11	0.44	0	0	0.64	0.01	0	0
Madhya Pradesh	0	0	0	0	0	0	0	0	0	0
Maharashtra	0	0	1.04	0.1	0.04	0.21	0	0.04	0.06	0
Manipur	0	0	0	0	0	0	0	0	0	0
Meghalaya	0	0	0	0	0	0	0	0	0	0
Mizoram	0	0	0	0	0	0	0	0	0	0
Nagaland	0	0	0	0	0	0	0	0	0	0
Odisha	0	0	0	0	0	0	0.6	0	0	0
Punjab	0	0	0	0	0	0	0	0	0	0
Rajasthan	0	0	0	0	0	0	0	0	0	0
Sikkim	0	0	0	0	0	0	0	0	0	0
Tamil Nadu	0.07	0.42	0	0	0	0	0.74	0	0.04	0
Telangana	0	0	0	0	0	0	0	0	0	0
Tripura	0	0	0	0	0	0	0	0	0	0
Uttar Pradesh	0	0	0	0	0	0	0	0	0	0
Uttarakhand	0	0	0	0	0	0	0	0	0	0
West Bengal	0	0.05	0.04	0	0.07	0	0.77	0	0.05	0
A and N Islands	0	0.02	0	0	0	0	0	0	0	0
Chandigarh	0	0	0	0	0	0	0	0	0	0
Daman and Diu, D & Nagar Haveli	0	0.22	0	0	0	0	0	0	0.01	0
Delhi	0	0	0	0	0	0	0	0	0	0
Jammu & Kashmir	0	0	0	0	0	0	0	0	0	0
Ladakh	0	0	0	0	0	0	0	0	0	0
Lakshadweep	0.01	0.01	0	0.01	0	0	0	0	0	0
Puducherry	0	0.01	0	0	0	0	0	0	0	0
Total	0.16	2.65	3.22	1.92	0.11	0.21	5.60	0.07	0.17	0.03

Table 1.5: (B) Preserved and Processed Commodities by states/Union Territories: 2020-21 (In Lakh Tonnes)

State/UT	Frozen Squids	Dried Squids	Yellow -fin tuna, frozen	Macker - els, frozen	Fish, salted & dried	Lobsters, Whole, frozen	jellyfish, dried, salted or in brine	Miscellaneous	Overall Total
Andhra Pradesh	0	0	0.03	0.02	0.01	0	0	0.03	2.9
Arunachal Pradesh	0	0	0	0	0	0	0	0	0
Assam	0	0	0	0	0	0	0	0	0.01
Bihar	0	0	0	0	0	0	0	0	0
Chhattisgarh	0	0	0	0	0	0	0	0	0.02
Goa	0	0	0	0	0	0	0	0	0
Gujarat	0	0	0	0	0	0	0	0.49	4.86
Haryana	0	0	0	0	0	0	0	0	0
Himachal Pradesh	0	0	0	0	0	0	0	0	0
Jharkhand	0	0	0	0	0	0	0	0	0
Karnataka	0.06	0	0	0.08	0.01	0	0	0.05	0.87
Kerala	0	0	0	0	0	0	0	4.45	6.14
Madhya Pradesh	0	0	0	0	0	0	0	0	0
Maharashtra	0.16	0	0	0	0	0	0	0	1.65
Manipur	0	0	0	0	0	0	0	0	0
Meghalaya	0	0	0	0	0	0	0	0	0
Mizoram	0	0	0	0	0	0	0	0	0
Nagaland	0	0	0	0	0	0	0	0	0
Odisha	0	0	0	0	0	0	0	0.01	0.61
Punjab	0	0	0	0	0	0	0	0	0
Rajasthan	0	0	0	0	0	0	0	0	0
Sikkim	0	0	0	0	0	0	0	0	0
Tamil Nadu	0.04	0	0	0	0.34	0	0	0.53	2.18
Telangana	0	0	0	0	0	0	0	0	0
Tripura	0	0	0	0	0	0	0	0	0
Uttar Pradesh	0	0	0	0	0	0	0	0	0
Uttarakhand	0	0	0	0	0	0	0	0	0
West Bengal	0	0	0	0	0	0	0	0.14	1.07
A and N Islands	0	0	0	0	0.07	0	0	0	0.09
Chandigarh	0	0	0	0	0	0	0	0	0
Daman and Diu, D & Nagar Haveli	0.02	0	0	0	0	0	0	0	0.25
Delhi	0	0	0	0	0	0	0	0	0
Jammu & Kashmir	0	0	0	0	0	0	0	0	0
Ladakh	0	0	0	0	0	0	0	0	0
Lakshadweep	0	0	0	0	0	0	0	0	0.03
Puducherry	0	0	0	0	0	0	0	0	0.01
Overall Total	0.28	0.00	0.03	0.10	0.44	0.00	0.00	5.70	20.69

Table 1.6 : Year-wise Fish Seed Production in India

S.N.	Year	Production (Lakh Fry)
1	1985-86	63,220
2	1986-87	76,010
3	1987-88	86,080
4	1988-89	93,250
5	1989-90	96,910
6	1990-91	1,03,320
7	1991-92	1,22,030
8	1992-93	1,25,000
9	1993-94	1,42,390
10	1994-95	1,45,440
11	1995-96	1,50,070
12	1996-97	1,58,520
13	1997-98	1,59,040
14	1998-99	1,51,560
15	1999-00	1,65,890
16	2000-01	1,56,080
17	2001-02	1,57,580
18	2002-03	1,63,330
19	2003-04	1,92,310
20	2004-05	2,07,910
21	2005-06	2,19,880
22	2006-07	2,36,480
23	2007-08	2,41,440
24	2008-09	3,21,770
25	2009-10	2,93,130
26	2010-11	3,41,095
27	2011-12	3,65,651
28	2012-13	3,49,202
29	2013-14	4,14,484
30	2014-15	3,93,487
31	2015-16	3,54,350
32	2016-17	3,57,439
33	2017-18	4,44,207
34	2018-19	4,81,974
35	2019-20	5,21,865
36	2020-21	5,40,690

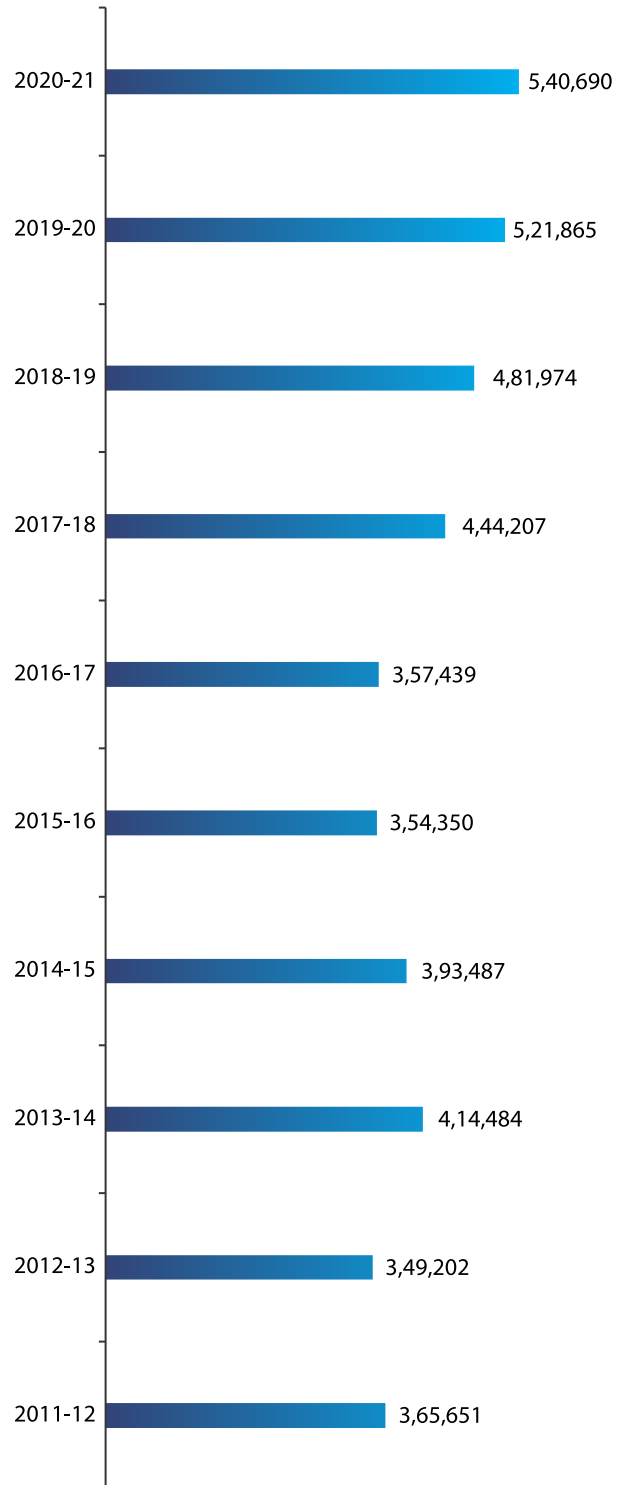
Fig 3: Total Fish Seed Production, India (Lakh Fry)

Table 1.7 : State-wise Fish Seed Production in India (lakh Fry)

State/Union Territory	2016-17	2017-18	2018-19	2019-20	2020-21	Total
Andhra Pradesh	7923	8845	8842	5358	38126	69094
Arunachal Pradesh	65	70	0	0	80	215
Assam	67580	80000	98930	95190	98860	440560
Bihar	7932.2	9206	9286.5	13727.18	17069.4	57221.28
Chhattisgarh	19750.4	22186	25131.8	27386.8	28805.3	123260.3
Goa	6	7	6	3	2.5	24.5
Gujarat	5529.3	1852.3	6340.5	26083.7	9585	49390.8
Haryana	7046	4776.8	4229.6	4538.06	7784.6	28375.06
Himachal Pradesh	625	47	18.3	6.8	15.6	712.7
Jharkhand	41501	103349.1	103629	105692.4	114950	469121.5
Karnataka	4998.8	2481.1	6298	5816.5	7545.6	27140
Kerala	1770.9	1730.4	944.42	1282	1342	7069.72
Madhya Pradesh	11113	11172.3	13729.83	14592.09	14837.5	65444.72
Maharashtra	1895.5	6250	2810.87	13662.7	1964.04	26583.11
Manipur	2150	2500	4060.8	2494.8	2788	13993.6
Meghalaya	75.6	97	65.23	32.14	137.9	538.11
Mizoram	310	426	406.6	400	200	1742.6
Nagaland	480	481	760	795	798	3314
Odisha	7782.8	8077.4	8962.4	9471.6	8441.3	42735.5
Punjab	2375	2779.8	2977.4	2642.35	2562.57	13337.12
Rajasthan	10988.6	10653	10329.3	12264.1	10870.9	55105.9
Sikkim	23.2	6.5	16.25	16.25	14.05	76.25
Tamil Nadu	5732	5572.8	13008.7	19426.88	6032	49772.38
Telangana	1876	4179	6500	5500	6720	24775
Tripura	3137	4350	0	0	0	7487
Uttarakhand	746.5	678.8	655.6	289.6	299.85	2670.35
Uttar Pradesh	27535.6	27128.7	29342.1	30287.8	32331.2	146625.4
West Bengal	115700	124550	124550*	124550*	124550*	6,13,900
A & N Islands	12.8	14.7	0	0	17	44.5
Chandigarh	8	8	0.8	0.8	0.8	18.4
Daman and Diu and Dadra & Nagar Haveli	0	0	0	0	0	0
Delhi	0	20	2	15	0	37
Jammu & Kashmir	770	712	205.6	209.7	457	2354.3
Ladakh	0	0	0	0	0.01	0.01
Lakshadweep	0	0	0	0	0	0
Puducherry	0	0	0	0	0	0
All India	357439.2	444207.7	482039.6	521865.5	540689.82	2346241.8

*Previous value has been used

CHAPTER 2

DISPOSITION OF FISH CATCH



Fig 4 : Total of Disposition of Fish Catch, 2020-21 (in Lakh Tonnes) : Top 10

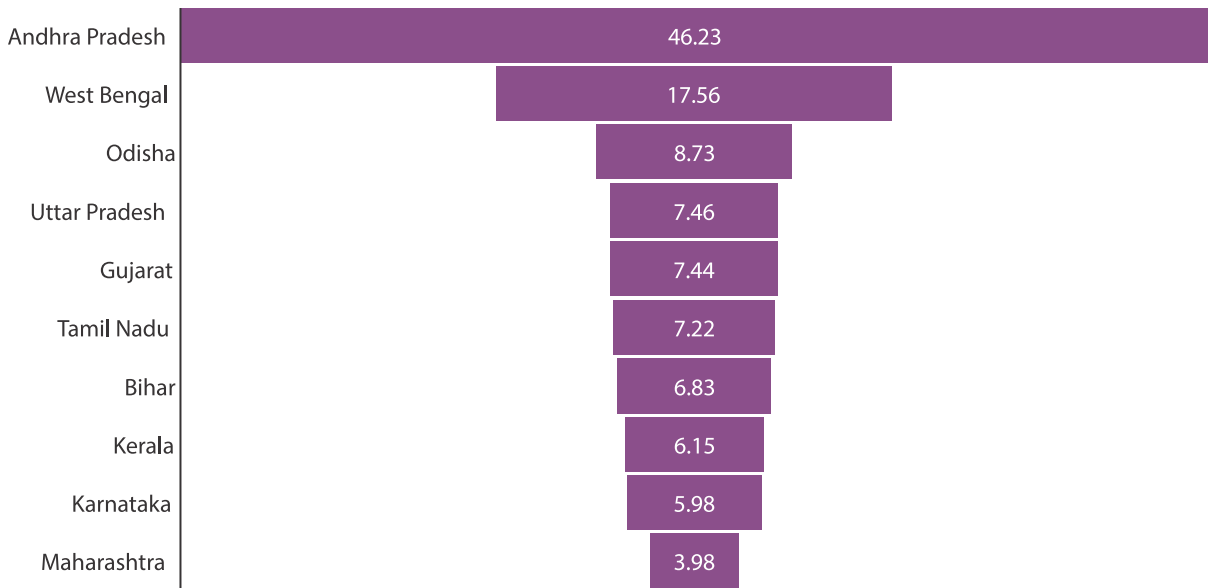


Fig 5 . Year-wise Disposition of Fish Catch (In Lakh Tonnes)

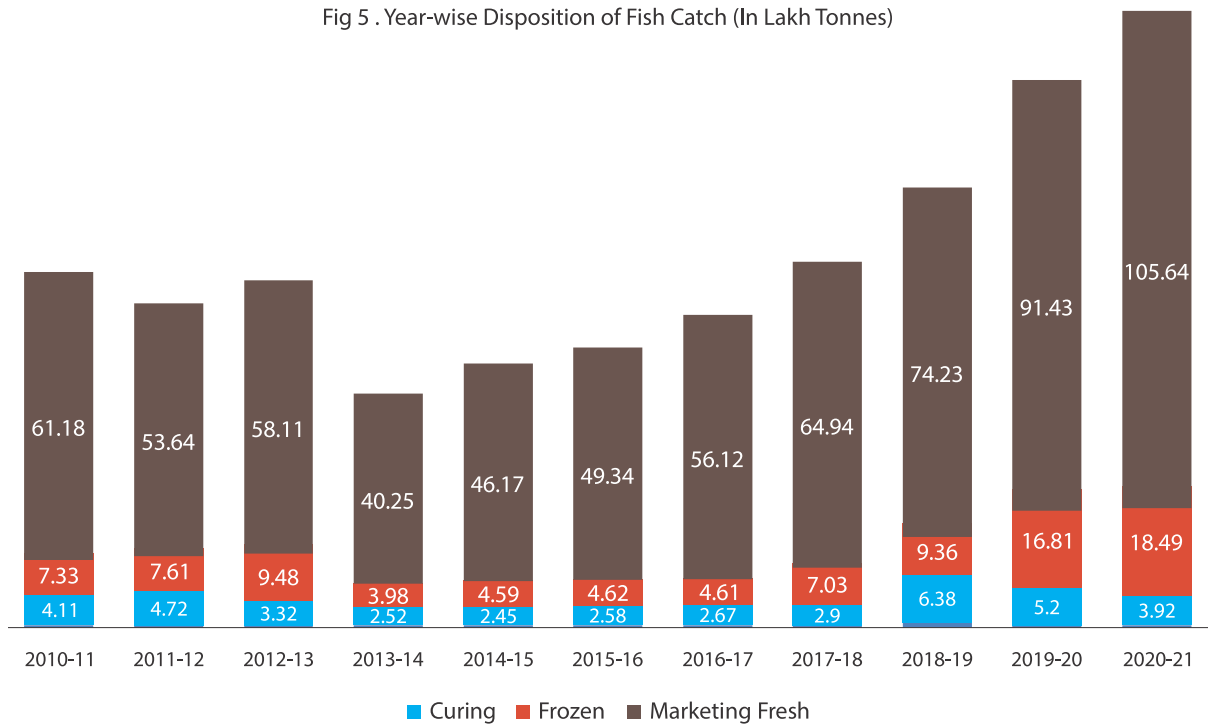


Table 2.1: Year-wise Disposition of Fish Catch (In Lakh Tonnes)

Year	Marketing Fresh	Frozen	Curing	Canning	Reduction	Miscellaneous	Offal for reduction	Un-specified	Others	Total
1991-92	27.06	2.65	6.13	0.3	3.33	0.47	0.47	0	0	40.41
1992-93	27.98	2.84	5.9	0.25	3.55	0.7	0.47	0	0	41.69
1993-94	31.05	3.09	6.44	0.09	3.72	0.16	0.87	0	0	45.42
1994-95	32.5	3.1	6.51	0.12	3.97	0.39	0.74	0	0	47.33
1995-96	34.27	3.2	6.32	0.13	3.58	0.38	0.4	0	0	48.28
1996-97	37.84	3.92	6.39	0.11	3.13	0.22	0.39	0	0	52
1997-98	38.74	4.21	6.02	0.14	3.45	0.18	1.02	0	0	53.76
1998-99	38.66	3.9	5.68	0.12	3.03	0.19	0.83	0	0	52.41
1999-00	42.06	2.84	4.21	0.17	2.96	0.53	0.09	0.7	0.29	53.85
2000-01	42.87	2.76	3.39	0.5	3.17	0.01	0.34	0.69	2.36	56.09
2001-02	47.77	2.64	3.46	0.53	3.08	0.16	0.43	0.72	0.47	59.26
2002-03	47.89	3.32	3.88	0.23	2.65	0.42	0.01	0.16	0.16	58.72
2003-04	48.28	3.07	3.63	0.36	2.77	0.4	0.01	0.12	0.16	58.8
2004-05	52.83	3.85	3.3	0.45	2.69	0.01	0.4	0.16	0.17	63.86
2005-06	54.68	3.9	3.3	0.24	2.84	0.34	0.01	0.17	0.26	65.74
2006-07	55.59	3.96	3.44	0.24	2.95	0.36	0.01	0.14	0.15	66.84
2007-08	60.37	4.24	3.67	0.25	3.34	0.14	0.01	0.16	0.15	72.33
2008-09	58.04	3.78	3.35	0.31	3.13	0.45	0.01	0.17	0.15	69.39
2009-10	59.55	4.35	3.47	0.33	2.91	0.61	0	0.19	0.47	71.88
2010-11	61.18	7.33	4.11	0.47	2.83	0.74	0.01	1.37	1.83	79.87
2011-12	53.64	7.61	4.72	0.39	2.98	0	73	0.63	1.71	144.68
2012-13	58.11	9.48	3.32	0.42	3.01	0	1.51	0.71	1.68	78.24
2013-14	40.25	3.98	2.52	0.44	3.24	0	0.76	0.2	2	53.39
2014-15	46.17	4.59	2.45	0.43	3.33	0	0.9	0.21	2.18	60.26
2015-16	49.34	4.62	2.58	0.52	3.21	0	1.06	0.22	0.2	61.75
2016-17	56.12	4.61	2.67	0.5	3.25	0	1.2	0.29	2.4	71.04
2017-18	64.94	7.03	2.9	0.36	3.33	0	1.89	0.38	2.39	83.22
2018-19	74.23	9.36	6.38	1.02	3.28	2.28	0	0.05	1.43	98.03
2019-20	91.43	16.81	5.2	0.36	3.38	3.04	0.08	0.05	1.44	121.79
2020-21	105.64	18.49	3.92	0.45	3.08	3.27	0.10	0.01	2.12	137.07

Source: Department of Fisheries, State Govt. / UT Administration

Table 2.2: State wise Disposition of Fish Catch, 2020-21 (in Lakh Tonnes)

States/UT	Marketing Fresh	Frozen	Cu-ring	Can-ning	Reduction	Miscellaneous	Offal for reduction	Un-specified	Others	Total
Andhra Pradesh	30.05	12.5	0.95	0.21	0.35	2.07	0.10	0	0	46.23
Arunachal Pradesh	0.05	0	0	0	0	0	0	0	0	0.05
Assam	3.55	0	0	0	0	0	0	0	0.01	3.56
Bihar	5.51	0	0	0	0	0	0	0	1.32	6.83
Chhattisgarh	0.58	0	0	0	0	0	0	0	0	0.58
Goa	0.96	0	0.05	0.03	0	0.02	0	0	0	1.06
Gujarat	2.31	1.49	1.49	0	2.15	0	0	0	0	7.44
Haryana	0	0	0	0	0	0	0	0	0	0
Himachal Pradesh	0.15	0	0	0	0	0	0	0	0	0.15
Jharkhand	2.38	0	0	0	0	0	0	0	0	2.38
Karnataka	4.90	0.38	0.33	0.21	0	0.03	0	0	0.14	5.99
Kerala	4.51	1.17	0	0	0	0.47	0	0	0	6.15
Madhya Pradesh	2.49	0	0	0	0	0	0	0	0	2.49
Maharashtra	3.43	0	0	0	0.04	0	0	0	0.51	3.98
Manipur	0.28	0	0.05	0	0	0	0	0	0	0.33
Meghalaya	0.16	0	0	0	0	0	0	0	0	0.16
Mizoram	0.04	0	0	0	0	0	0	0	0	0.04
Nagaland	0.07	0	0.01	0	0	0	0	0.01	0	0.09
Odisha	7.33	0.82	0.58	0	0	0	0	0	0	8.73
Punjab	1.65	0	0	0	0	0	0	0	0	1.65
Rajasthan	0.6	0	0	0	0	0	0	0	0	0.6
Sikkim	0.01	0	0	0	0	0	0	0	0	0.01
Tamil Nadu	5.04	1.31	0.34	0	0	0.53	0	0	0	7.22
Telangana	2.96	0.32	0	0	0	0.08	0	0	0.13	3.49
Tripura	0.82	0	0	0	0	0	0	0	0	0.82
Uttar Pradesh	7.46	0	0	0	0	0	0	0	0	7.46
Uttarakhand	0.54	0	0	0	0	0	0	0	0	0.54
West Bengal	16.58	0.38	0	0	0.54	0.06	0	0	0	17.56
A and N Islands	0.34	0.02	0.07	0	0	0	0	0	0	0.43
Chandigarh	0	0	0	0	0	0	0	0	0	0
Daman and Diu, Da-dar & Nagar Haveli	0.29	0.01	0	0	0	0	0	0	0	0.3
Delhi	0.01	0	0	0	0	0	0	0	0	0.01
Jammu & Kashmir	0.21	0	0	0	0	0	0	0	0	0.21
Ladakh	0	0	0	0	0	0	0	0	0	0
Lakshadweep	0.08	0.03	0.04	0	0	0	0	0	0	0.15
Puducherry	0.29	0.06	0.01	0	0	0	0	0	0.01	0.37
Total	105.63	18.49	3.92	0.45	3.08	3.27	0.10	0.01	2.12	137.07

Source: Department of Fisheries, State Govt. / UT Administration

CHAPTER 3

CONSUMPTION OF FISH



Table 3.1: State wise Fish Consumption Data (Per Capita/Kg): 2020-21

S. N.	States/UT	Yearly Fish Consumption (Per Capita/Kg.) 2020-21
1	Andhra Pradesh	8.91
2	Arunachal Pradesh	3.65
3	Assam	11.89
4	Bihar	9.6
5	Chhattisgarh	19.7
6	Goa	78
7	Gujarat	7.44
8	Haryana	0.3
9	Himachal Pradesh	2.22
10	Jharkhand	10.61
11	Karnataka	10.55
12	Kerala	17.93
13	Madhya Pradesh	4.87
14	Maharashtra	4.72
15	Manipur	18.25
16	Meghalaya	9.00
17	Mizoram	3.38
18	Nagaland	6.06
19	Odisha	16.34
20	Punjab	0.4
21	Rajasthan	0.01
22	Sikkim	1.16
23	Tamil Nadu	9.3
24	Telangana	8.7
25	Tripura	25.53
26	Uttarakhand	0.81
27	Uttar Pradesh	11.09
28	West Bengal	NR
29	A and N Islands	77.84
30	Chandigarh	NR
31	Daman and Diu, D & Nagar Haveli	1.2
32	Delhi	0.25
33	Jammu & Kashmir	6.00
34	Ladakh	0.05
35	Lakshadweep	125
36	Puducherry	18.88
ALL INDIA		6.31
NR: Not Received		
Source: Department of Fisheries, State Govt. / UT Administration		

Table 3.2 (A): State wise Monthly Per Capita Consumption of Fish & Prawn (Quantity) by State/UTs (2011-12)

S.N.	States/Ut	Consumption	Per Capita Consumption (Both Quantity & Value)		Number of households reported Consumption per 1000 households	
			Rural	Urban	Rural	Urban
1	Andhra Pradesh	Quantity (KG)	0.153	0.108	174	112
		Value (Rs.)	12.29	8.8		
2	Arunachal Pradesh	Quantity(KG)	0.58	0.647	525	578
		Value (Rs.)	77.44	86.91		
3	Assam	Quantity(KG)	0.665	0.767	804	750
		Value (Rs.)	75.28	103.05		
4	Bihar	Quantity(KG)	0.239	0.187	299	226
		Value (Rs.)	22.08	18.68		
5	Chhattisgarh	Quantity(KG)	0.157	0.103	199	121
		Value (Rs.)	12.97	10.05		
6	Goa	Quantity(KG)	1.537	1.7	838	809
		Value (Rs.)	185.94	234.68		
7	Gujarat	Quantity(KG)	0.052	0.052	54	84
		Value (Rs.)	4.15	4.88		
8	Haryana	Quantity(KG)	0.002	0.017	3	17
		Value (Rs.)	0.2	2.47		
9	Himachal Pradesh	Quantity(KG)	0.005	0.031	6	17
		Value (Rs.)	0.73	3.31		
10	Jammu & Kashmir	Quantity(KG)	0.012	0.027	9	23
		Value (Rs.)	1.74	3.84		
11	Jharkhand	Quantity(KG)	0.142	0.149	195	147
		Value (Rs.)	13.28	15.88		
12	Karnataka	Quantity(KG)	0.163	0.117	115	81
		Value (Rs.)	10	10.12		
13	Kerala	Quantity(KG)	2.262	2.103	868	794
		Value (Rs.)	138.23	147.85		
14	Madhya Pradesh	Quantity(KG)	0.048	0.043	71	58
		Value (Rs.)	4.09	3.98		
15	Maharashtra	Quantity(KG)	0.09	0.175	125	188
		Value (Rs.)	8.68	23.63		
16	Manipur	Quantity(KG)	0.462	0.57	663	813
		Value (Rs.)	67.52	85.59		
17	Meghalaya	Quantity(KG)	0.403	0.517	690	643
		Value (Rs.)	56.75	73.45		
18	Mizoram	Quantity(KG)	0.176	0.203	193	236
		Value (Rs.)	24.72	29.27		

Table 3.2 (B): Monthly Per Capita Consumption of Fish & Prawn (Quantity) by State/UTs (2011-12)

S.N.	States/Ut	Consumption	Per Capita Consumption (Both Quantity & Value)		Number of households reported Consumption per 1000 households	
			Rural	Urban	Rural	Urban
19	Nagaland	Quantity(KG)	0.285	0.482	229	424
		Value (Rs.)	31.78	53.54		
20	Odisha	Quantity(KG)	0.438	0.474	576	492
		Value (Rs.)	36.28	47.06		
21	Punjab	Quantity(KG)	0.001	0.004	3	5
		Value (Rs.)	0.18	0.55		
22	Rajasthan	Quantity(KG)	0.011	0.004	10	4
		Value (Rs.)	1.03	0.58		
23	Sikkim	Quantity(KG)	0.01	0.061	12	76
		Value (Rs.)	1.2	7.29		
24.	Tamil Nadu	Quantity(KG)	0.257	0.292	218	265
		Value (Rs.)	23.41	29.05		
25	Telangana	Quantity(KG)	-	-	-	-
		Value (Rs.)	-	-		
26	Tripura	Quantity(KG)	1.069	1.478	963	933
		Value (Rs.)	132.17	202.09		
27	Uttarakhand	Quantity(KG)	0.053	0.076	36	62
		Value (Rs.)	4.81	7.34		
28	Uttar Pradesh	Quantity(KG)	0.072	0.035	103	49
		Value (Rs.)	5.87	3.28		
29	West Bengal	Quantity(KG)	0.805	1.032	831	792
		Value (Rs.)	77.67	130.46		
30	A and N Islands	Quantity(KG)	1.573	1.255	914	781
		Value (Rs.)	122.08	94.31		
31	Chandigarh	Quantity(KG)	0	0.005	0	6
		Value (Rs.)	0	0.6		
32	D&Nagar Haveli	Quantity(KG)	0.178	0.04	244	72
		Value (Rs.)	15.06	3.78		
33	Daman and Diu	Quantity(KG)	0.625	0.997	388	651
		Value (Rs.)	46.56	6.29		
34	Delhi	Quantity(KG)	0.026	0.037	58	51
		Value (Rs.)	2.36	4013		
35	Lakshadweep	Quantity(KG)	2.321	3.801	849	889
		Value (Rs.)	294.63	400.92		
36	Puducherry	Quantity(KG)	0.547	0.678	735	670
		Value (Rs.)	62.64	76.81		
India Value (Rs.)		Quantity(KG)	0.266	0.252	265	210
		Value (Rs.)	22.77	26.73		

Source: National Sample Survey Organisation (NSSO), 2011-12

CHAPTER 4

FISHERIES ECONOMY



Table 4.1 Gross Value Added (₹ in crore) by Economic Activity during the year 2011-12 to 2020-21

Current Basic Prices						
Years	Crops	Forestry and Logging	Fisheries	Livestock	Agriculture, forestry and fishing	National GVA
2011-12	9,82,151	1,24,436	68,027	3,27,334	15,01,947	81,06,946
2012-13	10,88,814	1,37,558	79,911	3,68,823	16,75,107	92,02,692
2013-14	12,48,776	1,56,674	98,190	4,22,733	19,26,372	1,03,63,153
2014-15	12,92,874	1,73,760	1,16,567	5,10,411	20,93,612	1,15,04,279
2015-16	13,27,992	1,84,411	1,32,720	5,82,410	22,27,533	1,25,74,499
2016-17	14,86,044	2,05,364	1,54,643	6,72,611	25,18,662	1,39,65,200
2017-18	16,33,264	2,17,603	1,93,275	7,85,683	28,29,826	1,55,05,665
2018-19	16,80,777	2,55,053	2,12,087	8,82,009	30,29,925	1,71,75,128
2019-20	18,91,966	2,60,603	2,28,065	9,77,730	33,58,364	1,83,55,109
2020-21	19,97,147	2,65,479	2,32,620	11,14,249	36,09,494	1,80,57,810
Constant Prices (2011-12)						
Years	Crops	Forestry and Logging	Fisheries	Livestock	Agriculture, forestry and fishing	National GVA
2011-12	9,82,151	1,24,436	68,027	3,27,334	15,01,947	81,06,946
2012-13	9,83,809	1,24,743	71,362	3,44,375	15,24,288	85,46,275
2013-14	10,37,060	1,32,093	76,487	3,63,558	16,09,198	90,63,649
2014-15	9,98,425	1,34,609	82,232	3,90,449	16,05,715	97,12,133
2015-16	9,69,344	1,36,960	90,205	4,19,637	16,16,146	1,04,91,870
2016-17	10,20,258	1,44,547	99,627	4,61,572	17,26,004	1,13,28,285
2017-18	10,75,111	1,52,351	1,14,730	4,97,830	18,40,023	1,20,34,171
2018-19	10,49,211	1,63,949	1,24,468	5,40,970	18,78,598	1,27,33,798
2019-20	11,06,545	1,64,416	1,29,893	5,81,450	19,82,303	1,32,19,476
2020-21	11,27,575	1,65,624	1,37,716	6,17,117	20,48,032	12585074

Source: National Statistics Office, Ministry of Statistics & Programme Implementation, Government of India

Contribution in Agriculture economy by the Agriculture and allied sector

Fig 6 : Trend of Percentage Contribution of GVA due to Crops sector over the total GVA of Agriculture sector (Current Price): All India

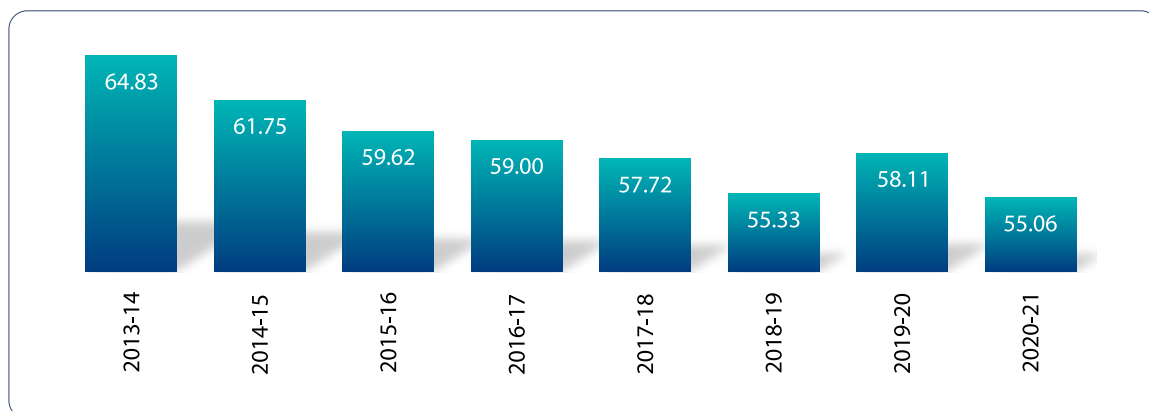


Fig 7: Trend of Percentage Contribution of GVA due to Livestock sector over the total GVA of Agriculture sector (Current Price): All India

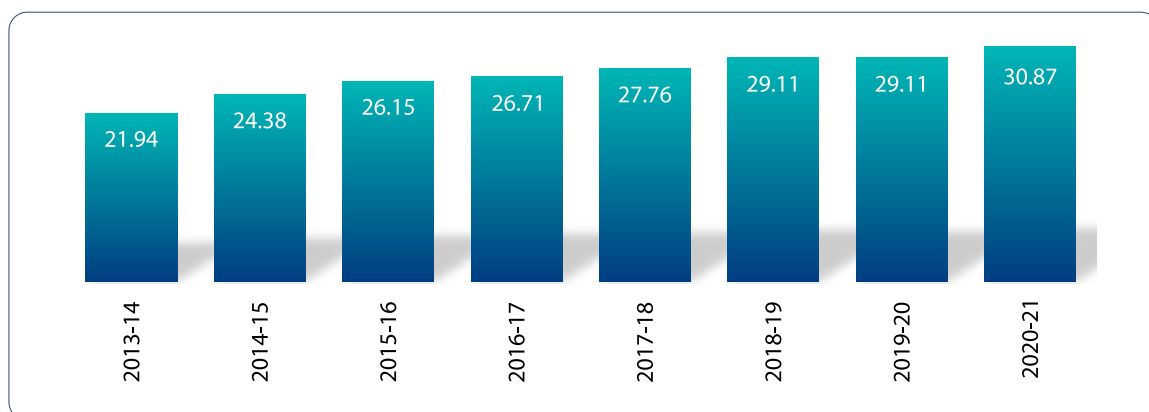


Fig 8 : Trend of Percentage Contribution of GVA due to Forestry and Logging sector over the total GVA of Agriculture sector (Current Price): All India

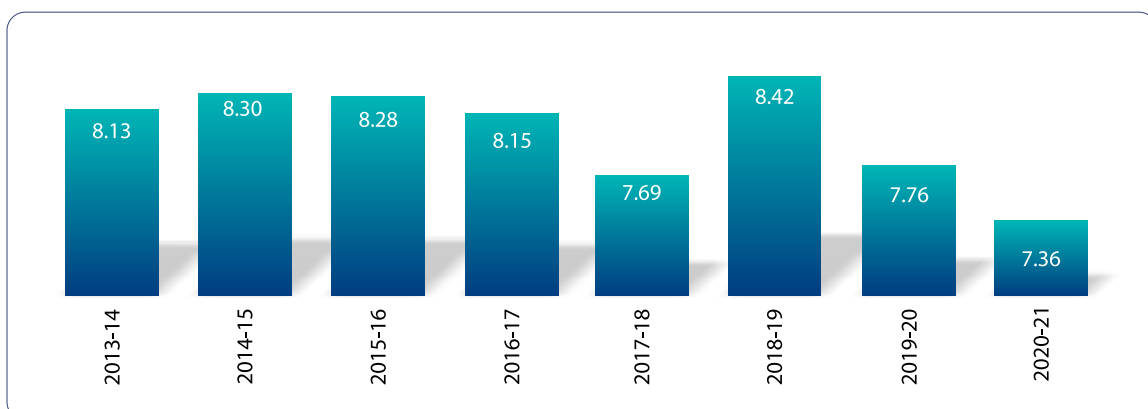


Fig 9: Trend of Percentage Contribution of GVA due to Fisheries Sector over the total GVA of Agriculture sector (Current Price): All India

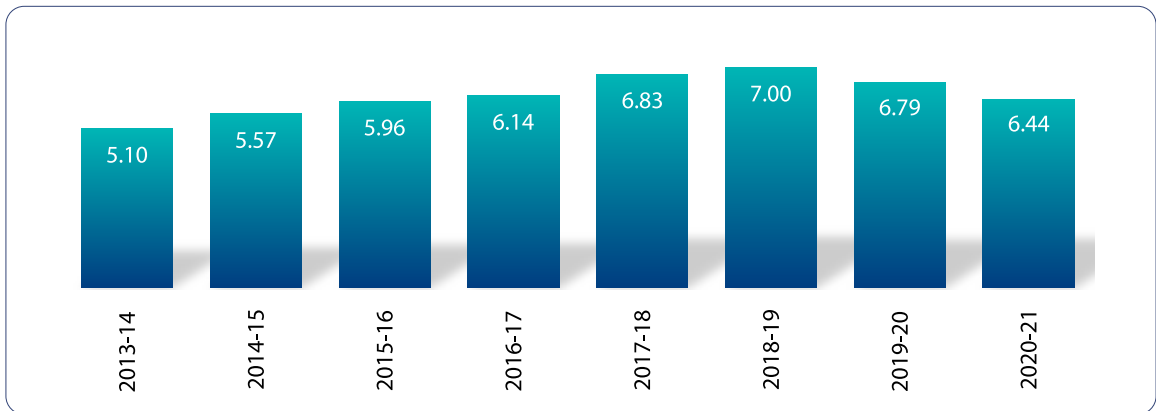


Fig 10 : Trend of Percentage Contribution of GVA due to Crops Sector over the total GVA of Agriculture sector (Constant price:2011-12): All India

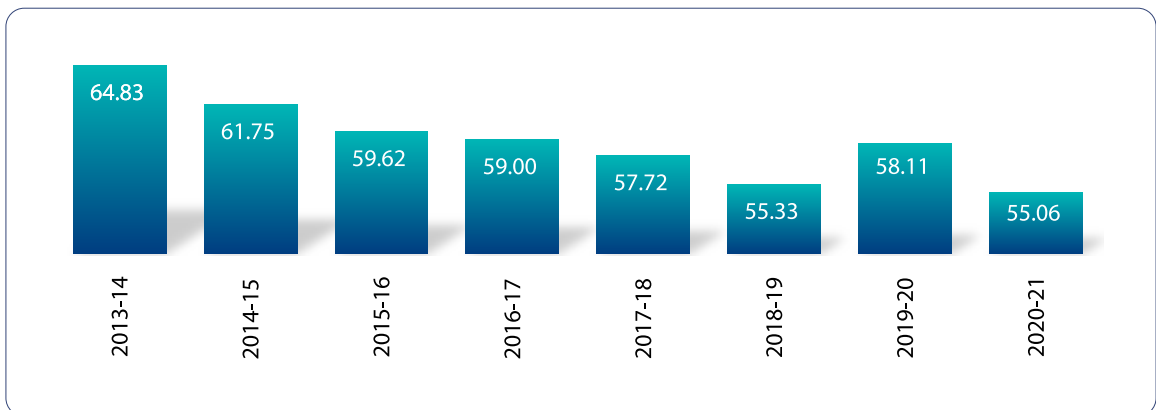


Fig 11 : Trend of Percentage Contribution of GVA due to Livestock Sector over the total GVA of Agriculture sector (Constant price:2011-12): All India

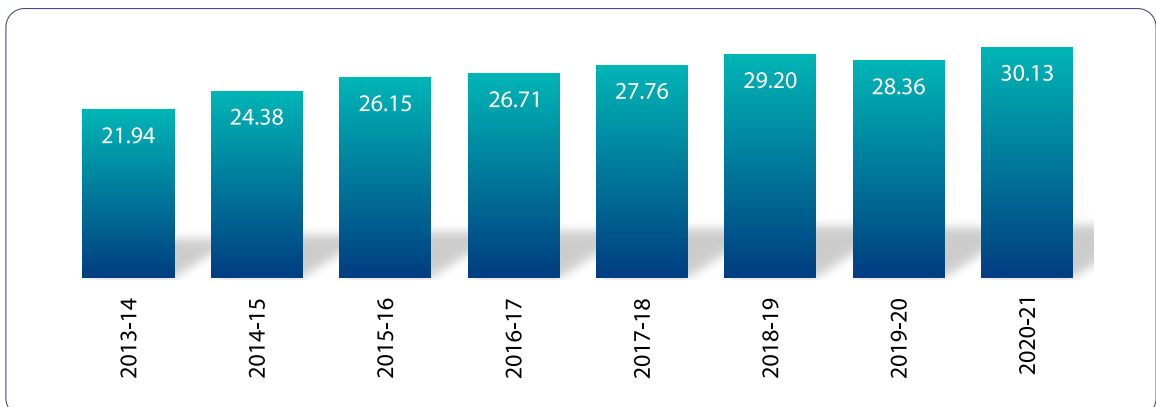


Fig 12 : Trend of Percentage Contribution of GVA due to Forestry and Logging Sector over the total GVA of Agriculture sector (Constant price:2011-12): All India

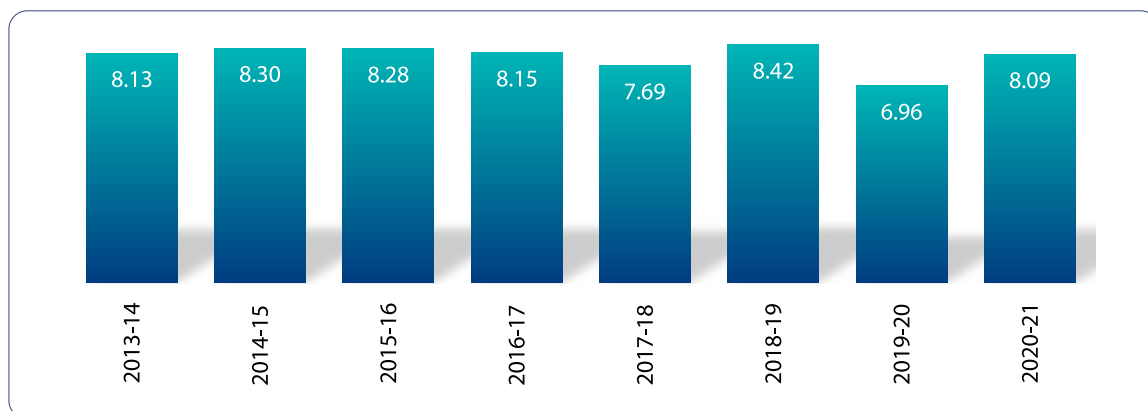
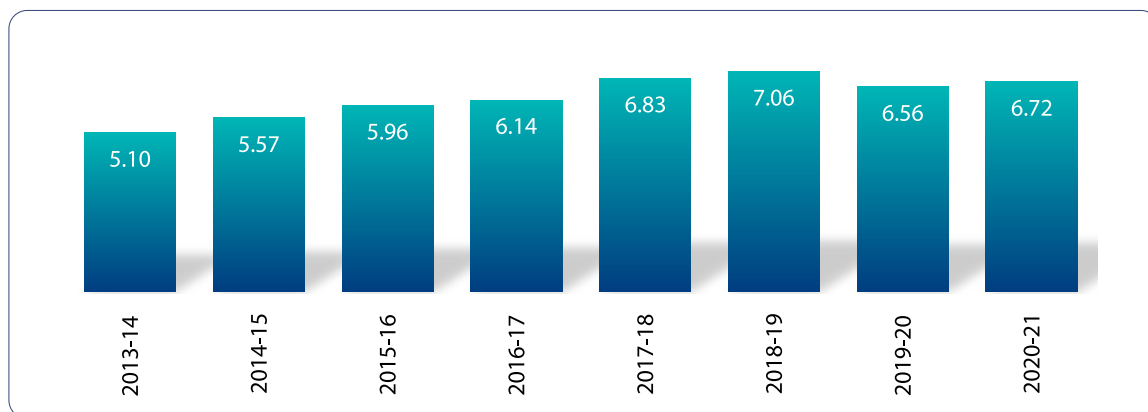


Fig 13 : Trend of Percentage Contribution of GVA due to Fisheries Sector over the total GVA of Agriculture sector (Constant price:2011-12): All India



Percentage Growth of Economy of Agriculture and Allied sector

Fig 14 : Trend of Percentage Growth of GVA of Agriculture (Current Basic Prices): All India

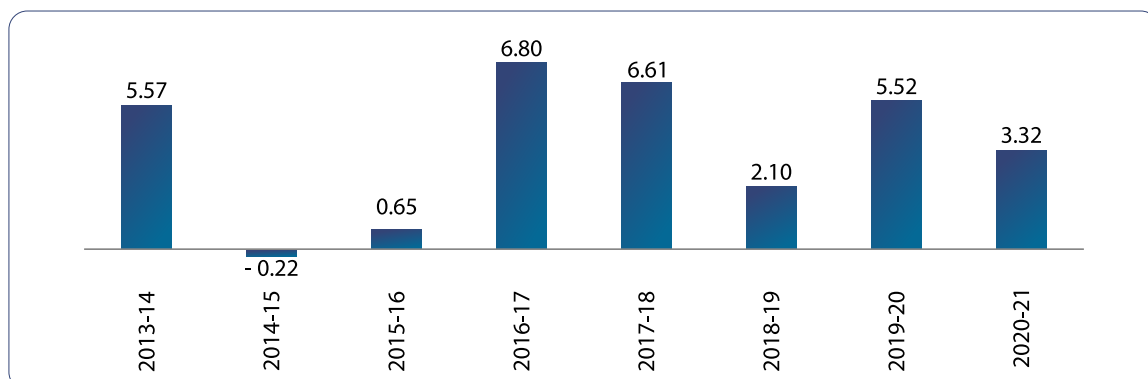


Fig 15 : Trend of Percentage Growth of GVA of Crops (Current Basic Prices): All India

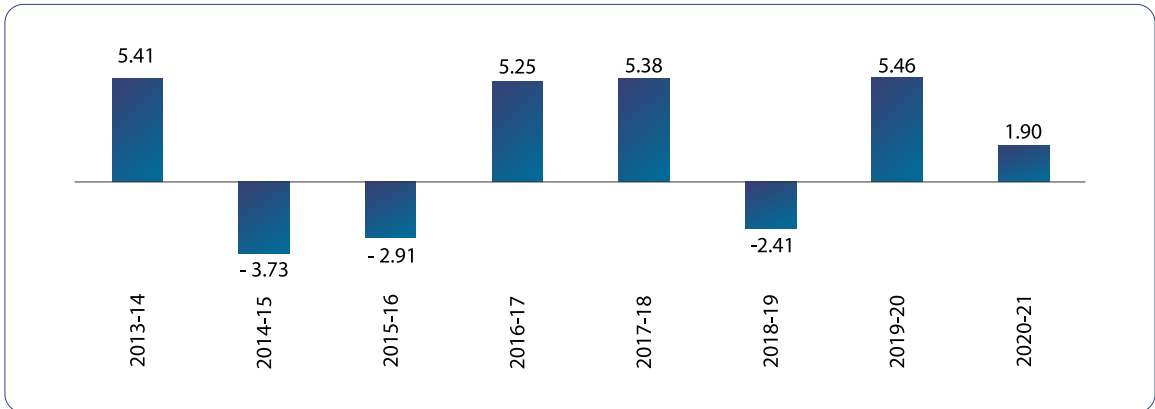


Fig 16 : Trend of Percentage Growth of GVA of Livestock (Current Basic Prices): All India

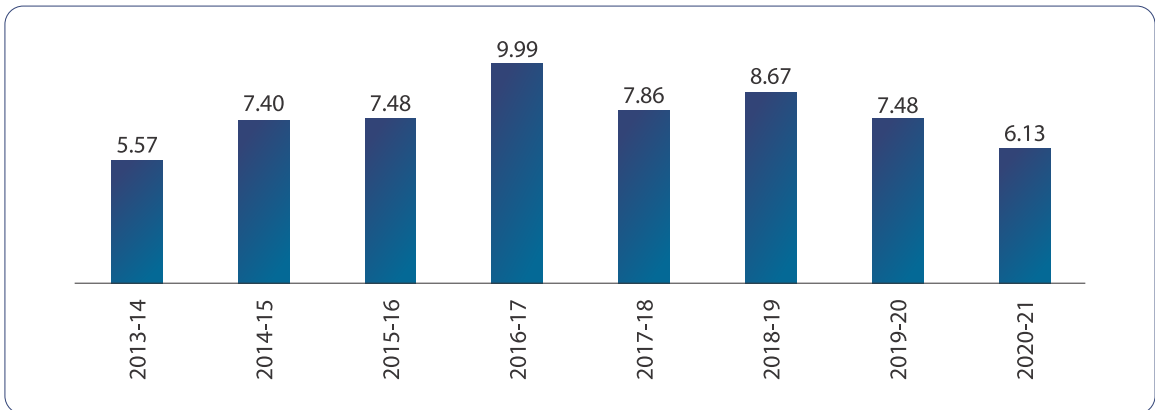


Fig 17: Trend of Percentage Growth of GVA of Forestry and Logging (Current Price): All India

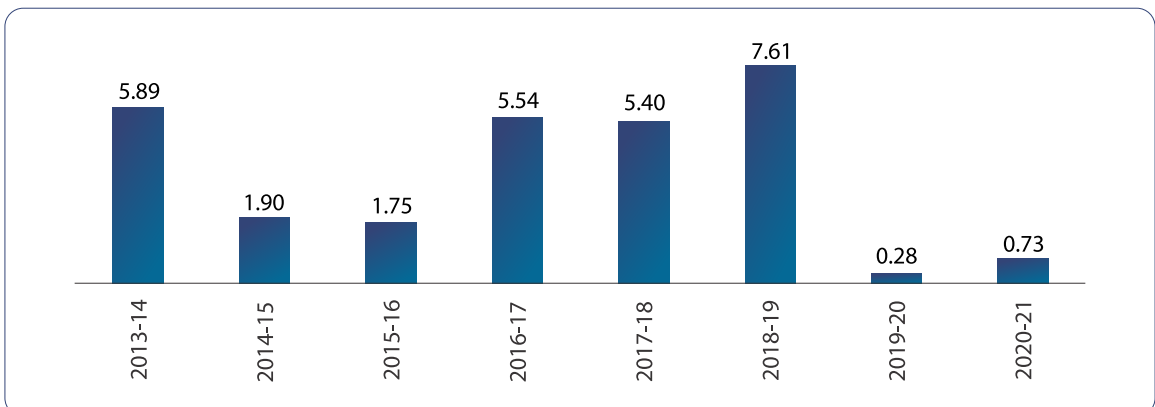


Fig 18 : Trend of Percentage Growth of GVA of Fisheries (Current Basic Prices): All India

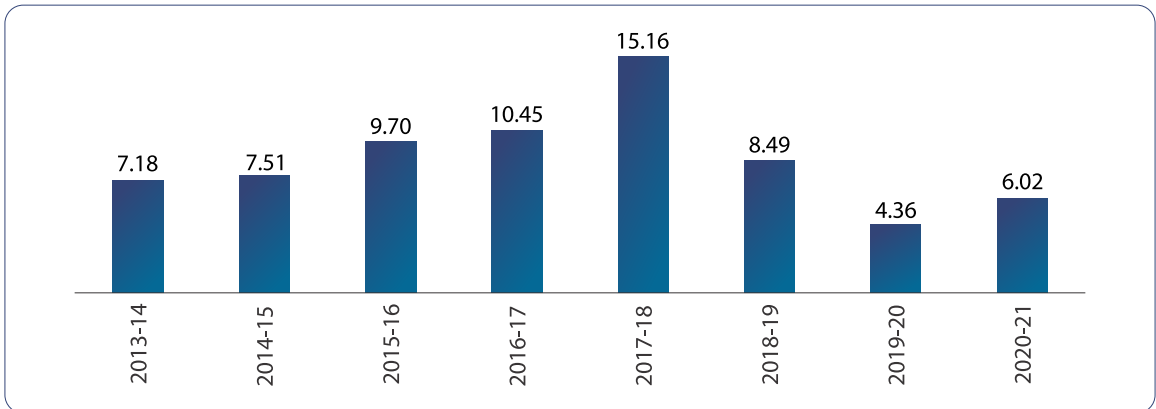


Fig 19: Trend of Percentage Growth of GVA of Agriculture (Constant Prices : 2011-12): All India

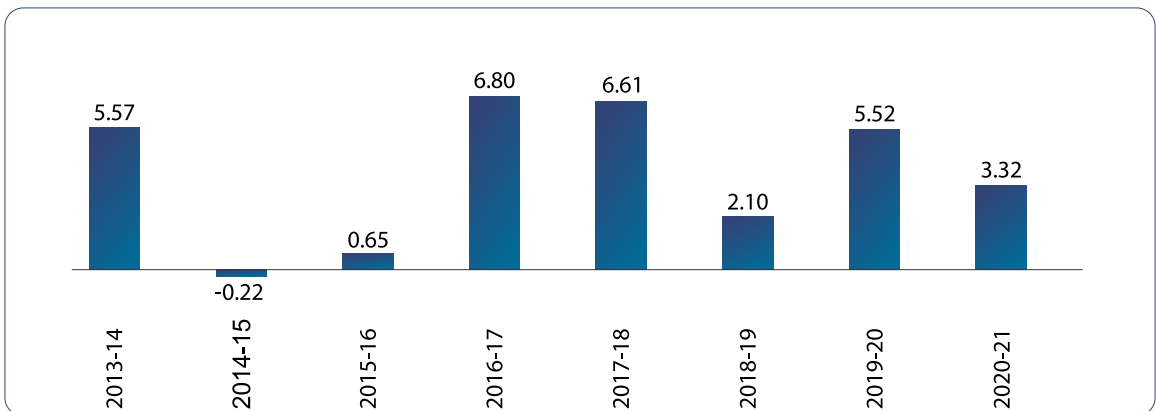


Fig 20 : Trend of Percentage Growth of GVA of Crops (Constant Prices : 2011-12): All India

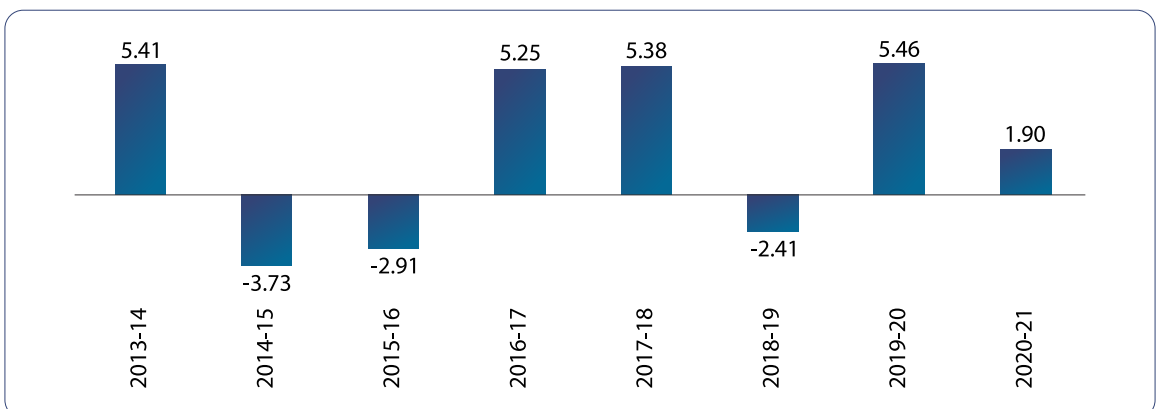


Fig 21: Trend of Percentage Growth of GVA of Livestock (Constant Prices : 2011-12): All India

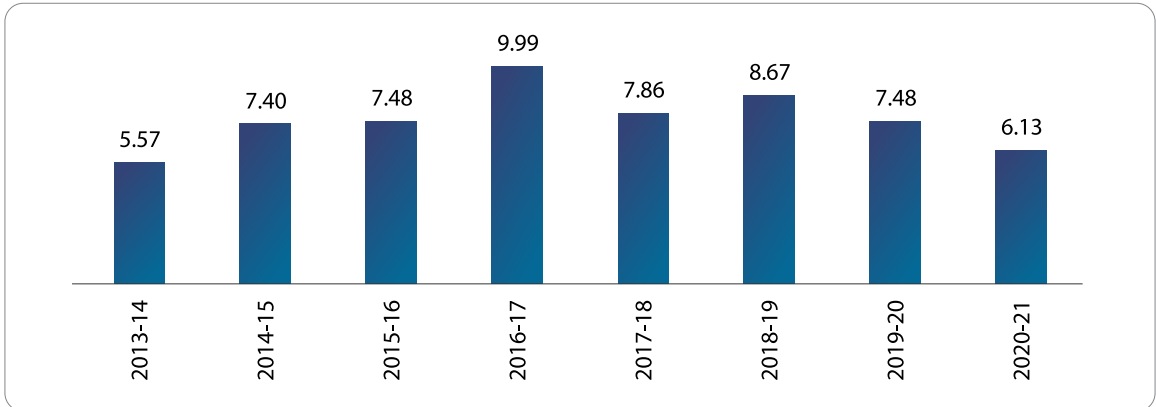


Fig 22 : Trend of Percentage Growth of GVA of Forestry and Logging (Constant Prices : 2011-12): All India

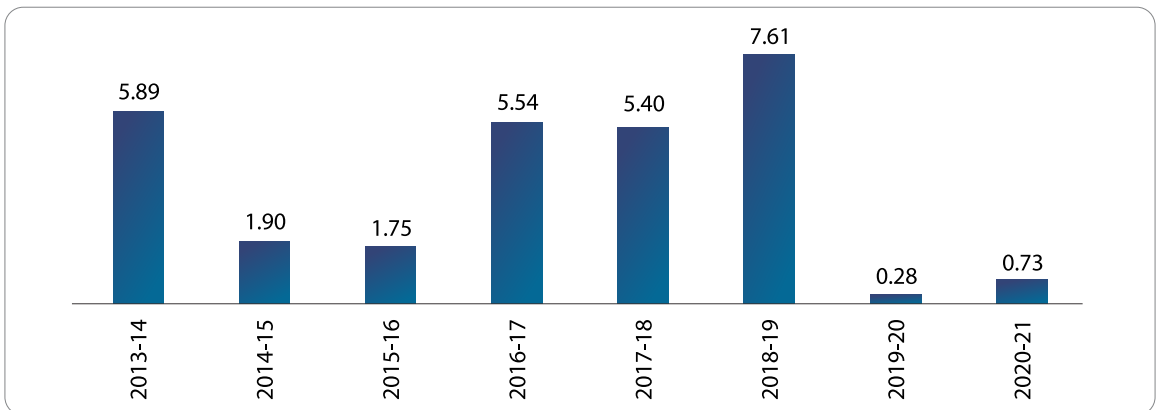
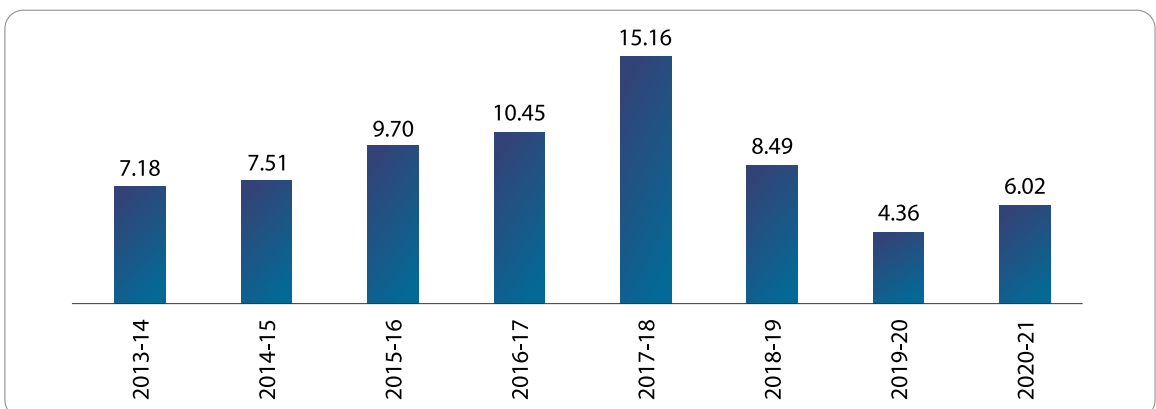


Fig 23 : Trend of Percentage Growth of GVA of Fisheries (Constant Prices : 2011-12): All India



CHAPTER 5

FISHERIES EXPORT



Fig. 24: Trend of Export of Fish and Fish Products in US\$(Million)

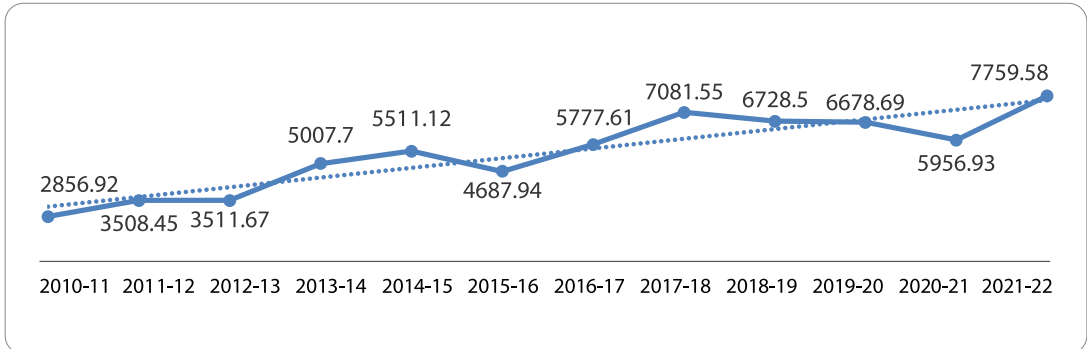


Fig.25: Trend of Export of Fish and Fish Products in Quantity (Tonnes)

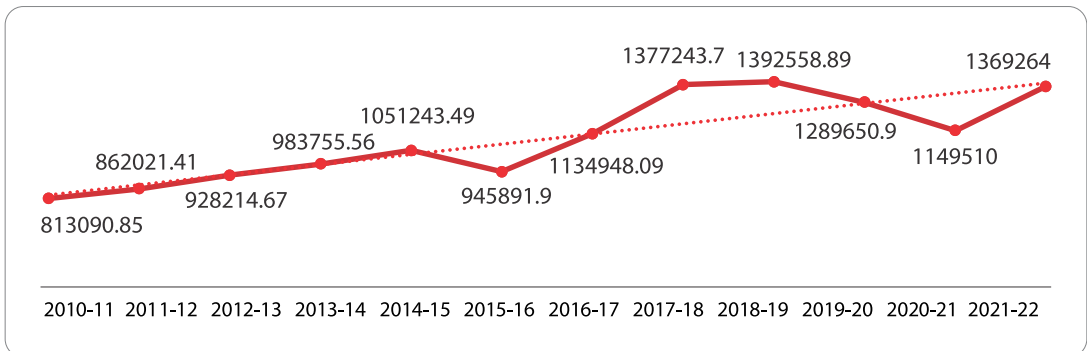


Fig.26: Trend of Export of Fish and Fish Products in Value (Rs. Crore)

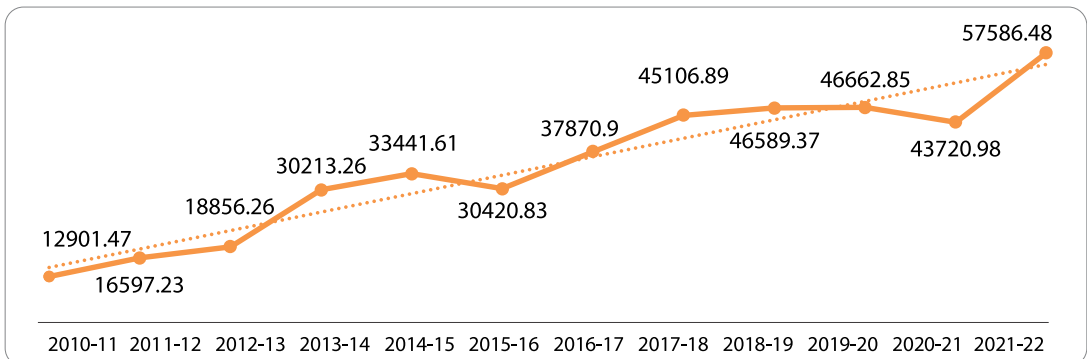


Table.5.1: Trend of Export of Fish and Fish Products (2010-11 to 2021-22)

Year	Quantity (Tonnes)	Value (in ₹ Crore)	US Dollar (Million)	Unit value (Rs. /Tonnes)	Unit value Index*	Annual growth rate (%)	
						Quantity	Value
2010-11	813091	12901.47	2856.92	158671.89	12	19.85	28.39
2011-12	862021	16597.23	3508.45	192538.46	11	6.02	28.65
2012-13	928215	18856.26	3511.67	203145.42	10	7.68	13.61
2013-14	983756	30213.26	5007.70	307121.60	9	5.98	60.23
2014-15	1051243	33441.61	5511.12	318114.75	8	6.86	10.69
2015-16	945892	30420.83	4687.94	321609.99	7	-10.02	-9.03
2016-17	1134948	37870.90	5777.61	333679.62	6	19.99	24.49
2017-18	1377244	45106.89	7081.55	327515.69	5	21.35	19.11
2018-19	1392559	46589.37	6728.50	334559.46	4	1.11	3.29
2019-20	1289651	46662.85	6678.69	361825.42	3	-7.39	0.16
2020-21	1149510	43720.98	5956.93	380344.49	2	-10.87	-6.30
2021-22	1369264	57586.48	7759.58	420570.00	1	19.12	31.71

Source: Marine Products Export Development Authority(MPEDA), Kochi

* Descending order of unit value

Export of Fisheries Products: Items Wise (in Rs. Crore)

Fig 27: Item-wise Export of Value 2020-21

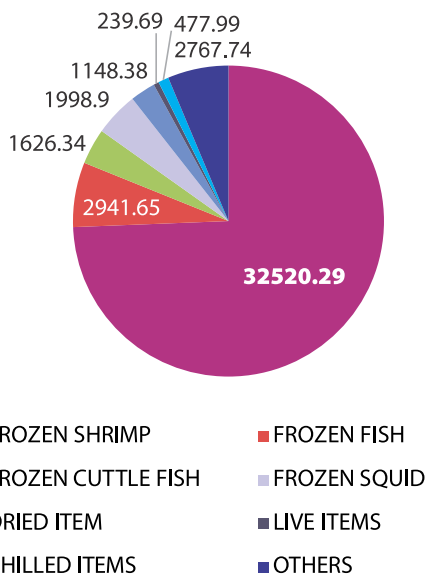


Fig 27: Item-wise Export of Value 2021-22

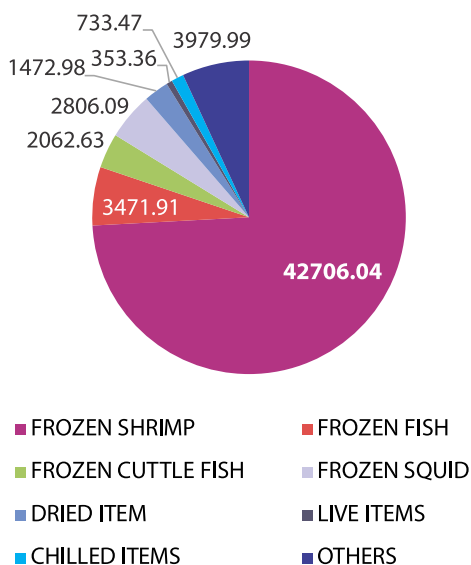


Fig. 28: Item-wise Export of Quantity 2020-21 (in US\$ Million)

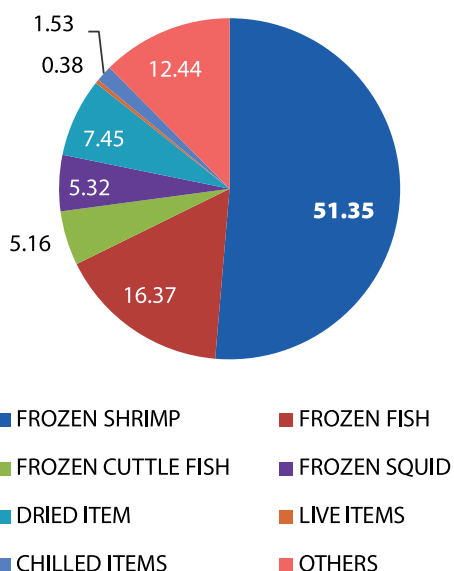


Fig. 28: Item-wise Export of Quantity 2021-22 (in US\$ Million)

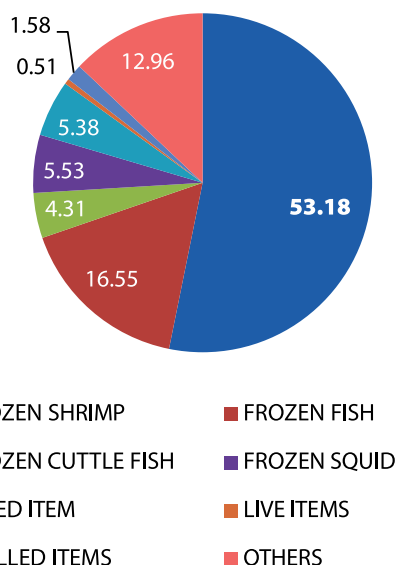


Table 5.2: Item Wise Export of Marine Products (2011-12 To 2021-22)

Item		2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22
Frozen Shrimp	Q:	1,89,125	2,28,620	3,01,435	3,57,505	3,73,866	4,34,486	5,65,980	6,14,145	6,52,253	5,90,275	728123
	V:	8,175.26	9,706.36	19,368.30	22,468.12	20,045.50	24,711.32	30,868.17	31,800.51	34,152.03	32,520.29	42706.04
	§:	1,741.20	1,803.26	3,210.94	3,709.76	3,096.68	3,726.38	4,848.19	4,610.59	4,889.12	4,426.19	5828.59
Frozen Fish	Q:	3,47,118	3,43,876	3,24,359	3,09,434	2,28,749	2,96,762	3,53,192	3,38,933	2,23,318	1,88,130	226586
	V:	3,284.15	3,296.86	4,294.81	3,778.50	3,462.25	4,460.90	4,674.03	4,916.82	3,610.01	2,941.65	3471.91
	§:	683.5	617.59	708.63	619.66	529.85	672.47	733.17	699.09	513.6	402.31	471.45
Fr Cuttle fish	Q:	54,671	63,296	68,577	82,353	65,596	63,320	69,183	60,210	70,906	5,92,92	58992
	V:	1,346.72	1,354.28	1,386.98	1,833.21	1,636.11	1,944.50	2,356.46	1,975.97	2,009.79	1,626.34	2062.63
	§:	282.72	251.54	228.13	300.69	250.31	292.73	369.88	282.29	286.4	221.97	280.08
Fr Squid	Q:	77,373	75,387	87,437	69,569	81,769	99,348	1,00,845	1,01,101	87,631	61,176	75750
	V:	1,228.19	1,378.08	1,731.97	1,275.25	1,615.21	2,575.29	2,451.87	2,506.99	2,196.59	1,998.90	2806.09
	§:	262.72	256.9	284.6	209.84	247.53	388.64	385.01	359.71	314.23	273.37	383.37
Dried Item	Q:	53,721	72,953	67,901	70,544	43,320	61,071	88,997	95,296	84,417	85,661	73679
	V:	562.65	819.9	998	1,010.16	725.58	871.74	1,042.37	1,323.45	981.5	1,148.38	1472.98
	§:	117.66	152.81	167.89	165.52	111.57	199.77	163.53	189.58	140.81	156.94	143.46
Live Items	Q:	4,199	4,373	5,080	5,488	5,493	6,703	7,034	10,179	7,287	4,379	7032
	V:	154.61	197.89	281.85	301.51	308.81	403.75	286.11	388.88	324.26	239.69	353.36
	§:	32.46	36.82	46.7	49.62	47.77	61.05	45.41	55.89	46.43	32.72	47.98
Chilled Items	Q:	21,278	26,868	19,755	31,404	33,150	31,815	19,501	17,207	21,202	17,622	21689
	V:	357.42	537.11	527.84	635.93	809.5	769.81	647.41	616.22	631.84	477.99	733.47
	§:	74.03	99.87	88.48	104.71	124.51	116.02	101.78	89.2	90.34	65.14	63.92
Others	Q:	1,14,538	1,12,841	1,09,212	1,24,947	1,13,949	1,41,442	1,72,512	1,55,487	1,42,638	1,42,806	177414
	V:	1,488.24	1,565.78	1,623.50	2,138.94	1,817.87	2,133.59	2,780.48	3,060.53	2,756.84	2,764.02	3979.99
	§:	314.16	292.86	272.34	351.31	279.71	320.54	434.58	442.16	397.77	377.78	540.73
Total	Q:	8,62,021	9,28,215	9,83,756	10,51,243	9,45,892	11,34,948	13,77,244	13,92,559	12,89,651	11,49,341	1369264
	V:	16,597.23	18,856.26	30,213.26	33,441.61	30,420.83	37,870.90	45,106.89	46,589.37	46,662.85	43,717.26	57586.48
	§:	3,508.45	3,511.67	5,007.70	5,511.12	4,687.94	5,777.61	7,081.55	6,728.50	6,678.69	5,956.42	7759.58

Source: Marine Products Export Development Authority, Kochi

Fr: Frozen

Q: Quantity in MT (Metric tonnes)

V: Value in Rs. Crore

§: US Dollar Million

Markets for Fisheries Products:

Fig. 29: Market-wise Percentage share of Export in Quantity (in MT)

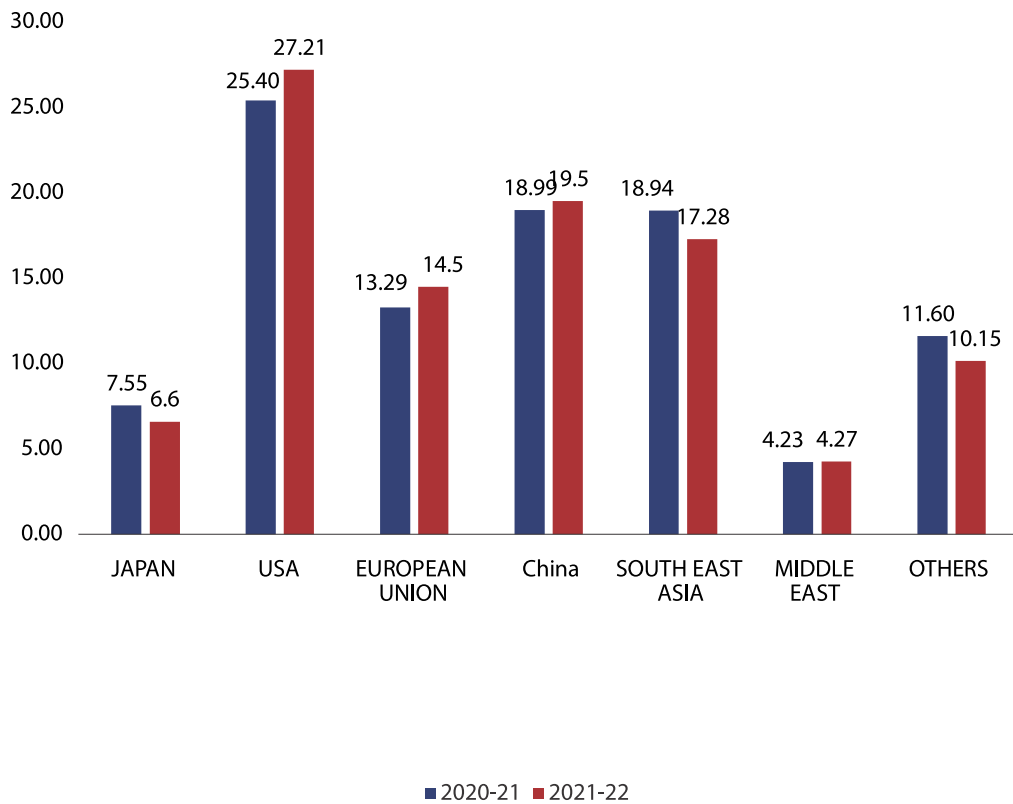


Table 5.3: Market wise Export of Marine Products (2011-12 To 2021-22)

Markets		2011-12	2012-13	2013-14	2014-15	2015-16	
		Q/V %	Q/V %	Q/V %	Q/V %	Q/V %	
JAPAN	Q:	9.95	8.26	7.27	7.49	7.97	
	V:	12.9	10.6	8.15	9.09	8.58	
USA	Q:	7.93	9.96	11.27	12.33	16.25	
	V:	17.94	21.35	25.63	26.4	28.38	
EUROPEAN UNION	Q:	17.89	17.06	17.76	17.89	19.7	
	V:	22.96	22.15	20.29	20.08	20.75	
CHINA	Q:	9.8	9.46	7.7	5.66	5.29	
	V:	7.59	7.66	5.85	4.03	4.71	
SOUTH EAST ASIA	Q:	39.9	36.73	38.63	38.99	34.77	
	V:	25.26	23.11	26.63	25.78	24.65	
MIDDLE EAST	Q:	4.43	4.46	5.9	6.15	5.7	
	V:	5.39	5.9	5.29	6.04	5.9	
OTHERS	Q:	10.09	14.07	11.47	11.48	10.32	
	V:	7.96	9.22	8.15	8.57	7.04	
Markets		2016-17	2017-18	2018-19	2019-20	2020-21	2021-22
		Q/V %	Q/V %	Q/V %	Q/V %	Q/V %	Q/V %
JAPAN	Q:	6.08	6.22	6.04	6.09	7.55	6.6
	V:	6.92	6.31	6.27	6.26	6.94	5.63
USA	Q:	16.62	17.99	20.24	23.66	25.4	27.21
	V:	30.32	32.74	34.81	38.37	41.15	42.72
EUROPEAN UNION	Q:	16.73	13.82	11.89	12.85	13.29	14.5
	V:	18.2	15.78	13.43	13.15	13.78	14.88
CHINA	Q:	4	3.61	16.19	25.55	19	19.5
	V:	3.54	3.21	12.18	20.61	15.8	15.73
SOUTH EAST ASIA	Q:	42.72	44.78	32.1	17.32	18.94	17.28
	V:	30.27	31.59	22.67	10.56	11.15	9.98
MIDDLE EAST	Q:	4.67	4.52	4.33	4.45	4.23	4.27
	V:	4.83	4.1	4.25	4.46	4.22	3.88
OTHERS	Q:	9.18	9.07	9.21	10.07	11.59	10.15
	V:	5.92	6.27	6.4	6.59	6.96	7.17

Source: Marine Products Export Development Authority, Kochi

Q: Quantity in MT (Metric tonnes)

V: Value in Rs. Crore

Table 5.4 (A): Port-wise Export of Marine Products (2019-20 to 2020-21)

S.N	Ports		2019-20	Percentage Share of 2019-20	2020-21	Percentage Share of 2020-21	Growth(%)
1	VIZAG	Q:	241783	18.75	216457	18.83	-1.05
		V:	13139.73	28.16	12362.71	28.28	-0.59
		₹:	1880.49	28.16	1681.2	28.22	-1.06
2	KOLKATA	Q:	128150	9.94	116419	10.13	-0.92
		V:	5308.02	11.38	5112.77	11.7	-0.37
		₹:	760.9	11.39	695.84	11.68	-0.86
3	KRISHNAPATNAM	Q:	97708	7.58	64230	5.59	-3.43
		V:	5134.31	11	3762.21	8.61	-2.67
		₹:	735.44	11.01	511.79	8.59	-3.04
4	KOCHI	Q:	146038	11.32	143552	12.49	-0.17
		V:	4904.49	10.51	4994.75	11.43	0.18
		₹:	700.26	10.49	681.04	11.43	-0.27
5	PIPAVAV	Q:	257402	19.96	185817	16.17	-2.78
		V:	4556.19	9.76	3330.9	7.62	-2.69
		₹:	650.01	9.73	454.46	7.63	-3.01
6	J N P	Q:	134766	10.45	104435	9.09	-2.25
		V:	4359.71	9.34	3569.81	8.17	-1.81
		₹:	623.4	9.33	487.18	8.18	-2.19
7	TUTICORINQ:	57159	4.43	47299	4.12	-1.73	
		V:	2942.64	6.31	2414.66	5.52	-1.79
		₹:	421.04	6.3	328.74	5.52	-2.19
8	CHENNAI Q:	51539	4	68973	6	3.38	
		V:	2045.57	4.38	3147.48	7.2	5.39
		₹:	292.97	4.39	430.21	7.22	4.68
9	MANGALORE/ICD	Q:	95757	7.42	105278	9.16	0.99
		V:	1358.89	2.91	1539.45	3.52	1.33
		₹:	197.74	2.96	210.64	3.54	0.65
10	KATTUPALLI/ENNORE	Q:	26174	2.03	31421	2.73	2.00
		V:	1220.5	2.62	1533.49	3.51	2.56
		₹:	174.77	2.62	208.91	3.51	1.95

Table 5.4 (B): Port-wise Export of Marine Products (2019-20 to 2020-21)

S.N	Ports		2019-20	Percentage Share of 2019-20	2020-21	Percentage Share of 2020-21	Growth(%)
11	KAKINADA	Q:	8927	0.69	8968	0.78	0.05
		V:	533.37	1.14	558.19	1.28	0.47
		₹:	75.94	1.14	75.65	1.27	-0.04
12	MUNDRA	Q:	19431	1.51	39243	3.41	10.20
		V:	303.15	0.65	773.57	1.77	15.52
		₹:	43.36	0.65	106.34	1.79	14.52
13	GOA	Q:	14699	1.14	8241	0.72	-4.39
		V:	288.5	0.62	160.17	0.37	-4.45
		₹:	41.31	0.62	21.92	0.37	-4.69
14	MUMBAI	Q:	1464	0.11	759	0.07	-4.82
		V:	176.54	0.38	172.11	0.39	-0.25
		₹:	25.22	0.38	23.55	0.4	-0.66
15	HAZIRA	Q:	2687	0.21	2214	0.19	-1.76
		V:	145.13	0.31	116.5	0.27	-1.97
		₹:	20.74	0.31	15.88	0.27	-2.34
16	TRIVANDRUM	Q:	2168	0.17	1119	0.1	-4.84
		V:	115.5	0.25	44.04	0.1	-6.19
		₹:	16.5	0.25	6.03	0.1	-6.35
17	HALDIA	Q:	1025	0.08	56	0	-9.45
		V:	56.89	0.12	0.24	0	-9.96
		₹:	8.06	0.12	0.03	0	-9.96
18	HYDERABAD	Q:	1424	0.11	1204	0.1	-1.54
		V:	38.35	0.08	50.7	0.12	3.22
		₹:	5.5	0.08	6.93	0.12	2.60
19	AHMEDABAD	Q:	187	0.01	24	0	-8.72
		V:	13.74	0.03	16.59	0.04	2.07
		₹:	1.95	0.03	2.26	0.04	1.59
20	BANGALORE	Q:	184	0.01	175	0.02	-0.49
		V:	8.24	0.02	7.12	0.02	-1.36
		₹:	1.18	0.02	0.96	0.02	-1.86

Table 5.4 (C): Port-wise Export of Marine Products (2019-20 to 2020-21)

S.N	Ports		2019-20	Percentage Share of 2019-20	2020-21	Percentage Share of 2020-21	Growth(%)
21	GHOGADANGA	Q:	197	0.02	195	0.02	-0.10
		V:	3.99	0.01	4	0.01	0.03
		\$:	0.57	0.01	0.56	0.01	-0.18
22	MAHADIPUR	Q:	315	0.02	1572	0.14	39.90
		V:	3.76	0.01	18.1	0.04	38.14
		\$:	0.55	0.01	2.5	0.04	35.45
23	MADURAI	Q:	44	0	14	0	-6.82
		V:	1.76	0	0.51	0	-7.10
		\$:	0.25	0	0.07	0	-7.20
24	PORT BLAIR	Q:	15	0	0	0	-10.00
		V:	1.1	0	0	0	-10.00
		\$:	0.16	0	0	0	-10.00
25	HILL LAND CUSTOMS	Q:	329	0.03	716	0.06	11.76
		V:	0.94	0	4.37	0.01	36.49
		\$:	0.14	0	0.59	0.01	32.14
26	VERAVAL	Q:	18	0	605	0.05	326.11
		V:	0.69	0	12.17	0.03	166.38
		\$:	0.1	0	1.67	0.03	157.00
27	SURUT (INHZA)	Q:	26	0	0	0	-10.00
		V:	0.58	0	0	0	-10.00
		\$:	0.08	0	0	0	-10.00
28	CALICUT	Q:	21	0	29	0	3.81
		V:	0.35	0	1.1	0	21.43
		\$:	0.05	0	0.15	0	20.00
29	DELHI	Q:	14	0	0	0	-10.00
		V:	0.16	0	0	0	-10.00
		\$:	0.02	0	0	0	-10.00
30	TRICHY	Q:	2	0	90	0.01	440.00
		V:	0.05	0	3.64	0.01	718.00
		\$:	0.01	0	0.5	0.01	490.00

Table 5.4 (D): Port-wise Export of Marine Products (2019-20 to 2020-21)

S.N	Ports		2019-20	Percentage Share of 2019-20	2020-21	Percentage Share of 2020-21	Growth(%)
31	KANDLA	Q:	0	0	0	0	0.00
		V:	0	0	0	0	0.00
		\$.:	0	0	0	0	0.00
34	PORBANDAR	Q:	0	0	169	0.01	0.00
		V:	0	0	4.48	0.01	0.00
		\$.:	0	0	0.61	0.01	0.00
35	PARADEEP	Q:	0	0	17	0	0.00
		V:	0	0	0.77	0	0.00
		\$.:	0	0	0.11	0	0.00
36	KARWAR	Q:	0	0	0	0	0.00
		V:	0	0	0	0	0.00
		\$.:	0	0	0	0	0.00
32	AGARTALA	Q:	0	0	50	0	0.00
		V:	0	0	0.65	0	0.00
		\$.:	0	0	0.09	0	0.00
33	BHUBANESWAR AIRPORT	Q:	0	0	0	0	0.00
		V:	0	0	0	0	0.00
		\$.:	0	0	0	0	0.00
37	NSICT	Q:	0	0	0	0	0.00
		V:	0	0	0	0	0.00
		\$.:	0	0	0	0	0.00
38	KARIMGANJ	Q:	0	0	0	0	0.00
		V:	0	0	0	0	0.00
		\$.:	0	0	0	0	0.00
39	MID SEA	Q:	0	0	0	0	0.00
		V:	0	0	0	0	0.00
		\$.:	0	0	0	0	0.00
40	OKHA	Q:	0	0	0	0	0.00
		V:	0	0	0	0	0.00
		\$.:	0	0	0	0	0.00
TOTAL		Q:	1289651	100	1149341	100	-1.09
		V:	46662.85	100	43717.26	100	-0.63
		\$.:	6678.69	100	5956.42	100	-1.08

Source: Marine Products Export Development Authority, Kochi

Q: Quantity in MT (Metric tonnes)

V: Value in Rs. Crore

\$.: US Dollar Million

The top 5 ports which handled marine products cargo in 2021-22 were Vizag, Kolkata, Kochi, Chennai and JNPT contributed 69.65% share in US\$ terms. The details are shown in table below:

Port Wise Export Details : 2021-22					
S.N.	Port	Q: Quantity in M T (Metric tonnes)	V: Value in Rs. Crore	\$: US Dollar Million	% Share US\$
1	Vizag	247755	15648.62	2125.55	27.39
2	Kolkata	121339	6168.78	854.37	11.01
3	Kochi	175332	6167.69	849.57	10.95
4	CHENNAI	112356	5947.20	807.86	10.41
5	JNPT	182046	5643.81	767.50	9.89
6	Others	530437	18010.39	2354.73	30.35
	Total	1369264	57586.48	7759.58	100

Table 5.5: Value (Rs. in Lakhs) of Export of Marine Products (2010-11 To 2020-21)

S.N	Article Code	Article Distribution	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-2021
1	0301	Live fish	572.88	547.86	549.62	579.70	588.07	838.35	826.88	895.36	998.61	1518.01	1349.29
2	0302	Fish Fresh or chilled including Hilsa	23825.84	30369.68	37618.34	38798.19	38916.52	47003.07	47547.00	36445.38	40480.24	34350.12	25051.83
3	0303	Frozen Fish	257336.84	322157.34	323302.53	422572.08	371641.59	336297.28	438950.40	460719.89	478140.02	345269.23	282644.76
4	0304	Fish Fillets & Other Fish Meat	60607.83	79961.21	84816.27	80762.40	111037.86	103746.00	116687.94	152581.22	165738.37	158140.72	155796.23
5	0305	Fish dried salted	57562.88	33953.16	38156.78	52613.85	46817.74	41002.38	39665.47	41739.37	52009.31	38458.80	48316.54
6	0306	Shrimp, Lobsters, Prawns	576083.97	814370.47	964309.68	1891675.73	2196903.40	1981969.55	2409109.22	3081507.58	3027070.57	3216372.89	2947199.23
7	0307	Molluscas, Cuttle Fish, etc.	220190.77	275820.09	288233.18	326726.16	329302.81	345236.09	475132.10	522324.05	499414.23	466595.44	397528.43
		Sub-Total	1196181.01	1557179.81	1736986.41	2813728.11	3095207.99	2856092.72	3527919.01	4296212.86	4263851.35	4260705.21	3857886.31
8	1504	Fats & Oils & their Fractions	5958.74	9961.38	16069.11	15415.47	33295.09	11177.42	12891.81	18764.49	4840.06	2516.20	1160.88
9	1603	Extracts & Juices of Meat Fish Crustaceans Molluscas/other aquatic invertebrates	0	0	0	0	0	0	0	0	0	0	0
10	1604	Prepared or Preserved Fish; Caviar and Caviar substitute prepared from Fish Eggs	13401.67	15212.33	16826.91	23003.53	21064.32	24423.27	28642.96	30227.93	43579.45	41002.93	45241.07
		Sub-Total	19360.41	25173.71	32896.02	38419.00	54359.42	35600.69	41534.77	48992.41	48419.51	43519.13	46401.95
11	1605	Crustaceans Molluscas & other Aquatic Invertebrates prepared or preserved	36638.13	52873.89	70669.67	119263.94	138216.46	116268.16	163640.14	100122.56	261104.57	301513.89	389837.43
		Total without 1605	1215541.42	1582353.52	1769882.43	2852147.11	3149567.41	2891693.42	3569453.78	4345205.27	4312270.85	4304224.34	3904288.26
		Total with 1605	1252179.55	1635227.41	1840552.10	2971411.06	3287783.87	3007961.57	3733093.92	4445327.83	4573375.42	4605738.23	4294125.69

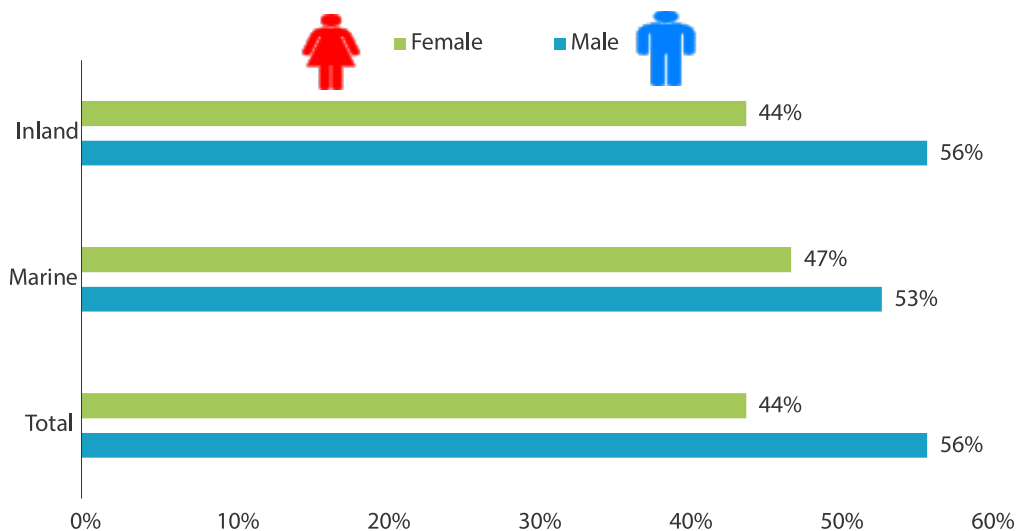
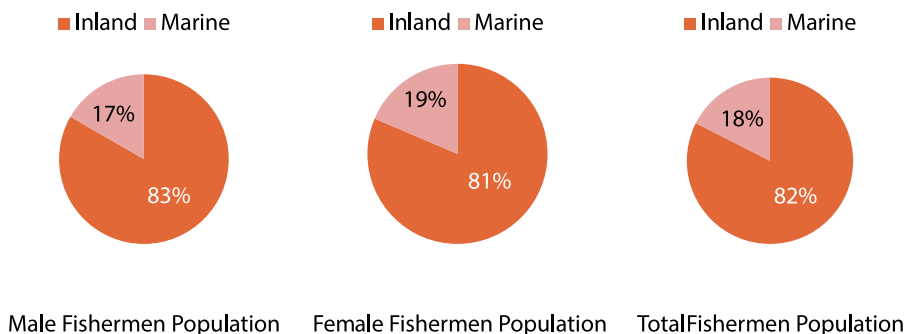
Source: Marine Products Export Development Authority, Kochi

CHAPTER 6

FISHERMEN POPULATION



Fig 30: TOTAL GENDER-WISE INLAND AND MARINE FISHERMEN POPULATION, 2020-21



	Male	Female	Total
Inland (2020-21)	1,30,13,978	1,01,03,842	2,31,17,820
Marine (2020-21)	26,51,652	22,94,066	49,45,718
All India (2020-21)	1,56,65,630	1,23,97,908	2,80,63,538

Table 6.1: Fishermen Population and their Percentage 2020-21

States/UT	Number of Districts	Fishermen Population	Total Population	Fishermen Population per District
Andhra Pradesh	13	14,96,688	5,39,03,393	1,15,129
Arunachal Pradesh	25	24,015	15,70,458	961
Assam	33	25,24,106	3,56,07,039	76,488
Bihar	38	60,27,375	12,47,99,926	1,58,615
Chhattisgarh	27	2,20,355	2,94,36,231	8,161
Goa	2	10,545	15,86,250	5,273
Gujarat	33	5,58,691	6,38,72,399	16,930
Haryana	22	1,18,455	2,82,04,692	5,384
Himachal Pradesh	12	11,806	74,51,955	984
Jharkhand	24	1,40,897	3,85,93,948	5,870
Karnataka	30	9,74,277	6,10,95,027	32,476
Kerala	14	10,44,361	3,56,99,443	74,597
Madhya Pradesh	52	22,32,822	8,53,58,964	42,939
Maharashtra	36	15,18,228	12,31,44,223	42,173
Manipur	16	47,711	30,91,545	2,982
Meghalaya	11	16,567	33,66,710	1,506
Mizoram	11	6,289	12,39,244	572
Nagaland	11	7,958	22,49,695	723
Odisha	30	15,17,574	4,63,56,334	50,586
Punjab	22	7,591	3,01,41,373	345
Rajasthan	33	57,260	8,10,32,689	1,735
Sikkim	4	581	6,90,251	145
Tamil Nadu	37	12,83,751	7,78,41,267	34,696
Telangana	33	8,62,221	3,93,62,732	26,128
Tripura	8	7,761	41,69,794	970
Uttarakhand	13	8,352	1,12,50,858	642
Uttar Pradesh	75	39,00,005	23,78,82,725	52,000
West Bengal	23	32,36,261	9,96,09,303	1,40,707
A and N Islands	3	25,941	4,17,036	8,647
Chandigarh	1	524	11,58,473	524
D & N Haveli, Daman and Diu	3	40,016	6,15,724	13,339
Delhi	11	3,346	1,87,10,922	304
Jammu & Kashmir	22	17,396	1,36,06,320	791
Ladakh	2	22	2,89,023	11
Lakshadweep	1	6,518	73,183	6,518
Puducherry	4	1,07,272	14,13,542	26,818
All India	735	2,80,63,538	1,36,48,92,691	9,56,669

Source: Department of Fisheries, State Government / UT Administration

Table 6.2: Gender-wise Fishermen Population at India Level, 2020-21

States/UT	Inland Fishermen Population		Marine Fishermen Population	
	Male	Female	Male	Female
Andhra Pradesh	333,558	288,293	461,712	413,125
Arunachal Pradesh	15,147	8,868	NA	NA
Assam	1,624,059	900,047	NA	NA
Bihar	3,127,733	2,899,642	NA	NA
Chhattisgarh	146,971	73,384	NA	NA
Goa	NA	NA	5,273	5,272
Gujarat	120,900	110,085	167,858	159,848
Haryana	117,934	521	NA	NA
Himachal Pradesh	10,739	1,067	NA	NA
Jharkhand	94,497	46,400	NA	NA
Karnataka	465,352	180,924	196,970	131,031
Kerala	122,377	117,819	431,447	372,718
Madhya Pradesh	1,232,957	999,865	NA	NA
Maharashtra	602,536	529,433	197,760	188,499
Manipur	3,278	44,433	NA	NA
Meghalaya	11,745	4,822	NA	NA
Mizoram	5,328	961	NA	NA
Nagaland	5,896	2,062	NA	NA
Odisha	549,806	371,613	314,069	282,086
Punjab	7,018	573	NA	NA
Rajasthan	31,880	25,380	NA	NA
Sikkim	488	93	NA	NA
Tamil Nadu	125,694	110,220	535,337	512,500
Telangana	483,094	379,127	NA	NA
Tripura	7,718	43	NA	NA
Uttarakhand	7,260	1,092	NA	NA
Uttar Pradesh	2,101,383	1,798,622	NA	NA
West Bengal	1,629,481	1,204,093	246,225	156,462
A and N Islands	2,807	946	12,024	10,164
Chandigarh	524	NA	NA	NA
D & Nagar Haveli and Daman & Diu	NA	NA	20,529	19,487
Delhi	3,316	30	NA	NA
Jammu & Kashmir	17,396	NA	NA	NA
Ladakh	22	NA	NA	NA
Lakshadweep	NA	NA	5,138	1,380
Puducherry	5,084	3,384	57,310	41,494
All India	13,013,978	10,103,842	26,51,652	22,94,066

Source: Department of Fisheries, State Government / UT Administration

NA: Not Available

Table 6.3: Number of Fishermen Population engaged in Marine Fisheries activities, 2020-21

States/UT	Full Time		Part Time		Occasional		Unspecified		Deep Sea	
	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female
A and N Islands	23,629	239	2043	610	NA	NA	NA	NA	NA	NA
Gujarat	71,777	36,840	19,348	12,362	0	0	0	0	0	0
Karnataka	57,440	43,460	56,155	40,059	6,033	3,721	57,710	45,102	21,602	0
Kerala	3,24,579	2,80,374	0	0	0	0	0	0	0	0
Maharashtra	89375	45495	32713	47527	6140	8196	5234	1127	23008	0
Tamil Nadu	2,00,268		65,389	2,01,084	41,748	10,633	37,087	49,015	19,500	
Daman and Diu	5,093	0	68	0	52	0	0	0	0	0
Lakshadweep	2620	481	2518	899	0	0	0	0	0	0
Puducherry	25,024	12,153	6,359	4,396	1000	800	2,581	10,257	25	0
All India	12,18,847		4,91,530		78,323		2,08,113		64,135	

Source: Department of Fisheries, State Govt. / UT Administration

NA: Not Available

Table 6.4: Number of Fishermen Population engaged in Inland Fisheries activities, 2020-21

States/UT	Full Time		Part Time		Occasional		Unspecified	
	Male	Female	Male	Female	Male	Female	Male	Female
Arunachal Pradesh	0	0	15,347	8,918	0	0	0	0
Assam	65,693	60,628	2,81,107	2,59,530	15,357	13,979	N.A.	N.A.
Bihar	39,067	17,734	66,404	22,890	49,380	22,164	19,84,507	18,85,950
Chhattisgarh	1,59,406	25,340	11,897	5,806	7,028	2,911	5,960	2,952
Gujarat	35,118	15,413	22,569	4,843	0	0	0	0
Haryana	2,349	2,348	2,790	2,789	900	900	2100	2100
Himachal Pradesh	5,574	0	6,301	0	0	0	0	0
Jharkhand	14,500	3,200	34,450	12,800	35,700	16,200	21,400	18,700
Karnataka	1,08,656	38,462	2,02,460	83,229	1,43,090	59,665	15,800	1,378
Kerala	93,699	90,141	0	0	0	0	0	0
Madhya Pradesh	72,641	5,333	80,325	18,807	0	0	0	0
Maharashtra	1,58,108	44,595	64,610	24,331	28,952	7,487	19,537	2,093
Manipur	2,241	742	4,184	2,175	412	715	615	1,553
Meghalaya	1,925	710	3,775	2,638	5,480	1,461	401	57
Mizoram	1,358	251	2,358	458	1,012	100	600	152
Nagaland	176	79	197	340	2122	651	2122	915
Odisha	1,65,270	58,994	1,40,217	57,040	1,24,373	3,441	1,39,457	1,11,183
Rajasthan	6,265	0	14,128	N.A.	920	N.A.	N.A.	N.A.
Sikkim	2500	127	N.A.	N.A.	N.A.	N.A.	N.A.	N.A.
Tamil Nadu	0	0	62,825	7,883	3,752	5,251	7,109	22,084
Telangana	2,90,327	110,945	1,83,272	82,106	1,85,497	75,063	40,918	32,818
Tripura	3,727	524	4,289	604	592	83	N.A.	N.A.
Uttarakhand	1,898	442	5,738	1,226	1,171	82	398	69
Uttar Pradesh	1,02,316	18,055	38,000	N.A.	N.A.	N.A.	N.A.	N.A.
Chandigarh	5	5	0	N.A.	N.A.	N.A.	N.A.	N.A.
Daman and Diu	405	391	292	672	142	278	N.A.	N.A.
Delhi	277	N.A.	489	N.A.	115	N.A.	N.A.	N.A.
Jammu & Kashmir	16,286	N.A.	880	N.A.	N.A.	N.A.	230	N.A.
Puducherry	1,530	510	510	204	250	100	100	50
All India	13,51,316	4,94,969	12,49,414	5,99,289	6,06,245	2,10,531	22,41,254	20,82,054

Source: Department of Fisheries, State Govt. / UT Administration

NA: Not Available

CHAPTER 7

FISHERIES RESOURCES

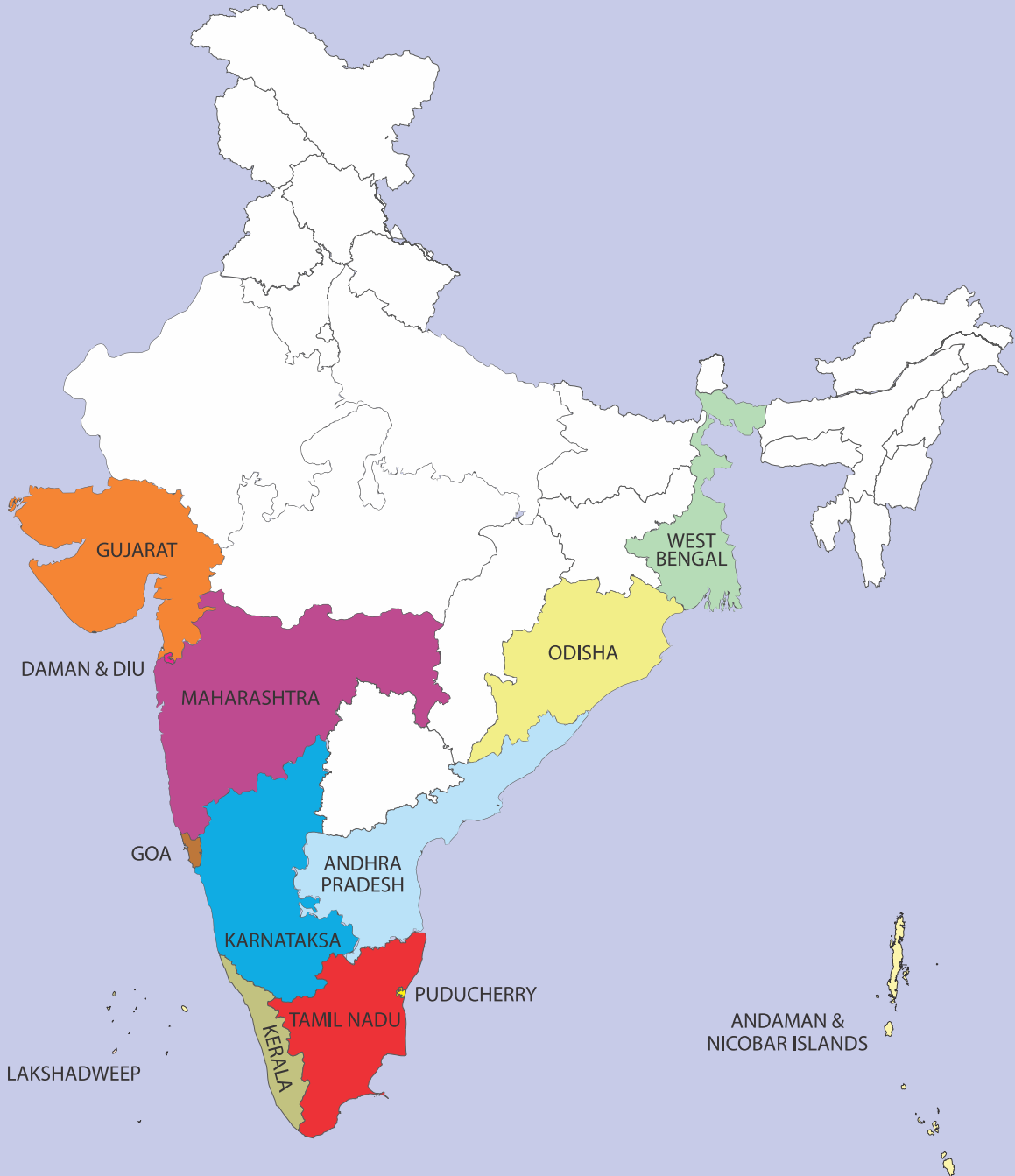


Fig 31: Marine Fisheries Resources - Coastal States and Union Territories of India : 2020-21

	Coastal length (1 km)	Landing centres	Coastal length 1 km)
Andaman & Nicobar	1912	51	169
Andhra Pradesh	974	350	555
Dadra & Nagar Haveli and Daman and Diu	27	8	12
Goa	104	32	60
Gujarat	1600	107	260
Karnataka	300	115	162
Kerala	590	174	220
Lakshadweep	132	20	10
Maharashtra	720	173	456
Orissa	480	55	739
Pondicherry	45	22	39
Tamil Nadu	1076	301	608
West Bengal	158	49	171
Total	8,118	1457	3,461

Note: The data given in table as per the State/UT Government

Table 7.1 (A): Inland Fisheries resources by States and Union Territories of India: 2020-21

States	Rivers & Canals (Km)	Small reservoirs		Medium & Large reservoir		Tanks and Ponds (Ha)	Brackish Water (Ha)	Beels/ Oxbow Lakes/ Derelict Water (Ha)	Any other than rivers and canals(Ha)
		Number	Area(ha)	Number	Area(ha)				
Andhra Pradesh	11514	90	34,693	26	1,30,898	3,37,438	54,995	130000	0
Arunachal Pradesh	11157	4	226	0	0	2,297	0	3,277	5,950
Assam	10607.29	0	0	2	1,863	85,068	0	0	404516.98
Bihar	21300	0	0	37	26,304	93,218	0	9,50,000	0
Chhattisgarh	3570	1,757	43,565.00	13	39,035.00	1,09,400.00	0	0	0
Goa	0	4	484	1	2,964	101	111.16	0	0
Gujarat	3865	1,547	92,675	88	2,55,201	22,000	1,87,000	0	0
Haryana*	7197	0	0	0	0	1,72,44	0	0	0
Himachal Pradesh*	3000	0	0	5	43,785	851.01	0	0	0
Jharkhand	1800	412	28,789.60	23	1,04,363	79,010	0	0	19,936
Karnataka	9000	33	7,195	49	2,65,063	2,91,627	8000	0	0
Kerala	3220	37	12,039	10	21,707	27,625	65,213	0	60926
Madhya Pradesh	17088	3,346	1,27,786	27	2,30,703	78,256	0	0	0
Maharashtra	26065.42	2,415	1,31,367	81	1,28,535	82,018	2,793	0	0
Manipur	1647	5	960	1	1,182	1,747.80	0	29,161	0
Meghalaya*	4383.47	7	716.73	0	0	4,320.33	0	286.18	66.94
Mizoram	1750	3	10	2	8,000	5,506.04	0	10	0
Nagaland	1600	0	0	1	2,258	3,524.00	0	1,110	0

Table 7.1(B): Inland Fisheries resources by States and Union Territories of India: 2020-21

States	Rivers & Canals (Km)	Small reservoirs		Medium & Large reservoir		Tanks and Ponds (Ha)	Brackish Water (Ha)	Beels/ Oxbow Lakes/ Derelict Water (Ha)	Any other than rivers and canals(Ha)
		Number	Area(ha)	Number	Area(ha)				
Odisha*	24878.73	603	34,608	8	1,65,771	1,36,951	3,84,950	1,80,000	0
Punjab	1673.53	12	243.06	1	3100	16437	156.8	0	0
Rajasthan	30000	2388	1,45,823	48	2,54,475	30,266	50		
Sikkim	1600	3	850			1,579			
Tamil Nadu	7420	54	16,059	8	39,030	2,54,518	56,000	7,000	3,78,870.07
Telangana	2728.46	67	30,892	30	1,56,815	3,16,254	0	0	0
Tripura	1080			1	3049.34	29368.99		100	1753.72
Uttarakhand*	2686	0	0.00	7	20,587	879.79	0	0.00	50
Uttar Pradesh	39545.13	53	12899.59	29	132655	172859	0	12034.15	0
West Bengal	2526	52	28,050.00	0	0	2,63,372.00	2,10,000	42,082	26925
A and N Islands	0	7	367			202.3	0	0	0
Chandigarh	0	0	0	3	300	0.06	0	0	0
D & Nagar Haveli and Daman and Diu	0	0	0	0	0	0	0	0	0
Delhi	55	0	0	0	0	15	0	0	0
Jammu & Kashmir*	26211	6	4230	2	6,000	1,590	0	0	21396
Ladakh	1576	1	1.5	1	250	10	97,700	0	0
Lakshadweep	0	0	0	0	0	1.84	0	0	0
Puducherry	7.085	N.A.	303.33	N.A.	1,357.12	57.45	0	0	0
All India	280751.115	12906	754832.81	504	2045250.46	2448368.61	1066968.96	1355060.33	920390.71

Source : Department of Fisheries, State Government/ Ut Administration

*Meghalaya : Beels= 225.23 Lakes = 60.95, Swamps and low- lying areas = 66.94

*Karnataka: Saline / Alkaline = 238893 Ha

* Uttarakhand : Raceways 3.38 Ha

Himanchal Pradesh Raceways 4.42 Ha

* Jammu & Kashmir : Raceways = 35 Ha

*Ladakh : Raceways = 3.8 Ha

*Odisha : Brackish Water area suitable for culture – 32587 Ha , Backwater – 8100 Ha , Brackish Water Chilika Lake – 79000 Ha, Estuaries – 297850 Ha

*Haryana : Saline /Alkaline = 344 Ha

* Tamil Nadu : Saline /Alkaline = 6263 Ha

* N.A. : Not Applicable

Marine Fisheries Potential in India

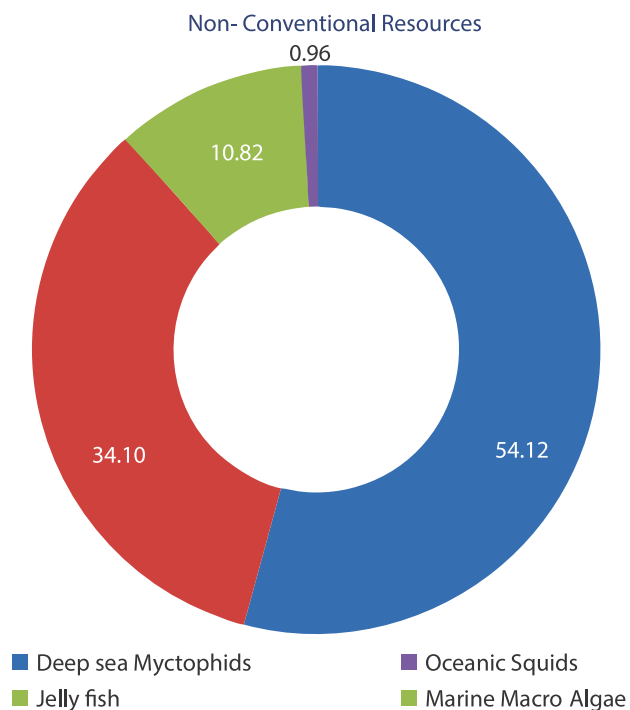
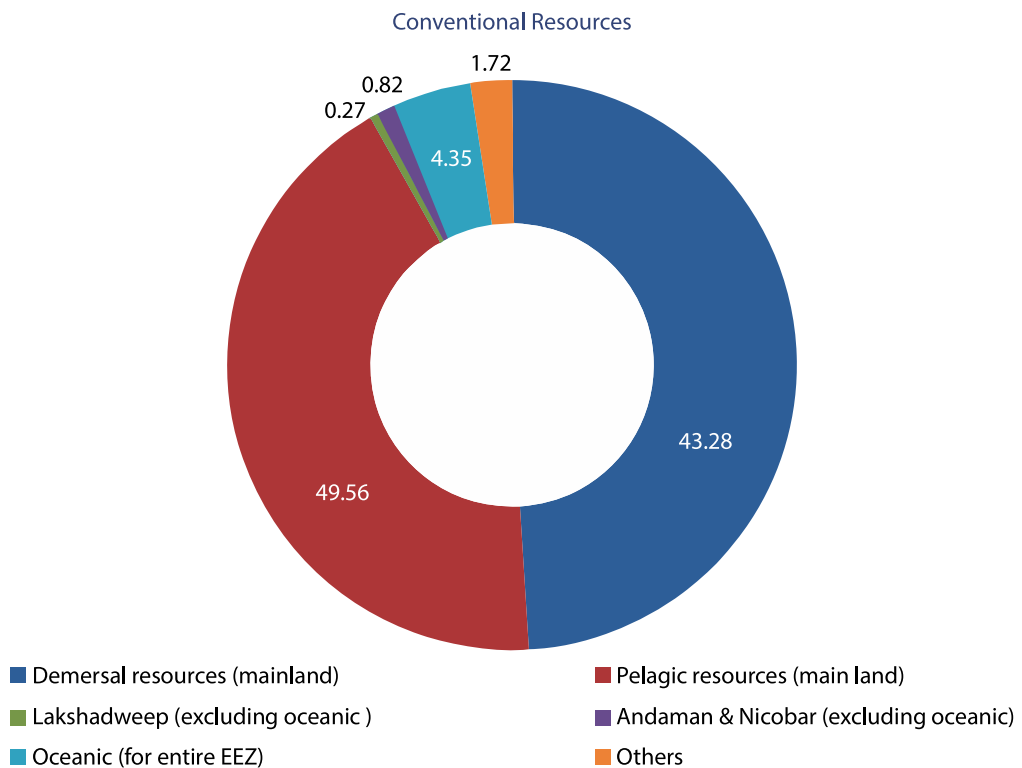
Resource-wise fisheries potential yield from the depth zone up to 500m depth was estimated by the committee constituted by Department of Fisheries (then DADF), Government of India for Revalidation of potential yield from the Indian EEZ. The estimate of potential yield of conventional resources along the mainland & Island ecosystems of India is 5.31 million tonnes and non-conventional resources is 1.847 million Tonnes; thus totalling to 7.158 million Tonnes.

Summary of estimated potential of marine fisheries in different realms (2018)

Table 7.2: Potential of Fisheries Resources in the Indian Exclusive Economic Zone (EEZ)	
A. Conventional resource	Quantity in Tonnes
Demersal resources (mainland)	22,98,281
Pelagic resources (main land)	26,31,827
Lakshadweep (excluding oceanic)	14,490
Andaman & Nicobar (excluding)	43,794
Oceanic (for entire EEZ)	2,30,832
Others	91,369
Sub Total	53,10,593
B. Non-Conventional resources: (Additional Potential)	
Deep sea Myctophids	10,00,000
Oceanic Squids	6,30,000
Jelly fish	2,00,000
Marine Macro Algae	17,775
Sub Total	18,47,775
Resources Grand Total:	71,58,368
Source: Fishery Survey of India (Report of the working group for revalidating the potential yield of Fishery Resources in the Indian EEZ), 2018	

The marine fish production estimated for the country in 2020-21 is about 3.48 million tonnes which consists mainly of the conventional resources harvested mainly from waters within 200m depths. Hence, there is scope for increasing the landings of conventional resources from oceanic waters as well as scope for harnessing additional non-Conventional marine fishery resources of 1.84 Million Tonnes.

Fig 32: Percentage Contribution of Potential of Fisheries Resources in the Indian Exclusive Economic Zone (EEZ): 2018



CHAPTER 8

EXPENDITURE ON FISHERIES SECTOR



Table 8.1: Year-wise approved outlay and Expenditure for development of fisheries sector under Blue revolution Scheme 2015-16 to 2019-20 (Rs. In Lakh)

Year	Approved outlay	Budget Estimate	Revised Budget Estimate	Expenditure
2015-16	47,695.00	47,695.00	45,586.00	41,680.94
2016-17	53,800.00	45,000.00	42,425.00	42,411.00
2017-18	59,800.00	54,913.00	43,799.19	42,077.95
2018-19	65,800.00	73,245.00	67,914.00	67,552.37
2019-20	72,905.00	77,025.00	67,025.00	63,575.86
Total	300,000.00	2,97,878	2,66,749.19	2,57,298.12

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Fig 33 : Year-wise approved outlay and Expenditure for development of fisheries sector under Blue Revolution Scheme including NFDB & Fishery Institute 2015-16 to 2019-20 (Rs. In Lakh)

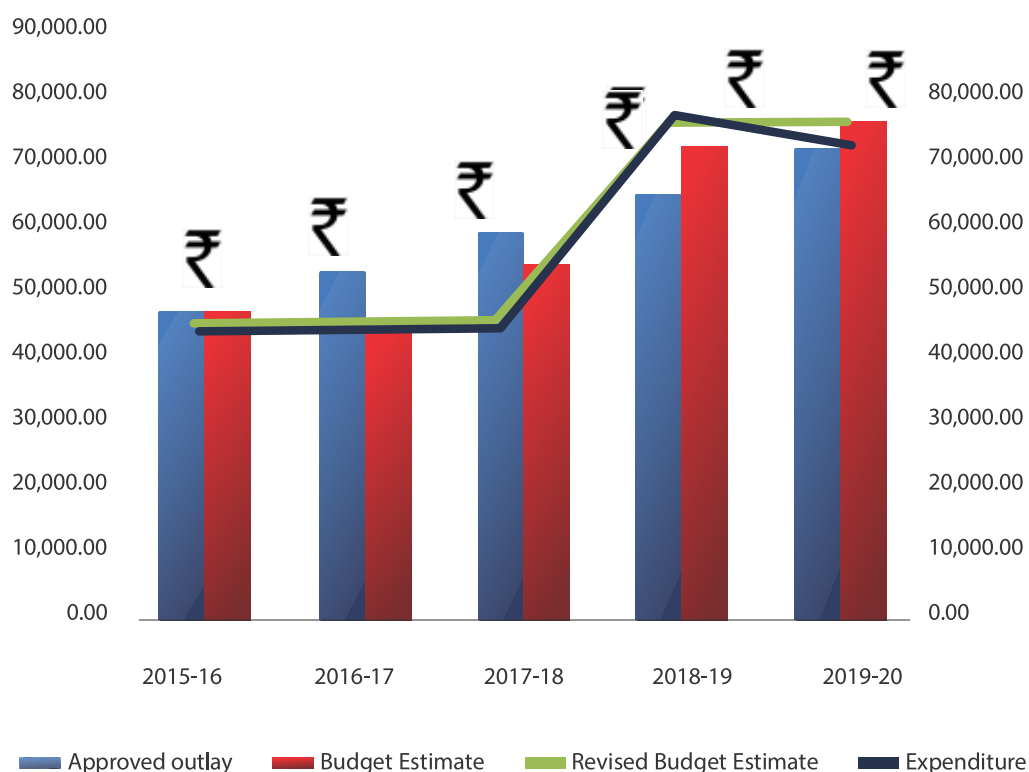


Table 8.2 : Year-wise approved outlay and Expenditure for development of Fisheries Sector under PMMSY (Rs. In Crore)

Year	Approved outlay	Budget Estimate	Revised Budget Estimate	Expenditure
2020-21	691.00	560.00	700.00	699.72
2021-22	2118.00	1000.00	1200.00	1169.19
Total	2809.00	1560.00	1900.00	1868.91

Fig 34: Year-wise approved outlay and Expenditure for development of fisheries sector under PMMSY Scheme 2020-21 to 2021-22 (Rs. In Crore)

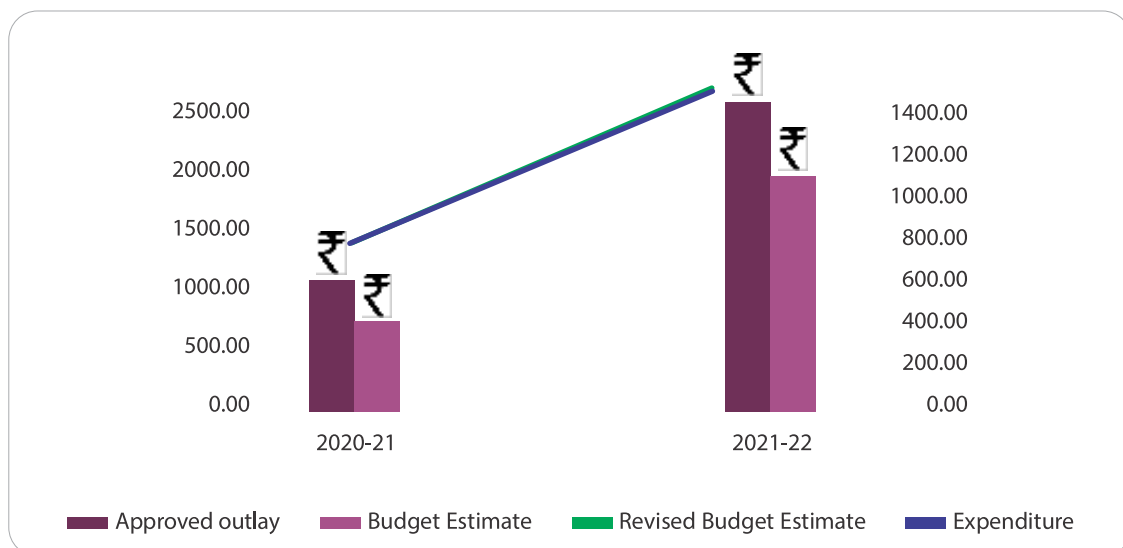


Table 8.3 : Scheme –wise Outlay and Expenditure 2017-18 to 2020-21, Fisheries Sector Schemes (Rs. In Crore)

S.N.	Scheme	2017-18			2018-19			2019-20			2020-21		
		BE	RE	EXP	BE	RE	EXP	BE	RE	EXP	BE	RE	EXP
1	Blue Revolution: Integrated Development and Management of Fisheries	400.73	301.73	323.55	632.61	484.85	484.46	550	450	429.78	560	700	699.72
2	NFDB	9	9	13.99	5	101.63	101.62	80.75	80.75	80.75	77.5	32.28	32.25
3	FIDF	-	-	-	10	1	1	10	5.25	0	10	10	9.5
	Sub-Total	409.73	310.73	337.54	647.61	587.48	587.08	640.75	536	510.53	647.5	742.28	741.47
4	FSI	75.27	53.18	51.05	57.62	55.19	56.27	91.65	90.82	84.32	84.01	85.43	72.7
5	CIFNET	44.72	20.29	19.57	19.43	19.11	19.05	25.8	28.71	27.13	36.53	36.85	30.55
6	NIFPHATT	13.25	10.15	9.07	11.6	11.6	9.86	14.06	12.18	9.23	12.86	12.86	10.02
7	CICEF	4.97	4.24	3.55	3.93	4.46	4.22	4.93	4.73	4.53	5.56	3.96	3.8
	Sub-Total	138.21	87.86	83.24	92.58	90.36	89.4	136.44	136.44	125.21	138.96	139.1	117.07
8	DAAHQ	1.18	13.81	0	2.27	1.75	3.53	3.04	3.03	0	10.01	4.01	4
9	CAA	4	3.5	2	4	4	4	4.5	4.5	4.50	4.50	3.00	3.00
10	Package for replacement of Fishing vessels seized by Pakistan	0.1	0.1	0.1	1	3.92	3.92	-	-	-	-	-	-
11	Secretariate Economic Services	-	-	-	-	-	-	20	20	15.48	24	22	18.28
	Grand Total	553.22	416	422.88	747.46	687.51	687.93	804.73	699.97	655.72	825	910.42	883.84



Table 8.4 : State/UT -wise release in Fisheries Sector during 2015-16 to 2019-20 and 2020-21 to 2021-22 (PMMSY)

(Rs. In lakh)

S. N.	State/UT/Institutes	Blue Revolution						PMMSY		Total
		2015-16	2016-17	2017-18	2018-19	2019-20	Total Under BR	2020-21	2021-22	
1	A & N Islands	275.00	54.00	179.89	129.09	51.21	689.19	200.00	509.30	1398.49
2	Andhra Pradesh	777.15	1897.00	2162.88	1302.31	2556.20	8695.54	5554.12	13105.85	27355.51
3	Arunachal Pradesh	81.30	0.00	222.90	374.68	24.77	703.65	790.61	493.94	1988.20
4	Assam	971.14	1641.45	799.66	524.14	280.01	4216.40	2676.56	5130.06	12023.02
5	Bihar	93.84	1948.04	2.25	4078.69	1557.15	7679.97	2932.12	1308.15	11920.24
6	Chhattisgarh	446.51	1346.69	1091.92	1045.69	3293.90	7224.71	3606.74	3296.56	14128.01
7	Daman & Diu	21.77	0.00	226.69	0.00	0.00	248.46	178.90	7.20	434.56
8	Delhi	0.00	0.00	136.29	0.00	0.00	136.29	144.30	19.00	299.59
9	Goa	70.82	1000.00	265.24	63.82	0.00	1399.88	596.74	1645.85	3642.47
10	Gujarat	491.43	386.50	1527.43	1420.80	1000.00	4826.16	893.70	5729.85	11449.71
11	Haryana	194.95	1122.05	779.36	605.90	696.47	3398.73	953.94	1620.03	5972.70
12	Himachal Pradesh	181.57	1082.32	572.26	1046.13	629.14	3511.42	1467.28	345.15	5323.85
13	Jammu & Kashmir	213.23	1111.18	404.69	439.54	788.63	2957.27	4207.20	1493.22	8657.69
14	Jharkhand	589.12	2300.20	75.00	925.40	0.00	3889.72	1618.56	1507.15	7015.43
15	Karnataka	2352.58	2870.54	3324.31	5847.28	2330.61	16725.32	6235.30	9927.68	32888.30
16	Kerala	6713.78	1298.10	812.34	5093.01	9357.15	23274.38	800.00	7810.95	31885.33
17	Lakshadweep	42.25	0.00	53.57	39.90	29.30	165.02	1344.12	98.80	1607.94
18	Madhya Pradesh	346.09	1400.00	672.02	711.39	1859.47	4988.97	2379.16	5587.64	12955.77
19	Maharashtra	1263.62	2051.53	2256.81	2861.17	1000.00	9433.13	3657.42	4042.99	17133.54
20	Manipur	590.22	0.00	456.15	382.13	50.68	1479.18	1097.97	846.66	3423.81
21	Meghalaya	36.10	1003.17	139.60	2598.95	2387.45	6165.27	790.65	765.69	7721.61
22	Mizoram	1016.49	1376.77	261.39	403.75	735.99	3794.39	986.77	1567.01	6348.17
23	Nagaland	867.92	965.84	219.40	194.67	2396.17	4644.00	807.07	1355.67	6806.74
24	Odisha	1256.93	2593.59	1077.68	1022.13	543.68	6494.01	3995.82	7914.47	18404.30
25	Pondicherry	859.95	999.95	150.00	1448.00	461.37	3919.27	990.50	1349.45	6259.22
26	Punjab	42.59	999.00	465.36	581.34	2063.76	4152.05	567.84	0.00	4719.89
27	Rajasthan	34.21	262.10	83.28	70.20	266.20	715.99	210.82	175.65	1102.46
28	Sikkim	26.94	379.16	0.00	416.52	1019.65	1842.27	313.20	242.01	2397.48
29	Tamil Nadu	5700.73	2492.50	11342.80	7155.91	1801.00	28492.94	1938.61	3036.35	33467.90
30	Telangana	165.94	1465.00	479.78	1574.80	154.00	3839.52	779.34	4433.73	9052.59
31	Tripura	361.96	867.88	341.92	2004.18	788.91	4364.85	737.01	1965.00	7066.86
32	Uttar Pradesh	672.63	1760.85	238.14	3050.06	3816.63	9538.31	7009.62	7746.14	24294.07
33	Uttarakhand	48.85	954.95	746.16	471.08	683.67	2904.71	912.61	1937.45	5754.77
34	West Bengal	925.84	774.38	649.32	185.40	0.00	2534.94	0.00	0.00	2534.94
35	Ladakh	0.00	0.00	0.00	0.00	0.00	0.00	37.50	120.30	157.80
36	NFDB	5339.99	3239.03	1399.00	10162.00	8075.00	28215.02	3225.00	1800.00	33240.02
37	Fisheries Institutes	5439.75	165.44	8324.14	8944.39	12522.17	35395.89	12108.94	11294.82	58799.65
38	Others	3167.75	601.97	138.35	377.92	806.5	5092.49	3078.27	6106	14276.76
39	CS proposals	0.00	0.00	0.00	0.00	0.00	0.00	8560.45	19779.04	28339.49
	Total	41680.94	42411.18	42077.97	67552.37	64026.84	257749.29	88384.76	136114.81	482248.86

Rs. 10000 lakh has been released on 31.03.2018 for deep sea fishing and construction of fish landing center at Kuntukal by M/o Finance

*Releases from NFDB has not included in the release figure mentioned for 2016-17

Table 8.5 (A): Year-wise total Fund released for Development of Fisheries Sector (Rs. in Lakhs)

State/UT	2016-17			2017-18			2018-19		
	State Share Fund Released	Central Share Fund Released	Total fund release for development of Fisheries Sector	State Share Fund Released	Central Share Fund Released	Total fund release for development of Fisheries Sector	State Share Fund Released	Central Share Fund Released	Total fund release for development of Fisheries Sector
Andhra Pradesh	283	1742	2025	3,284.43	2,162.82	5,447.25	402.25	1,302.31	1,704.56
Arunachal Pradesh	0	0	0	0	0	0.00	81.18	374.68	455.86
Assam	1,900.92	888.01	2788.93	817.97	3,074.93	3,892.90	157.6	524.14	681.74
Bihar	0	1,948.04	1948.04	0	2.25	2.25	0	4,078.69	4,078.69
Chhattisgarh	3,099.04	2,230.77	5329.81	4,262.98	2,121.28	6,384.26	1,431.60	1,045.69	2,477.29
Goa	3,035.06	326.44	3361.5	4,550.32	251.49	4,801.81	0	63.82	63.82
Gujarat	0	0	0	0	0	0.00	689.18	1,420.80	2,109.98
Haryana	292	1,122.05	1414.05	357.14	2,862.50	3,219.64		605.9	605.90
Himachal Pradesh	0	0	0	0	0	0.00	203.05	1,046.13	1,249.18
Jharkhand	10,451.47	2,304.72	12756.19	9,426.57	1,686.40	11,112.97	200	925.4	1,125.40
Karnataka	25,372.06	5,348.99	30721.05	30,420.81	4,216	34,636.81	1,035.86	5,847.28	6,883.14
Kerala	35,128	5,714	40842	41,578	2,188	43,766.00	3,677.54	5,093.01	8,770.55
Madhya Pradesh	2,743.79	229.55	2973.34	1,752.26	2,114.51	3,866.77	540	711.39	1,251.39
Maharashtra	57.5	32.45	89.95	347.94	617.85	965.79	1,641.81	2,861.17	4,502.98
Manipur	0	44	44	65.14	456.14	521.28	83.74	382.13	465.87
Meghalaya	0	0	0	0	0	0.00	293	2,598.95	2,891.95
Mizoram	239.87	1,344.05	1583.92	0	164.39	164.39	22.62	403.75	426.37
Nagaland	102.5	410	512.5	102.5	410	512.50	0	194.67	194.67
Odisha	8,092.27	1,472.74	9565.01	8,939.95	1,801.43	10,741.38	1,725.19	1,022.13	2,747.32
Punjab	0	0	0	0	0	0.00	72.68	581.34	654.02
Rajasthan	0	262.1	262.1	137	83.28	220.28	0	70.2	70.20
Sikkim	2.3	379.16	381.46	0	0	0.00	0	416.52	416.52
Tamil Nadu	21,464.17	7,120.47	28584.64	24,675.93	12,010.99	36,686.92	9,638.38	7,155.91	16,794.29
Telangana	0	0	0	0	0	0.00	0	1,574.80	1,574.80
Tripura	217	867.88	1084.88	37.99	341.92	379.91	42.155	2,004.18	2,046.34
Uttar Pradesh	250.4	1,760.85	2011.25	1,224.67	0	1,224.67	1,080.51	3,050.06	4,130.57
Uttarakhand	182.13	977.41	1159.54	51.93	746.56	798.49	53.01	471.08	524.09
West Bengal	0	0	0	0	0	0.00		185.4	185.40
A and N Islands	0	54	54	0	179.88	179.88	0	1,045.69	1,045.69
Daman and Diu D & Nagar Haveli	0	0	0	0	0	0.00	0	0	0.00
Delhi 0	0	0	0	0	0.00	0	0	0.00	
Ladakh									
Jammu & Kashmir	107	1,163.50	1270.5	90.45	706.46	796.91	0	439.54	439.54
Lakshadweep	650	0	650	559	53.56	612.56	0	39.89	39.89
Puducherry	0	29.75	29.75	0	0	0.00		1448	1,448.00
All India	113,670.48	37,772.93	151,443.41	132,682.98	38,252.64	170,935.62	23,071.35	48,984.65	72,056.00

Source: State Government / UT Administration

Table 8.5 (B): Year-wise total Fund released for Development of Fisheries Sector (Rs. in Lakhs)

State/UT	2019-20			2020-21		
	State Share Fund Released	Central Share Fund Released	Total fund release for development of Fisheries Sector	State Share Fund Released	Central Share Fund Released	Total fund release for development of Fisheries Sector
Andhra Pradesh	2,360	2,556	4,916.00	3259.00	6888.78	10147.78
Arunachal Pradesh	0	24.77	24.77	0.00	0.00	0.00
Assam	0	280.01	280.01	250.48	2436.89	2687.37
Bihar	0	1,557.15	1,557.15	0.00	2932.12	2932.12
Chhattisgarh	905.58	3,292.90	4,198.48	2352.98	3493.03	5846.01
Goa	0	0	0.00	10.16	596.76	606.92
Gujarat	3,680	1000	4,680.00	3192.50	893.70	4086.20
Haryana	0	696.47	696.47	0	696.47	696.47
Himachal Pradesh	40.84	629.14	669.98	0.00	0.00	0.00
Jharkhand	1,062.39	0	1,062.39	62.40	0.00	62.40
Karnataka	450	2,330.61	2,780.61	2603.23	3543.40	6146.63
Kerala	3,517.80	9,357.15	12,874.95	3691.30	4204.44	7895.74
Madhya Pradesh	600	1,859.47	2,459.47	0.00	0.00	0.00
Maharashtra	997.102	1000	1,997.10	54.78	76.54	131.32
Manipur	0	50.68	50.68	0.00	0.00	0.00
Meghalaya	262.65	2,387.45	2,650.10	178.50	2115.00	2293.50
Mizoram	0	735.99	735.99	0.00	703.84	703.84
Nagaland	24.52	2,396.15	2,420.67	24.52	2,396.15	2,420.67
Odisha	471.68	543.68	1,015.36	2787.43	4024.53	6811.96
Punjab	0	2,063.76	2,063.76	345.83	512.49	858.32
Rajasthan	176.17	266.2	442.37	93.51	112.71	206.22
Sikkim	0	1,019.65	1,019.65	0.00	0.00	0.00
Tamil Nadu	0	1,801	1,801.00	0	1,801	1,801.00
Telangana	0	154	154.00	0	154	154.00
Tripura	35.3	788.91	824.21	0.00	0.00	0.00
Uttar Pradesh	0	3,816.63	3,816.63	2297.61	3415.66	5713.27
Uttarakhand	0	683.67	683.67	180.73	1039.26	1219.99
West Bengal	0	0	0.00	0	0	0.00
A and N Islands	0	51.21	51.21	0.00	241.37	241.37
Daman and Diu D & Nagar Haveli	0	0	0.00	0.00	178.90	178.90
Delhi	0	0	0.00	0.00	144.30	144.30
Ladakh				0.00	0.00	0.00
Jammu & Kashmir	60	788.63	848.63	120.00	4207.20	4327.20
Lakshadweep	0	29.3	29.30	0.00	1361.00	1361.00
Puducherry	0	461.37	461.37	0.00	990.50	990.50
All India	14,644.03	42,621.95	57,265.98	21504.96	49160.03	70665.00

Source: State Government / UT Administration

CHAPTER 9

FISHERIES WELFARE

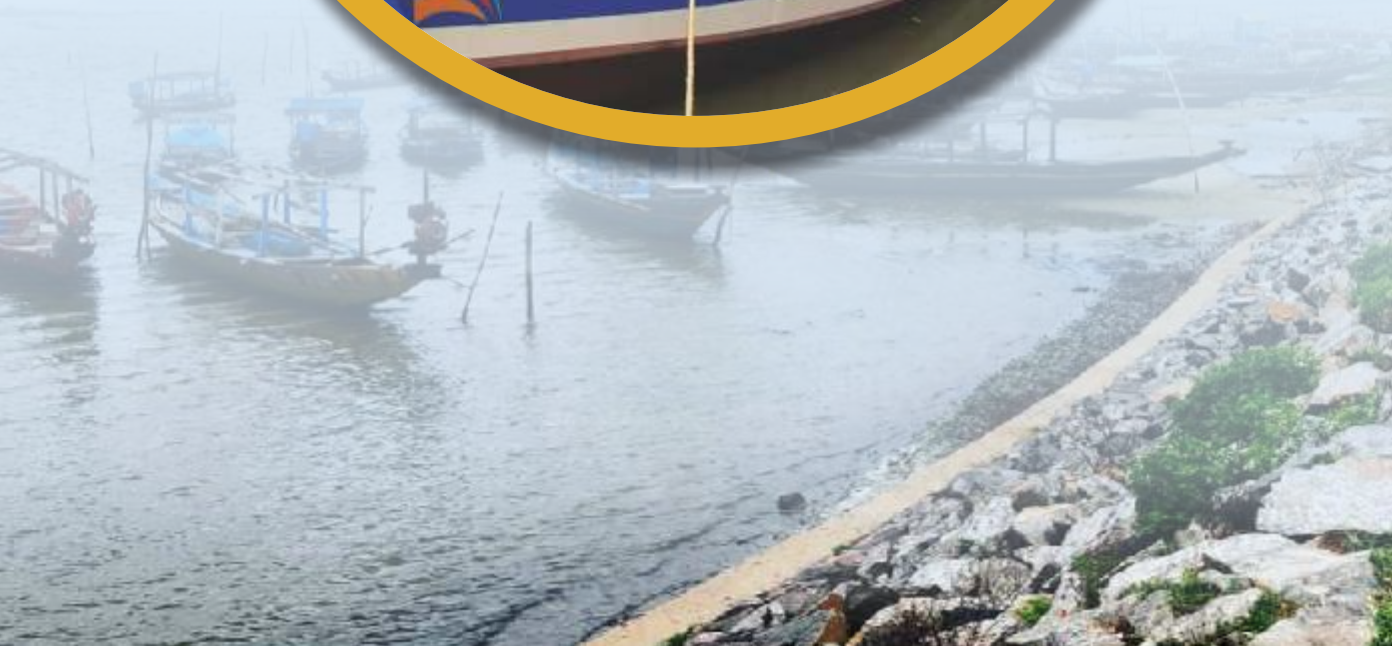
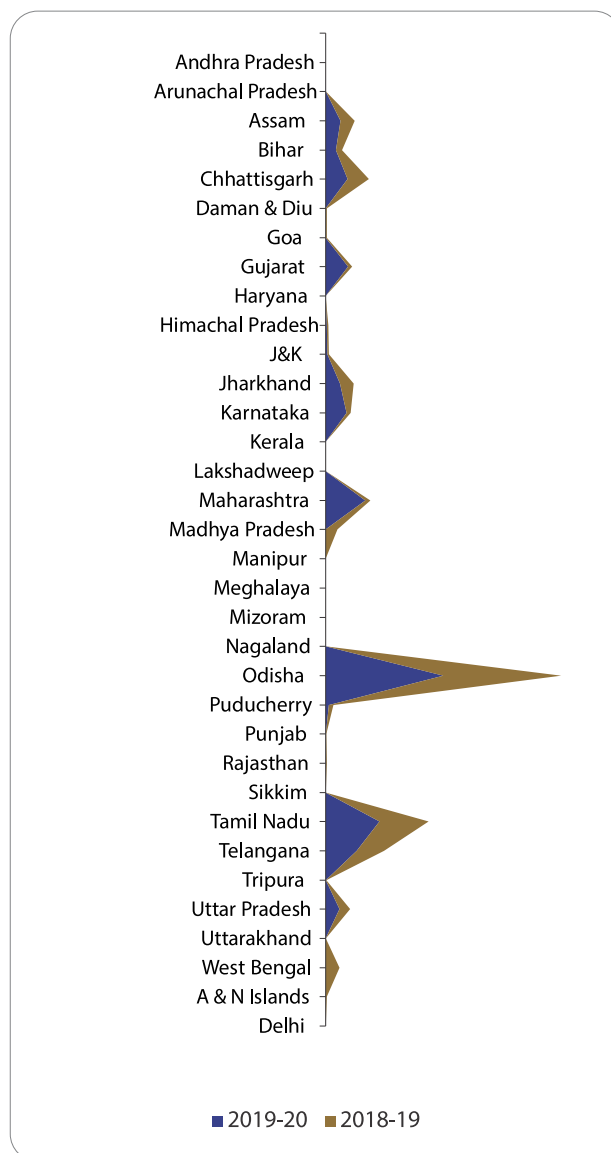


Fig 35 :State-wise details of fishermen insured under the sub-component of Group Accident Insurance under the Blue Revolution Scheme



This is the graph of Fishermen Insured in each state under the sub-component of Group Accident Insurance in 2018-19 and 2019-20. The total number of Fishermen Insured in 2018-19 was 30,39,374 and total Fishermen Insured in 2019-20 was 35,86,721. As per the graph Odisha has highest number of Fishermen Insured which was 11,50,000 and Tamil Nadu has second highest number of Fishermen Insured in 2019-20 which was 5,24,054.

Table 9.1: State-wise details of fishermen insured under the sub-component of Group Accident Insurance under the Blue Revolution Scheme

State/UT	2015-16	2016-17	2017-18	2018-19	2019-20
Andhra Pradesh	404,242	405,347	0	0	0
Arunachal Pradesh	10,000	7000	1,000	1,027	1,027
Assam	164,939	157,325	157,325	139,739	142,716
Bihar	300,000	300,000	300,000	58,277	100,000
Chhattisgarh	210,000	210,000	210,000	205,897	214,552
Goa	12,721	11,849	11,840	11,840	
Gujarat	218,270	218,270	218,270	37,856	218,270
Haryana	0	0	0	0	0
Himachal Pradesh	12,153	12,901	13,413	12,650	12,650
Jharkhand	114,500	126,000	126,000	131,451	140,000
Karnataka	204,689	204,689	204,689	40,641	204,689
Kerala	237,501	0	0	0	0
Madhya Pradesh	175,199	180,988	184,933	116,941	
Maharashtra	323,838	323,838	323,838	46,900	388,038
Manipur	12,000	12,000	1,000	0	0
Meghalaya	0	0	0	0	0
Mizoram	10,000	10,000	1,000	1,187	0
Nagaland	0	0	0	0	0
Orissa	1,111,111	1,150,000	1,150,000	1,150,000	1,150,000
Punjab	1500	5000	5,000	3,416	3,500
Rajasthan	10,833	11,027	11,220	11,220	2,122
Sikkim	7000	7000	1000	411	
Tamil Nadu	716,308	666,380	666,380	481,386	524,054
Telangana	276,799	326,154	326,154	265,236	303,000
Tripura	1000	1000	1,000	2,072	2,600
Uttar Pradesh	193,000	193,000	193,000	103,333	134,014
Uttarakhand	2000	2000	1,000	1,324	0
West Bengal	221,563	0	0	132,995	0
A & N Islands	14,839	14,839	14,839	13,296	0
Daman & Diu	9500	9,500	9,500	9,266	0
Delhi	0	0	400	103	200
J&K	15,000	15,000	15,000	15,961	15,402
Lakshadweep	12,052	12,052	12,052	1,204	0
Puducherry	54,367	54,367	54,367	43,745	29,887
Total	5,056,924	4,647,526	4,214,220	3,039,374	3,586,721

Source: Department of Fisheries

Fig 36: State-wise details of relief assistance provided to fishermen and financial releases made under the sub-component of Saving-cum-Relief (SCR) of the Blue Revolution Scheme during 2019-20 and 2018-19

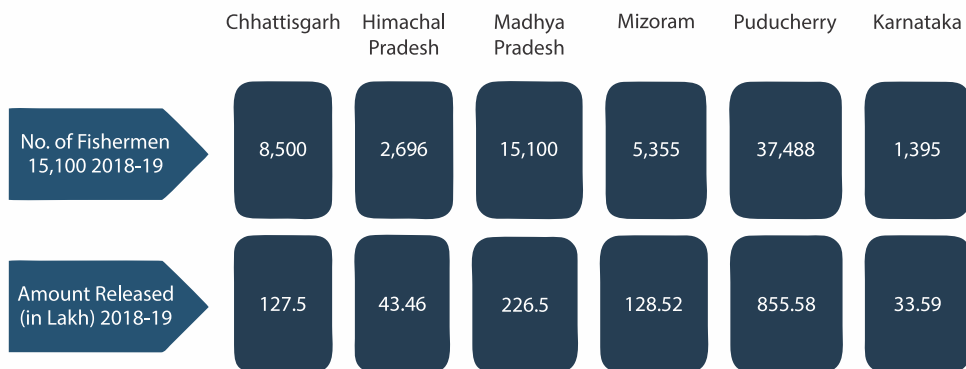
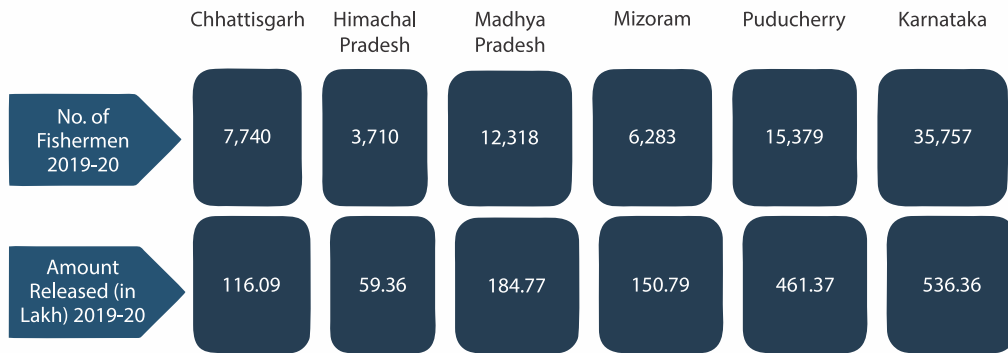


Table 9.2: State-wise details of relief assistance provided to fishermen and financial releases made under the subcomponent of Saving-cum-Relief (SCR) of the Blue Revolution Scheme during 2019-20

State/UT	2015-16		2016-17		2017-18		2018-19		2019-20	
	No. of Fishermen	Amount Released (in Lakh)	No. of Fishermen	Amount Released (in Lakh)	No. of Fishermen	Amount Released (in Lakh)	No. of Fishermen	Amount Released (in Lakh)	No. of Fishermen	Amount Released (in Lakh)
Bihar	10,000	90	0	0	0	0	0	0	0	0
Chhattisgarh	8,000	72	6,665	100	6,666	100	8,500	127.5	7740	116.09
Goa	5,197	45.82	5,416	48.74	0	0	0	0	0	0
Himachal Pradesh	4,641	27.85	5,092	81.47	3,850	61.2	2,696	43.46	3710	59.36
Karnataka	39,048	390.45	0	0	34,239	462.23	0	0	35757	536.36
Kerala	1,97,058	1182.34	0	0	0	0	0	0	680250	8007.15
Maharashtra	0	0	2,000	30	0	0	0	0	0	0
Madhya Pradesh	16,143	122.6	6,667	100	10,000	135	15,100	226.5	12318	184.77
Mizoram	0	0	0	0	0	0	5,355	128.52	6283	150.79
Nagaland	0	0	0	0	0	0	0	0	0	0
Odisha	25,110	200.35	0	0	10,000	198.17	0	0	3757	50.883
Puducherry	27,691	332.29	17,833	361	0	150	37,488	855.58	15379	461.37
Rajasthan	1,451	6.13	678	6.12	0	0	0	0	0	0
Tamil Nadu	1,08,031	647.07	0	0	0	0	0	0	0	0
Telangana	1,123	9.69	0	0	0	0	0	0	0	0
Tripura	0	0	0	0	835	14.39	1,395	33.59	0	0
Total	4,43,493	3,126.59	44,351	727.33	65,590	1120.99	70,534	1,415.15	765,194	9,566.77

Source: Department of Fisheries

WELFARE OF FISHERMEN UNDER PRADHAN MANTRI MATSYA SAMPDA YOJANA (PMMSY)

Table 9.3 : Approved units of boats (replacement) and nets for traditional fishermen

S.N.	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (Rs. In Lakh)	Gol Share	Physical (No.)	Proj. Cost (Rs. In Lakh)	Gol Share
1	Andhra Pradesh	450	2250	570	741	3705	889.2
2	Assam	61	305	144	0	0	0
3	Chhattisgarh	20	100	24	0	0	0
4	Goa	20	100	27	6	30	10.8
5	Himachal Pradesh	500	1000	450	0	0	0
6	Jammu and Kashmir	25	125	50	0	0	0
7	Jharkhand	20	100	31.2	0	0	0
8	Karnataka	100	500	147	43	215	57
9	Kerala	0	0	0	100	500	120
10	Lakshadweep	100	500	300	0	0	0
11	Maharashtra	14	70	21	71	355	98.4
12	Odisha	200	1000	300	100	500	150
13	Puducherry	130	650	285	0	0	0
14	Tamil Nadu	200	1000	240	0	0	0
15	Tripura	16	80	43.2	13	65	35.1
	Total	1856	7780	2632.4	1074	5370	1360.5

Table 9.4: Approved units for extension and support services

S.N.	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (Rs. In Lakh)	Gol Share	Physical (No.)	Proj. Cost (Rs. In Lakh)	Gol Share
1	Andaman & Nicobar	0	0	0	1	25	10
2	Assam	0	0	0	1	25	13.5
3	Bihar	10	250	72	0	0	0
4	Jharkhand	1	25	9	2	50	12
5	Karnataka	0	0	0	7	175	51
6	Kerala	0	0	0	10	250	60
7	Maharashtra	20	500	129	8	200	66
	Total	31	775	210	29	725	212.5

Table 9.5 : Approved livelihood and nutritional support for socio-economically backward active traditional fishers' families for conservation of fisheries resources during fishing ban/lean period.

S.N.	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (Rs. In Lakh)	Gol Share	Physical (No.)	Proj. Cost (Rs. In Lakh)	Gol Share
1	Andaman & Nicobar	0	0	0	1000	45	30
2	Andhra Pradesh	0	0	0	98360	4426.2	1475.4
3	Assam	20000	900	480	21000	945	504
4	Bihar	0	0	0	50000	2250	750
5	Chhattisgarh	8000	360	120	8000	360	120
6	Gujarat	0	0	0	1000	45	15
7	Himachal Pradesh	3557	160.07	85.37	3557	160.065	85.368
8	Jammu and Kashmir	17396	782.820	521.88	16286	732.87	488.58
9	Karnataka	24003	1080.135	360.05	20414	918.63	306.21
10	Kerala	0	0	0	179316	7654.2	2551.4
11	Lakshadweep	0	0	0	2500	112.5	75
12	Madhya Pradesh	10385	467.325	155.775	11237	505.67	168.56
13	Mizoram	6283	282.735	150.79	6283	282.735	150.792
14	Odisha	12000	540	180	20000	900	299.97
15	Puducherry	28767	1294.52	863.01	28767	1295	863
16	Rajasthan	103	3.09	1.11	2200	99	33
17	Sikkim	0	0	0	200	9	4.8
18	Tamil Nadu	0	0	0	170000	7650	2550
19	Telangana	2000	90	30	4000	180	60
20	Tripura	2239	67.17	53.74	4142	186.39	99.408
21	Uttarakhand	0	0	0	200	9	4.8
	Total	134733	6027.865	3001.725	648462	28766.26	10635.3

CHAPTER 10

HUMAN RESOURCE DEVELOPMENT



Table 10.1: Training courses conducted at CIFNET

S. No.	Course	Duration
1	BFSc (Nautical Science)(Affiliated to CUSAT)	4 years
2	Vessel Navigator Course (NCVT)	2 years
3	Marine Fitter Course (NCVT)	2 years
4	Shore Mechanic Course	1 year
5	Elementary Fishing Technology Course(Statutory course)	2 months
6	Advanced Fishing technology Course (Statutory course)	2 weeks
7	Fishing technology for Coast guard officers	1 week
8	Teachers training course	6 months
9	Advanced Diploma in Fishing Gear Technology Course	1 year
10	Short term courses on Fishery Technology, Marine Engineering, Refrigeration & Electronics, Nautical Science for fishermen, students of College and Vocational Higher secondary.	Tailor made
11	Special training course for National & Overseas candidates	Tailor made

Source: CIFNET,Kochi
CUSAT – Cochin University of Science and Technology
NCVT – National Council of Vocational Training

Table 10.2: CIFNET Skill Development/ Awareness Training Programme for Fishermen

S. No.	Name of Course/Programme	Course Duration
1	Monofilament Long line and Tuna Handling onboard under capacity building training programme for fishermen	9 days (4 + 5)
2	Basic of Seamanship, Navigation, Marine Electronic equipments& maintenance of engines	5 days
3	Maintenance of boat engine & Fishing practice	3 days
4	Safety Manning practices	3 days
5	Basic of Seamanship, Navigation, Marine Electronic equipments	3 days
6	Life Saving Appliances and Safety at Sea	2 days
7	ROR and Collision Prevention for Fishing Vessel	3 days
8	Fishing vessel Communication and Vessel Monitoring System	2 days
9	Hygienic handling and preservation of catch on board Fishing Vessel	2 days
10	Engine operation and maintenance of fishing vessel	2 days
11	Navigation and Marine communication for coastal police	2 days
12	Power Distribution and Electrical Safety onboard Fishing Vessels	2 days
13	Evolution of Fishing Crafts and recent developments	1 day
14	Handling of Tuna for Sashimi Grade for Lakshadweep Fishermen	5 days

Table 10.3: Training of Trainers Programme under PMMSY

S. No.	Name of ToT	Course Duration
1	Boat Building, Navigation and Communication Equipments	10 days
2	Safety Seamanship & Navigation, Marine Electronic Equipments and Marine Engines onboard fishing vessel	5 days
3	Fishing Technology Course	5 days
4	Life Saving & Fire Fighting Appliances and Electronic Equipments onboard fishing vessel	5 days
5	Safety Seamanship & Navigation, Handling of Electronic Equipments	3 days
6	Marine Engine Operation and Maintenance	3 days
7	Sea Safety, Survey and Certification of Fishing Vessels	3 days
8	Ocean Climate and Weather Warning System	3 days
9	Code of Conduct for Responsible Fishing (CCRF), Fishery Policy and Law	3 days

Table 10.4: Achievements of Central Institute of Fisheries Nautical and Engineering Training : 2020-21

S. No.	Name of the Course	Candidates trained	Continuing
1	BFSc(N.S.)	223	126
2	Vessel Navigator Course	376	112
3	Marine Fitter Course	453	111
4	Shore Mechanics Course (12 months)	316	7
5.	Engineer (Fishing Vessel) for D.M.E. (9 months)	20	*
6.	Gear Technicians Course (9 months)	144	*
7.	Short term Training Course (varying from 1 day to 8 weeks in different discipline) Extension programmes, Skill development, Coast Guards, State/Central Govt., Fishermen, Boat operators, Coastal security marine police, BFSc, B.Sc/M.Sc , B.Tech/M.Tech students	11097	*
8.	Capacity Building on Tuna Long Lining for Fishermen sponsored by Tamil Nadu funded by NFDB	335	*
9.	Skill Development programme for Fishermen & Fishery Officials (TOT) sponsored by various State and funded by NFDB	182	*
10.	Short term Training for Fishermen/Fishery Officials sponsored by various States (2014 onwards)	2579	*
11.	Overseas Candidates (including OJT for Omani students)	160	*
12.	LOP crews on Deep sea fishing & Navigation	14	*
13.	Advanced Diploma in Fishing Gear Technology Course (12 months)	26	*
14.	Boat Building Foremen Course (15 months) (outdated)	99	*
15.	Radio Telephone Operators Course (9 months) upto 2003 (outdated)	219	*
16.	Teacher Training Course (6 months)	32	*
17.	Post-institutional training (Junior Deckhand, Engine Room Assistant, Apprentice Fitter)	2013	21
Course Restructured			
	Mate Fishing Vessel Course (MFVC-18 Months) (From 1984 -2005)	2067	*
	Engine Driver Fishing Vessel Course (EDFVC-18 months) (From 1984 -2005)	2040	*
	TOTAL CANDIDATES TRAINED	22395	377
* As per requirement			

Table 10.5: Achievements on Training activities

Parameters	2019-20			2020-21		
	Target	Actual	% Achievement	Target	Actual	% Achievement
No. of students undergoing Degree Course- BFSc(NS)	124	111	90	142	125	88
No. of students undergoing Trade Courses-VNC/ MFC	216	226	105	240	217	90.4
Ancillary Course (Shore Mechanics Course)	10	8	80	10	7	70
Statutory & Refresher Course (AFTC,EFTC)	10	4	40	10	1	10
Short term Courses	1300	1388	107	1000	661	66
TOTAL	1660	1737	105	1402	1011	72

Source: CIFNET, Kochi

VNC – Vessel Navigator Course MFC – Marine Fitter Course

AFTC – Advanced Fishing Technology Course EFTC – Elementary Fishing Technology Course

Table 10.6 : Achievements on Fishing vessel Performance by CIFNET

Parameters	2018-19			2019-20			2020-21		
	Target	Actual	% Achievement	Target	Actual	% Achievement	Target	Actual	% Achievement
Days out at sea	400	462	116	400	462	116	400	410	103
Fishing Days	300	349	116	300	345	115	300	345	115
Fishing Effort (hrs)	1100	1200	109	1100	1153	105	1100	1148	104
Fishing Effort (Hooks)	5000	4645	93	5000	5089	102	5000	5135	103
Catch	15	17.5	117	15	12.2	81	15000	19.309	129
Institutional trainee Days	3000	3453	115	3000	2556	85	1500	1620	108
Post institutional trainee days	3500	3874	111	3500	3630	104	2750	3531	128

Table 10.7: CIFNET Action Plan – Vessel Operational Target

S. N.	Parameters	2022-23	2023-24	2024-25	2025-26	Remarks
I. Target for fishery training vessels						
1	Days out at sea	350	350	600	600	Higher target from 2024- 25 is planned expecting the building of new Vessels
2	Fishing Days	275	275	450	450	
3	Fishing Effort(hrs)	1000	1000	1800	1800	
4	Fishing Effort(Hooks)	4000	4000	20000	20000	
5	Catch (T)	12	12	20	20	
6	Institutional trainee Days	2500	2500	4800	4800	
7	Post Institutional trainee days	2750	2750	4200	4200	
II. Target for Finance						
	Revenue of the Institute (in lakhs) (estimated)	65	85	100	120	
*The targets on vessel operation is proposed considering the COVID-19 situation and the restrictions and the same is communicated to Ministry vide letter No.5-1/2021 I&P dated 1.7.2021						
Source: Central Institute of Fisheries, Nautical and Engineering Training, Kochi (CIFNET)						

Table 10.8: Year-wise CIFNET Action Plan Training Target

S. N.	Parameters	2022-23	2023-24	2024-25	2025-26	Remarks
I. Target for Institution Training Programmes						
1	No. of students in Core course	156	160	160	160	Intake capacity from 22/year has been increased to 40/year.
	- BFSc (NS) (4 Years)	(36+40+40+40)	(4x40)	(4x40)	(4x40)	
2	No. of students in Trade courses- VNC/MFC (2 years)	240	240	240	240	Intake capacity from 16/year has been increased to 20/year.
3	Ancillary Course (Shore Mechanics Course)	10	10	15	15	As per the actual demand
4	Statutory & Refresher Course	10	10	10	10	As per the actual demand
I. Target for Institution Training Programmes						
1	Short Term training courses (STC)	1400	1200	1600	1600	Higher target from 2024-25 is planned expecting the building of new Vessels
	a. Fishermen training (in house) under PMMSY					
	b. Fishermen Extension training under PMMSY					
	c. STC for professionals (Coast Guard, Fisheries officials)					
	d. Professional students /VHSS					
Source : CIFNET, KOCHI						

Table 10.9 : Performance of CIFNET 2021-22

S. N.	Parameters	Annual Target 2021-2022	Total Achievement	(%) Achievement
I. Target for Institution Training Programmes				
1	No. of students under Degree course – BFSc (NS)	149	133	89.3
2	No. of students under Trade Courses (NCVT) Vessel Navigator Course/ Marine Fitter Course	240	202	84.2
3	No. of students under Ancillary Course (Shore Mechanics Course)	20 (as per demand from sponsors)	20	100
4	Statutory & Refresher Course	10 (as per demand from sponsors)	2	20
II. Target for Other Training Programmes				
5	Short Term training courses (STC)	1000	1132	113.2
III. Target for fishery training vessels				
1	Days out at sea	350	327	93.4
2	Fishing Days	300	242	80.7
3	Fishing Effort(hrs)	1100	802.44	72.9
4	Fishing Effort(Hooks)	5000	4715	94.3
5	Catch(T)	14000	10846	77.5
6	Institutional trainee Days	1500	1836	122.4
7	Post Institutional trainee days	3000	2586	86.2
IV. Revenue of the Institute		65 (in lakhs)	14473094 (Number)	222.7 (Percent)

CHAPTER 11

FISHERIES INSTITUTES



NATIONAL FISHERIES DEVELOPMENT BOARD (NFDB)

1. History of the Institution

The National Fisheries Development Board (NFDB) was established in 2006 as an autonomous organization under the administrative control of the then Department of Animal Husbandry, Dairying and Fisheries, Ministry of Agriculture and Farmers Welfare (now Department of Fisheries, Ministry of Fisheries, Animal Husbandry and Dairying), Govt. of India. The Board was set up to realize the untapped potential of fisheries sector in inland and marine, fish culture, capture, processing & marketing of fish, and accelerate the overall growth of fisheries sector with the application of modern tools of research & development. Since inception, NFDB has taken up numerous developmental activities which have improved the fish production, productivity and post-harvest & marketing facilities in the sector. Foreseeing the high potential in fishery sector, the Centrally Sponsored Scheme named as “Blue Revolution: Integrated Development and Management of Fisheries” was launched in the year 2016 with a total central outlay of Rs.3000 crore by merging all the existing schemes. In the changed scenario, NFDB is entrusted the work of scrutinizing the proposals received from the States/UTs under Blue Revolution Scheme. Besides, NFDB has been implementing some key projects directly in emerging new technologies like Cage Culture, Quality Fish Seed production of improved varieties, value chain development in fisheries etc. which have good potential. The successful implementation of these projects has resulted in wider adoption of new technologies by farmers.

2. Mandate of the Institution

- a) To bring major activities relating to fisheries and aquaculture for focused attention and professional management
- b) To coordinate activities pertaining to fisheries undertaken by different Ministries/Departments in the Central Government and also coordinate with the State/Union Territory Governments
- c) To improve production, processing, storage, transport and marketing of the products of capture and culture fisheries
- d) To achieve sustainable management and conservation of natural aquatic resources including the fish stocks
- e) To apply modern tools of research and development including biotechnology for optimizing production and productivity from fisheries
- f) To provide modern infrastructure mechanisms for fisheries and ensure their effective management and optimum utilization
- g) To generate substantial employment
- h) To train and empower women in the fisheries sector
- i) To enhance contribution of fish towards food and nutritional security.

3. Major Functions of Institution

- To focus on tapping the full production potential and enhance productivity substantially from aquaculture and fisheries resources, both in inland and marine sectors. It is targeted to achieve the growth rate of about 8% annually on a sustainable basis over a period of 5 years and to achieve the projected fish production set at 20 million metric tonnes by 2022.
- To make Blue Revolution more robust and where it is appropriate, create an inclusive business approach to build value for aqua-farmers, together with a suitable enabling environment.
- Policy and institutional orientation of private and public sectors towards aqua-farmers.
- To achieve economic prosperity of the country, the fishers and fish farmers as well as contribute towards food and nutritional security through full potential utilization of water resources for fisheries development in a sustainable manner, keeping in view the bio- security and environmental concerns.

4. Major Initiatives & Achievements during the last 5 years

NFDB has taken up various initiatives to popularize new and innovative technologies emerging in the field so as to improve fish production & productivity in the country. NFDB has collaborated with various ICAR-Fisheries Research Institutes, CSIR-CSMCRI, RGCA-MPEDA, Central Agricultural Universities, State Fisheries Universities in demonstration of new & innovative technologies, popularization of new and improved fish varieties, upscaling the technologies for commercial production, species diversification, quality management, disease surveillance. NFDB has implemented various schemes to promote cage culture in reservoirs, disseminated new and improved fish varieties, wetland development, seaweed cultivation, ornamental fisheries, setting up of quarantine facilities, establishment of Aquatic Animal Health Laboratories, provide extension services through setting up Aqua One Centres through reputed organisations. After the launch of Blue Revolution scheme, NFDB has been specifically entrusted to take up the Skill Development programmes. The achievements made under various activities are elucidated below:

(i) Cage Culture

For integrated development of cage culture in reservoirs, a total of 3820 cages in various reservoirs were sanctioned in the States of Maharashtra, Madhya Pradesh, Gujarat, Bihar and Manipur.

For Demonstration of Open sea cage culture, a total of 270 cages were sanctioned to ICAR- CMFRI, Mandapam and Tamil Nadu Jayalalitha Fisheries University, Nagappatinam. For demonstration of brackishwater cage culture in the States of Kerala, Karnataka, Maharashtra and Andhra Pradesh, a total of 1570 cages were sanctioned to ICAR-CMFRI.

(ii) Dissemination of Improved and New Fish Varieties

NFDB under Quality Seed Programme has disseminated improved and new fish varieties (Jayanti Rohu, Improved Catla and Amur Carp) in collaboration with 34 nos. of KVKs and 13 nos. of Aqua One Center (AOC) firms covering an area of 1016 ha in 18 States namely Andhra Pradesh, Assam, Arunachal Pradesh, Bihar, Gujarat, Maharashtra, Manipur, Punjab, Uttar Pradesh, West Bengal, Rajasthan, Telangana, Odisha, Kerala, Tripura, Jharkhand, Tamil Nadu and Karnataka. Besides inputs for fish seed rearing units was provided in 159.79 ha.

(iii) Indian Major Carp Milt Cryo-bank for improving Genetic Exchange Between Farms and producing

Commercial Level Quality Fish Seed Basic facility for cryo-storage of carp milt on large scale has been established at ICAR-NBFGR, Lucknow. This includes Liquid Nitrogen Vapour Storage System (capacity: 8000 numbers of 2.0ml cryovial), Dry shippers for air transportation of carp milt, 1000L Liquid Nitrogen Storage Tank (1 no.), 11L transportation can (40 nos).

Ten in-house training programs (hatchery operators/ progressive farmers from 21 states) at NBFGR, Lucknow and 13 fields training at 4 states (Odisha, West Bengal, Bihar and Uttar Pradesh) were completed. Total 353 hatchery operators/prospective farmers were trained. The farmer level, easy to understand manual in English and hindi is prepared and distributed to the trainees, in-house and on farm demonstrations.

During the year 2019, for 13 hatcheries located at 4 states (Uttar Pradesh, Bihar, West Bengal and Odisha), the cryopreserved Indian major carp milt was supplied from ICAR-NBFGR, Lucknow and fertility trails were conducted using eggs from the female IMC brooders of hatchery origin with milt from the Bureau. A total of 37.2 lakh spawn was produced using frozen sperm under this demo.

(iv) Wetland Fisheries Development

NFDB initiated Wetland Development Programs in 2017-18 on a pilot basis in collaboration with ICAR-Central Inland Fisheries Research Institute (CIFRI), Barrackpore for development of 4 beels in Bihar namely Majharia, Kararia, Sirsa and Rulhi having a total water spread area of 390 ha. Another 4 beels were added in 2018-19 for upscaling the programme comprising of Kothia beel of 60 ha area in Bihar through ICAR-CIFRI, Rupaibali beel of 92 ha in Assam through Assam Fisheries Development Corporation (AFDC) and Nalban & Goltala beels of 275 ha in West Bengal through State Fisheries Development Corporation (SFDC), and the work is continuing.

(v) Seaweed Cultivation

Seaweed cultivation is considered as one of the priority areas for fisheries development in India, for the benefit of coastal fisher folk, especially the fisherwomen.

NFDB has sanctioned a project to CSMCRI, Bhavnagar on Demonstration of large-scale cultivation of *Gracilaria dura* along Simar coast of Gujarat by 162 farmers in 400 tube nets/longlines of 25m length. Demonstration was done in five phases. A manual entitled "Handbook on Farming of *Gracilaria dura*" was published in April, 2019.

In order to promote seaweed cultivation along the Ramanathapuram coast of Tamil Nadu, by using improved quality of seed material, NFDB has sanctioned a project to Department of Fisheries, Government of Tamil Nadu for sea weed cultivation of *G.edulis* and *Kappaphycus alvarezii* on 2400 rafts and 4400 rafts respectively by 170 SHG groups (510 fisherwomen). Two projects were sanctioned to CSMCRI, Mandapam for production and supply of seed material of *G.edulis* and *Kappaphycus alvarezii*, to the seaweed farmers of the above project.

(vi) Backyard RAS for Fish Culture: Innovative Project on High Density Fish Culture under RAS Mode

NFDB in collaboration of National Centre for Aquatic Animal Health, Cochin University of Science and Technology implemented a project on backyard Re-circulatory Aquaculture System. A total of 77 nos. of Backyard RAS units were set up by 51 beneficiaries, mostly women in Kerala. Further, 64 units were sanctioned to 34 beneficiaries in Telangana in the first phase. A demo unit of backyard RAS was set up at NFDB campus, Hyderabad.

(vii) Paddy cum Fish Culture

NFDB sanctioned Paddy-cum-Fish Culture projects as a livelihood project on pilot basis in Manipur and Arunachal Pradesh during 2018-19 under the technical guidance of the State Fisheries Departments. The project not only help in increasing the paddy yield, but also contribute greatly towards nutritional security and economic upliftment. The project act as a demonstration and encourage other farmers in the village and the neighbouring villages to take up similar activities.

(viii) National Surveillance Programme for Aquatic Animal Diseases (NSPAAD)

The objectives Achievements under this projects are to (i) improve the collection of information on the distribution and occurrence of aquatic animal diseases, (ii) Rapid Detection of new and emerging pathogens and (iii) implementataion of national information management system for aquatic animal diseases of national concern.

A National Aquatic Animal Diseases Diagnostic Manual has been published on behalf of DADF under NSPAAD. This contains information on all the prioritized diseases including 22 finfish, 13 crustaceans and 6 molluscan diseases. For strengthening the passive surveillance system in the country A total of 518 awareness programmes have been organized involving about 26104 stakeholders. A total of 67 trainings involving 1591

officers /research scholars have been organized to strengthen their diagnostic capability. To observe the occurrence of endemic pathogens, a total of 1780 disease cases have been investigated by different collaborating centres. About 2000 farms located in 151 districts have been monitored twice per crop. Seven new/emerging diseases have been reported for the first time from the country. These are (i) Goldfish haematopoietic necrosis disease, (ii) Koi sleepy disease, (iii) Infectious myonecrosis, (iv) Tilapia Lake Virus Disease (v) Infection with *Enterocytozoon hepatopenaei*, (vi) *Epitheliocystis* and (vii) Red sea bream Iridovirus disease. Besides, Infection with *Perkinsus olseni* has been detected in a new host i.e. farmed *Perna viridis*

The programme has been successful in developing a strong network of aquatic animal health laboratories and scientific manpower with basic skills in surveillance and aquatic animal epidemiology tools. The programme has resulted in significant improvement in diagnostic capability for detection of OIE/NACA-listed and emerging aquatic animal pathogens. NSPAAD has assisted in better understanding of disease situation in aquatic animals in the country and has reached to the stage where it can identify diseases that are present in the country and those that are absent.

(ix) Human Resource Development (HRD)

NFDB has collaborated with various Central Fisheries Research Institutes, other Central Organisations, State Fisheries Universities, KVKs for imparting training to fishers, fish farmers, women, State Fisheries Departmental officials on various aspects of fisheries. Various types of training programmes such as 3-day skill development programmes, 5-day Training of Trainer (ToT) programmes, 25 day long duration programmes as per QPs prescribed by ASCI, Deep sea fishing programmes, workshops, RPL programmes, one day awareness programmes on avoiding usage of antibiotics in shrimp farmers etc were funded by NFDB. On an average, about 19800 fishers/ fish farmers including Departmental officials were trained on various aspects such as fish seed production, composite fish culture, RAS, brackishwater aquaculture, Deep sea fishing, ornamental fisheries, seaweed cultivation etc.

(x) Development of Integrated “Fish Market and Price Information System (FMPIS)” For Indian Fisheries Sector

Fish Market Price Information System (FMPIS) has been initiated by NFDB to promote trading of commercially important fish species across the country. FMPIS facilitates better marketability (fisher/seller) and accessibility (consumer/buyer) of fish. The FMPIS Dashboard has been inaugurated by the Hon'ble Union Minister for Fisheries, Animal Husbandry & Dairying at NFDB, Hyderabad on 7th September, 2019. The Phase-I of the programme is covering 84 Fish Markets in seven States namely Telangana, Maharashtra, Andhra Pradesh, Kerala, Tamil Nadu and Puducherry.

(xi) Aquatic Quarantine Facility:

Aquatic Quarantine Facility at Chennai, the first of its kind in the country, is funded by NFDB and established by MPEDA-RGCA to ensure the SPF status of imported brood stock of shrimp *Litopenaeus vannamei*. Six additional cubicles are being constructed during the current year such that the cumulative capacity increases to accommodate 7,33,400 nos. of brood stock to support the growing demand of *L. vannamei* seed and ensure sustained development of shrimp aquaculture in the country.

(xii) Aquatic Animal Health Laboratories (AAHL):

NFDB has been setting up Aquatic Animal Health Laboratories (AAHLs) in strategic locations under both public and private sectors to provide effective disease diagnosis and pond health management support services to

aqua farming community. NFDB has supported 12 Aquatic Animal Health Labs in 7 States namely Bihar, Andhra Pradesh, Tamil Nadu, Manipur, Assam, Tripura and Telangana; they will serve as focal centres for collecting and providing information on disease outbreaks to the National Surveillance Programme for Aquatic Animal Disease (NSPAAD) programme.

(xiii) Aquatic Animal Health & Quality Testing Laboratory (AAH&QTL):

As in other farming systems, diseases are a major threat causing severe economic losses. Often, fish farmers use banned antibiotics, pesticides and toxicants to control various types of diseases and also use some preservatives. These practices violate the 'Food Code' or 'Codex Alimentarius' and accumulation of their residues not only adversely impacts consumers' health but also results in rejection of export consignments.

To address this issue, NFDB established an in-house 'Aquatic Animal Health and Quality Testing Laboratory' (AAH&QTL) at Hyderabad to analyse and monitor the residues of aquaculture drugs, environment contaminants, etc. in shrimp, scampi, freshwater fish, hatchery seed and feed samples received from fish farmers, hatchery operators, processing industry, markets and other stakeholders and to provide molecular and microbiological diagnostic services to fish farmers following standards laboratory protocols.

(xiv) Indian Ocean Tuna Commission (IOTC) - 23rd Session The 23rd Session of the Indian Ocean Tuna Commission (IOTC) was hosted by the Government of India, Ministry of Fisheries, Animal Husbandry & Dairying at Novotel Convention Centre Hotel, Hyderabad, India, from 17 to 21 June 2019. The 16th Session of the Compliance Committee, the 16th Session of the Standing Committee on Administration and Finance and the 3rd Session of the Technical Committee on Management Procedures were held in conjunction with the Commission Meeting from 9th to 16th June, 2019. The meetings were attended by delegates from 32 countries. The National Fisheries Development Board organised the above event.

(xv) Events/ Campaigns Organised by NFDB

a) National Fish Festival at Necklace Road, Hyderabad

A 3-day National Fish Food Festival was organized by the NFDB at People's Plaza, Necklace Road, Hyderabad from 7th to 9th June, 2019. Different varieties of fish, shrimp, crab, squids and snail dishes were prepared and served to the visitors during the Fish Festival. Major restaurants, Govt. Organization, entrepreneurs, Women SHG's, individuals, etc., participated in the event by setting up stalls to popularize consumption of fish and fish products.

b) National Fish Festival at New Delhi

A 3-day National Fish Food Festival was organized at Rajpath Sitting Park, Opp. India Gate, New Delhi from 26th to 28th April 2018. The event was inaugurated by Ms. Rajni Sekhri Sibal, IAS, Secretary, Department of Fisheries, Ministry of Fisheries, Animal Husbandry & Dairying, Govt. of India in the presence of Ms. I. Rani Kumudini, IAS, Chief Executive, NFDB and Shri. Sagar Mehra, Joint Secretary (Fy), DoF, MoF&AD, Govt. of India. There were 15 stalls, with 8 participants from major restaurants, Govt. Organization, entrepreneurs to popularize consumption of fish and fish products. Different varieties of fish and shrimp dishes were prepared and served to the visitors. The fish food festival attracted huge crowd. This was the first Fish Festival organized after the formation of Department of Fisheries.

c) National Fish Festival, Coimbatore

A 3-day National Fish Food Festival was organized by the NFDB at Sashtri Ground, R.S. Puram, Coimbatore, Tamil

Nadu from 26th to 28th July, 2019 to popularize consumption of fish and fish products. The event was inaugurated by Mr. Mohana Sundaram, Additional Director, Department of Fisheries, Govt. of Tamil Nadu. There were 14 participants represented in 16 stalls, with participation from 2 Govt. organizations, 4 restaurants, 6 Fishermen Cooperative Societies and 2 ornamental fish entrepreneurs. Different varieties of fish, prawn, crab & lobster dishes were prepared and served to the visitors. Apart from that fresh fish, dry fish and ornamental fishes & accessories were sold during the 3-day event. Around 3000 kg of fish and fish products were sold during the event. The fish food festival attracted huge crowd.

d) World Fisheries Day

On 21st November 1997 at New Delhi working fishermen and women from all over the globe came together to get unified on the occasion of World Forum of Fish Harvesters & Fish Workers. On that day, the World Fisheries Forum (WFF) was established and fishing representatives from 18 countries signed a declaration advocating for a global mandate of sustainable fishing practices and policies.

To commemorate this day, 21st November is celebrated every year as World Fisheries Day. The Department of Fisheries in the Ministry of Fisheries, Animal Husbandry and Dairying celebrated world fisheries day at NASC Complex in New Delhi on 21st November 2020. It was the first time Ministry, during the event, awarded best performing States in the Fisheries Sector for 2019-20.

Fisher folks in India, where it is widely celebrated, also demonstrate the importance of maintaining the fisheries of the world along with highlighting the problems like overfishing and mechanization. World Fisheries Day also explores finding solutions to the increasingly interconnected problems that the world is facing to follow sustainable models of our ocean ecosystems.

WORLD FISHERIES DAY 2019, NEW DELHI

The Department of Fisheries, Ministry of Fisheries, Animal Husbandry and Dairying, Government of India celebrated the World Fisheries Day on 21st November 2019 at NASC Complex, Pusa, New Delhi. The Hon'ble Union Minister for Fisheries, Animal Husbandry and Dairying, Shri Giriraj Singh participated as the Chief Guest while Hon'ble Ministers of State for Fisheries, Animal Husbandry and Dairying, Dr Sanjeev Balyan and Shri Pratap Chandra Sarangi participated as the Guests of Honour.

During the event, the Government of India felicitated 19 nos. of outstanding fish farmers, aqua-preneurs & fisher folks in recognition to their accomplishments in the field and their contribution into the growth of the sector. During the event, some of the progressive farmers have also shared their experiences in fish farming. The Hon'ble Union Minister has released a booklet on 'Aquaculture Technologies Implemented by NFDB' and four posters on (i) Tilapia culture, (ii) Shrimp farming, (iii) Pangasius culture and (iv) Carp culture in ponds. Around 600 fishers, fish farmers, officials from Fisheries Departments across the nation participated in the event apart from officials, scientists, professionals, entrepreneurs and stakeholders

WORLD FISHERIES DAY 2020, NEW DELHI

Department of Fisheries in the Ministry of Fisheries, Animal Husbandry and Dairying took initiative to celebrate the Day in order to motivate and facilitate different stakeholders contributing towards the upliftment of fisheries sector of the country. NFDB coordinated with the Department of Fisheries for organizing the event. The Hon'ble Minister of State for Fisheries, Animal Husbandry & Dairying Shri Pratap Chandra Sarangi, Chief Guest inaugurated the World Fisheries Day, 2020. The event was attended by Dr Rajeev Ranjan, Secretary, Dept. of Fisheries, Ministry of Fisheries, Animal Husbandry & Dairying; Dr C. Suvarna, Chief Executive, NFDB; Dr. Jujjavarapu Balaji, Joint Secretary (Marine Fisheries), Department of Fisheries; and Shri Sagar Mehra, Joint Secretary (Inland Fisheries), Depart of Fisheries, besides Commissioner & Secretary of Fisheries to Govt. of Tamil Nadu, Assam, Odisha and Telangana, Directors of Fisheries, State officers

and farmers.

The Chief Guest of the event, Shri Pratap Chandra Sarangi, Hon'ble Minister of State unveiled the logo and website dashboard of the Pradhan Mantri Matsya Sampada Yojana. The Hon'ble Minister of State for Fisheries, Animal Husbandry & Dairying Shri Pratap Chandra Sarangi also released four publications: Mission Action Plan- Cold Water Fisheries Development, Quality Seed Production, Regulatory Framework, Standard Certification and Traceability in Fisheries. He also released the six booklets on "Recent Trends on Aquaculture" published by NFDB namely Marine Fish Culture, Bio-floc Fish Culture, Recirculatory Aquaculture System, Murrel Culture in Ponds, Trout Culture in Raceways, Trout Culture in Recirculatory Aquaculture System. He also released five booklets published by FSI namely Survey of Tuna in EEZ, Extension Activities of FSI, Record of rare species, Scientific contribution of FSI's Scientist Vol-I&II.

WORLD FISHERIES DAY 2021, Bhubaneswar Odisha

The Department of Fisheries, Ministry of Fisheries, Animal Husbandry and Dairying, Government of India and National Fisheries Development Board, celebrated the 'World Fisheries Day' on 21st November 2021 at Rail Auditorium, Mancheswar, Bhubaneswar Odisha. Union Minister for Fisheries, Animal Husbandry and Dairying, Shri Parshottam Rupala, Minister of State for Fisheries, Animal Husbandry and Dairying Dr. L. Murugan, Shri Jatindra Nath Swain, Secretary, Fisheries, Dr. C. Suvarana, Chief Executive, NFDB, Shri Sagar Mehra Joint Secretary (Fisheries) Government of India, Shri R. Raghu Prasad, Commissioner & Secretary, Govt of Odisha graced the occasion. Department of Fisheries, Odisha and Various State Officers of Dept. of Fisheries and other associated Departments/Ministries, Fish-Farmers, Fishermen, fish farmers, entrepreneurs, stakeholders, professionals, officials and Scientists from across the nation will also be participating in the event.

During the event, awards for best performing States for 2020-21, Inland, Marine, Hilly & North-eastern region, best district for Inland, Marine, Hilly & North-eastern region, Best Quasi Government Organization/ Federation/ Corporation/ Board in Inland, Marine, Hilly & North-eastern region. Besides, there will be award felicitations to best Fish Farmer (Inland, Marine and Hilly & NE Region), best Hatchery (Fish, shrimp and Trout Hatchery), best Fisheries Enterprises, best Fisheries Co-operative societies/FPOs/SHGs, best Individual Entrepreneurs, best Innovation idea/Technology Infusion were given.

WORLD FISHERIES DAY 2022, Daman

The World Fisheries Day, 2022 has been scheduled to be celebrated at Daman on 21st November, 2022.

CENTRAL INSTITUTE OF FISHERIES NAUTICAL & ENGINEERING TRAINING (CIFNET)

1.0 Introduction

The Government of India, in 1959 constituted a committee on "Fisheries Education", for assessing the manpower requirement and to suggest measures for providing trained manpower for boosting the fishery developmental activities. CIFNET, the erstwhile Central Institute of Fisheries Operatives (CIFO), was thus established in 1963 at Kochi on the recommendation of above committee to meet the trained manpower needs of ocean going fishing vessels and that of fishing industry. Subsequently, a unit of CIFNET was established in Chennai in 1968 and another unit at Vizag in 1981 to cope up with the additional requirements due to expansion of fishing fleet/industry of the country. Since then, CIFNET is serving the nation by creating trained manpower needed for manning the fishing vessels.

Objective

- To create technical manpower for the operation of Ocean going /Deep sea fishing vessels.
- To create trained manpower to manage fishery establishments.
- To provide training for technical teachers for manning the fishermen training centers attached to Maritime States and Union Territories.
- The Institute has also expanded its mandate for training the fishermen of the coastal states and Union Territories through capacity building training programme under Blue Revolution/Pradhan Mantri Matsya Sampada Yojana(PMMSY).
- To conduct studies on fishing craft, fishing gears and equipments and provide extensive training to accelerate advancement in fishing technology for enhancing productivity of fishermen and increasing marine fish production.
- To help developing nations in the South-east Asian, Middle east and African regions to create technical manpower for development of Marine Fisheries.

3.0 CIFNET vision

To impart quality training in order to upgrade skills, prevent obsolescence, develop healthy constructive attitude with focus on competitiveness to meet the challenges of the fishing and the mercantile marine fields.

4.0 CIFNET Mission

"Develop skilled man power for deep sea fishing" (Trained man power-nation's power)

Significant Contributions made to Fisheries Sector since Inception of CIFNET

5.0 Significant Contributions made to Fisheries Sector since Inception of CIFNET

CIFNET launched a month long skill development training programs for the Fishermen of A&N Islands on 15.03.2022 under PMMSY Scheme, organized in association with Department of Fisheries, Andaman & Nicobar Administration and Fishery Survey of India, Port Base, at Fish Landing Center, Junglighat, Portblair. Shri. G. Sudhakar, IAS, Secretary (Fisheries), UT of A &N Islands inaugurated the programme. Shri. Vinay Kumar Jindal, Danics, Joint Secretary (Fisheries) was the Guest of Honour during the inaugural function. Shri. A.K. Choudhary, Director, CIFNET briefed the activities of CIFNET, Cochin and the plan of action for conducting 11 Nos. of trainings in the entire Islands during from 15.3.2022 to 16.4.2022. Dr. Utpal Kumar Sar, Director of Fisheries and Dr. Vinod Kumar Madumala, Zonal Director, FSI, Portblair base also addressed the gathering. Dr. C Babu, Sr.Instructor(Fishing Technology) from CIFNET welcomed the gathering and the programme ended with a vote of thanks by Shri. M Rajavel, Sr.Instructor(Training)of CIFNET.

Details of Fishermen Training at Andaman And Nicobar Islands during 2021- 22

S.N	Name of The Course	No of participants	Period		Centre at Andaman
			From	To	
1	Longline fishing and tuna handling on board	40	15.3.22	17.03.22	Junglighat
2	Defect rectification and maintenance of boats	33	15.3.22	17.03.22	Guptapara
3	Longline fishing and tuna handling on board	40	23.3.22	25.03.22	Guptapara
4	Defect rectification and maintenance of boats	40	23.3.22	25.03.22	Panighat
5	Longline fishing and tuna handling on board	40	28.3.22	30.03.22	Nimbutala Rangat
6	Communication & Navigation equipments on board fishing vessel	40	28.3.22	30.03.22	Mayabandar
7	Longline fishing and tuna handling on board	40	31.3.22	02.04.22	Diglipur
8	Communication & Navigation equipments on board fishing vessel	38	31.3.22	02.04.22	Diglipur
	TOTAL	311			

FISHERMEN TRAINING AT ANDAMAN AND NICOBAR ISLANDS





Capacity building training for fishermen in Long lining and Tuna handling

In order to develop the skill required for Fisheries to operate Deep sea vessels in tapping the Tuna resources, CIFNET has designed and conducting the Special Training Programme on “Capacity Building in Deep Fishing and Onboard Handling of Tuna” in collaboration with NFDB, FSI, NIFPHATT and Tamil Nadu Fisheries regularly from 03.01.2017 onwards, to develop such skill for Fishermen of Palk Bay Coast of Tamil Nadu. Details of the course conducted from 03.01.2017 in different batches as shown below.

Details of Capacity building training for fishermen in Long lining and Tuna handling 2021- 22

Duration		Training Centre			Total
From	To	Kochi	Chennai	Vizag	
06.09.2021	11.09.2021	-	20	-	20
13.09.2021	18.09.2021	-	19	-	19
20.09.2021	25.09.2021	-	22	-	22
27.09.2021	02.10.2021	-	20	-	20
04.10.2021	09.10.2021	-	-	6	6
20.10.2021	25.10.2021	-	10	-	10
24.01.2022	29.01.2022	-	-	20	20
21.02.2022	24.02.2022	15	-	-	15
28.02.2022	04.03.2022	23	-	-	23
TOTAL (2021-22)					155
-:NIL information					



Fishermen on board the vessel gaining practical training during the Capacity Building in deep sea fishing and onboard handling of tuna conducted at CIFNET, Kochi from 28.02.22 to 05.03.2022 for fishermen from Maharashtra.



A batch of Tamil Nadu fishermen (8 Nos) (Training at CIFNET Chennai) sailed onboard the vessel M.V.Tharangini for practical training under "Capacity building in Mono filament long line and Tuna handling onboard" from 15.09.2021 to 18.09.2021.





Capacity building training programme for fishermen on “Monofilament longline and Tuna Handling onboard” is being conducted at CIFNET Unit Chennai for 20 fishermen of Tamil Nadu from 06.09.2021 to 11.09.2021.

Short term courses for fishermen of coastal states under PMMSY scheme

Foreseeing the immense potential for development of fisheries and for providing focused attention to the sector, the Government of India in May, 2020 approved the “Pradhan Mantri Matsya Sampada Yojana (PMMSY) – A scheme to bring about Blue Revolution through sustainable and responsible development of fisheries sector in India. PMMSY will be implemented in all the States and Union Territories for a period of 5(five) years from FY 2020-21 to FY 2024-25. During the period April 2021 to March 2022 under report the following programmes were conducted by CIFNET under PMMSY exclusively for the Fishermen.

In house Training Programme for Fishermen under PMMSY

Expertise, training facilities and infrastructure facilities of CIFNET were also gainfully utilized for conducting short term training programmes to the fishermen. Various skill development Training programme for the Fishermen under PMMSY were conducted during the period under report. A total of 203 fishermen trained through in house training programme.



Short term Fishermen training program on “Maintenance of Boat engine and fishing practice” under PMMSY was conducted for 20 nos of fishermen of Andhra Pradesh from 19.01.2022 to 21.01.2022 at CIFNET Unit, Visakhapatnam.

6.0 A brief about the training courses conducted at CIFNET

Organized training in the field of Fishing gear technology & fishing Technique, Seamanship & Navigation, Marine Engineering, Refrigeration, Electrical engineering & Electronics are being conducted at CIFNET since its inception at Cochin during 1963 and the subsequent Units at Chennai (1968) and Visakhapatnam (1981). The details are furnished in the concerned table.

6.1. REGULAR COURSES

6.1.1. Degree course -Bachelor of Fishery Science (Nautical Science) [BFSc(NS)]

The BFSc (NS) course, offered by CIFNET from the academic year 2005-06 is a 4-year (Semester) professional degree programme mainly concerned with study of fisheries, nautical science, operation of fishing vessels etc. This programme has an exhaustive curriculum designed to provide profound practical knowledge on various aspects of the fishing and nautical sciences. This Degree course is affiliated to Cochin University of Science and Technology (CUSAT), Kochi. The course is duly recognised by University Grants Commission (UGC) and DG Shipping Mumbai. The selection of the candidates for this course is through All India Common entrance examinations conducted by CIFNET.

The BFSc(NS) course aims to prepare candidates for the Competency Certificate Examination (COC), initially as Mate of Fishing Vessel and subsequently as Skipper of Fishing Vessel. The passed out students are eligible to apply for various posts under the Kerala Fisheries subordinate service like Assistant Fisheries Extension Officer, Fisheries Officer, Fisheries Assistant in Kerala State Fisheries Department as per the Kerala Gazette Notification G.O(P) No.16/2020/F&P dated 24.06.2020. They are eligible to apply for the post of Instructor (Seamanship & Navigation) in CIFNET. The passed out candidates are also employed with institutes like CMFRI, CIFT, CIBA, Customs etc.

6.1.2. NCVT courses-Vessel Navigator course (VNC) & Marine Fitter course (MFC)

Vessel Navigator Course(VNC) and Marine Fitter Course (MFC) framed under Craftsman Training Scheme (CTS) of National Council of Vocational Training (NCVT), recognised by DGT, MSDE, New Delhi with NSQF Level 5. The courses are designed by CIFNET and commenced from 2006 with intake capacity of 16/year per batch and subsequently increased to 20/year per batch now. The selection of the candidates for this course is through All India Common Entrance Examination conducted by CIFNET. On completion of these courses they are eligible to undergo post-institutional training like Junior Deckhand/Engine Room Assistants/Apprenticeship Fitter. Thereafter they are eligible for appearing Certificate of Competency (CoC) examinations of Mate of Fishing Vessel, Skipper Fishing Vessel, Engine Driver Fishing Vessel and Engineer Fishing Vessel conducted by Mercantile Marine Department after acquiring required sea service. The passed out VNC/MFC candidates are employed with CIFNET, FSI, CIFT, UT of Lakshadweep, IOC, Port Trust, Customs, ITBF, Naval Dockyards, L&T etc. in various categories.

6.2. Ancillary course-Shore Mechanics Course (SMC)

The course was started as per the demands from various Fisheries Departments for manning the Marine Workshops and shore establishments. The course is of one year duration with an intake capacity of minimum 10 candidates. The course is being continued as per the sponsorship of UT Lakshadweep Administration/ Pondicherry. The passed out candidates are employed with UT Lakshadweep Administration/Pondicherry in various categories.

6.3 Statutory courses&refresher courses

These courses are conducted to meet the training requirements of Technical and certified personnel such as Skipper, Mate of Fishing Vessels as per M.S.(Amendment) Act 1987. The statutory courses namely Elementary Fishing Technology Course (EFTC) of 2 months duration and Advanced Fishing Technology Course (AFTC) of 2 weeks duration are conducted as per demand for the candidates appearing for CoC examination, D.G. Shipping as M S Act. The Refresher courses of 1 month duration are also conducted as per the demand from candidates for appearing CoC examinations in order to gain theoretical and practical knowledge in Nautical and Engineering subjects.

6.4 SHORTTERM COURSES

6.4.1 Short term courses for fishermen (In-House)

The Institute arranges short term courses for the benefit of the Fishermen which are conducted at the institute according to the convenience of the fishermen during the off-season. The courses are conducted to the possible extend in vernacular language. The following main courses by which the fishermen are benefited.

- Basic of seamanship, Navigation, Marine Electronic Equipments, Operation & Maintenance of Engines on board fishing boats.
- Capacity Building in Deep Sea fishing and onboard Handling of tuna
- Fishing technology and responsible fishing.

6.4.2 Short term extension courses for fishermen (Out Reach)

CIFNET also render its service to the fishermen by organising a series of extension programmes at fishermen centres. These outreach programmes are mobilized during every year in collaboration with respective State Fisheries Departments. Some of the extension programmes are as follows:

- Fabrication of square mesh cod end
- Safety of life at sea
- Operation and maintenance of engines onboard

6.4.3 Short term Courses for professionals from sister Organisations

The Institute also conducts special short-term courses on specific request from other sister organisations like Coast Guard, MPEDA, CIFT, State Fisheries Dept.etc. in Fisheries, Nautical and Engineering disciplines. The course modules are specially designed to suit the requirement of such organisations. The following are some of such short term courses conducted:

- Fishery Technology Course for Indian Coast Guard
- Trainer's Training Course on Fishing Vessel Registration (for State Fisheries Department)
- Trainer's Training Course on "Navigation, Marine Electronic Equipments and Marine Engines (for State Fisheries Department)

6.4.4 Short term Training programmes for college students and VHSS

The Technical expertise, training and infrastructure facilities of CIFNET are being utilised to the optimum level by conducting various short term training programmes for the students fraternity during last few years. On job training skill development programme is being conducted for the VHSS students. The Graduates, Post Graduates students and students of the Engineering Colleges, ITI / ITC had the opportunity to attend these specially designed sandwich programmes and were able to absorb gainful practical knowledge.

9. Training Programmes proposed under PMMSY through short term courses

This programme is newly designed for skilling/training of the fishermen by reaching to the fishing villages/fishing harbours by the CIFNET. The training aids and accessories are taken to the respective places of outreach training programme which are planned in coordination with fishery associations/officials, local bodies of the fishing villages/ grama panchayat. The extension programme under PMMSY will be given maximum importance under 5 year Action Plan



CIFNET Unit, Chennai



CIFNET Unit, Visakhapatnam



MV Prashikshani



M V Tharangini



M V Skipper II



Inflated life raft demonstration



Fishermen training on monofilament longlining



Students at Microbiology lab



Class in the Navigation simulator



Onboard navigation training



Chart work practicals

National Institute of Fisheries Post Harvest Technology and Training (NIFPHATT)

The history of National Institute of Fisheries Post Harvest Technology and Training (NIFPHATT) dates back to October 17th 1952 when a tripartite agreement was signed by the Government of India, Government of Norway and the United Nations which resulted in the establishment of Indo-Norwegian Project (INP) for fisheries, area and fishermen community development at Neendakara in Quilon, Kerala. In 1963 the facilities developed at Neendakara, Kannur, Karwar and Mandapam were handed over to the respective State Fisheries Department and the Headquarters was shifted to Kochi. On the expiry of the agreement with Govt. of Norway in 1972, the administration of the project was completely taken over by the Govt. of India and the project was renamed as Integrated Fisheries Project (IFP) under the Ministry of Agriculture. As per the recommendations of cadre review committee, certain divisions of the Institute were transferred to sister organizations, mandates were modified and renamed IFP as National Institute of Fisheries Post Harvest Technology and Training (NIFPHATT) during the year 2008.



A retrospective on INP and IFP

During the pre-independence and independence era, the Indian scenario on agriculture production, fisheries and animal husbandry was very grim. All the developments happened during the past several decades in the above mentioned fields in India can very well be attributed to the initiatives such as Indo-Swiss, Indo-Norwegian projects etc., by the great visionaries of India during those days.

Fisheries infrastructure and technology were rudimentary at that time. The fish production in India during 1940's & 50's could in no way be comparable to that of the present day production levels. The artisanal level of fishing by the fishermen community was just sufficient to meet their daily subsistence. Excess catch if any could only be converted to manure or discarded. The introduction of mechanized fishing in India, initiated by the Indo-Norwegian Project and taken up by the industry, opened a new chapter in the marine fish production. Now marine products have risen to the level of earning the biggest share in foreign exchange (\$6.7 billion 2019-20) from agriculture sector.



Mechanization in fishing has brought in other concerns such as handling of fish landings in bulk. This has led to the introduction of modern preservation methods. Acceptance of several such non conventional fish varieties and fishery products or preservation techniques by the consumers was another achievement worth mentioning.

Popularization of fishery products, importance of fish handling & preservation and spreading the message of fish as a safe and healthy food was another service carried out by this Institute. Now the present generation may wonder to know that there was a time, when iced fish was considered as second grade or even semi spoiled one. Consumer's mindset was attuned to accept nothing less than freshly caught fishes. The interior areas were forced to satisfy with dried /cured fish. For several decades, a similar reluctance for accepting frozen fishery products also existed. Even during eighties or early nineties, customers were much sceptical on trying them. Canned fishery product's case was also not different. Canned and frozen products have good acceptability among fish consumers now.

The customer attitudes have not changed overnight or naturally happened, but through intentional and well focused awareness programmes. NIFPHATT as a pioneer Institute in the field of fisheries in India can very well boast to have played a small but a very significant role in Indian fisheries development. The objectives of this Institute have been redefined, fine tuning to meet the requirements of the changed scenarios in the sector. Now more focus is given to product development and popularization, human resource development and gender development through tools like training programmes and consultancy services.

Certain initial milestones

- Fishermen community & Area development
- Introduced mechanization and motorization in marine fishing sector in India
- Survey & Mapping of resources along south-east & south-west coasts

- Introduced deep sea fishing techniques such as long lining, purseseining, deep sea trawling, gillnetting etc. as a part of exploratory and experimental fishing
- Established refrigeration plant and cold storage facilities
- Developed diversified value added marine products and processes
- Popularized the diversified fishery products in rural and urban markets in different parts of the country and created awareness among processors and consumers
- Established marine workshop and slipway/dry docking facilities for fishing trawlers
- Established fully equipped electronic and electrical sections
- Established life raft-servicing station and got it duly recognized by the Mercantile Marine Department
- Led the Antarctic expedition in the polar vessel Sagar Sampada for the exploration of the Krill resources
- Popularized and promoted fish as healthy food
- Created a cadre of fish processing experts through imparting hands-on training and exposure to the students of food technology particularly fisheries.
- Conducted training programmes on Post harvest technology, repairs and maintenance of fishing gears
- Implemented Coastal community empowerment programmes with special reference to Gender

Current Mission & Mandates

1. Post harvest technology up-gradation and its transfer to beneficiaries such as rural fishermen community, small scale industries, export processing houses and students through consultancy, job work and training
2. Value added product development by way of process and product diversification from all varieties of fish including low value, unconventional and seasonally abundant fishes
3. Imparting training in the field of post harvest technology, refrigeration technology, Quality control and value added products
4. Providing consultancy services and training for rural development programmes/ women empowerment programmes in fish processing, supporting local fish farmers, self-help groups of fishermen community, fishermen's cooperative societies functioning under Panchayathi Raj
5. Popularization and test marketing of value added products from fish varieties including low value, unconventional species and seasonally abundant fishes
6. Extension of the activities through popularization and test marketing of value added products to new areas and develop markets in all states in a phased manner with added attention to rural areas and enthrusing entrepreneurs to enter into sea food processing industry

FISHERY SURVEY OF INDIA (FSI)

History of the Institute

The Fishery Survey of India was established in 1946 as a pilot project known as Deep Sea Fishing Station (DSFS) by the Government of India with the objective of augmenting food supply through development of deep-sea fishing. Later, Offshore Fishing Stations (OFS) were established in 1957 and 1958 under the control of DSFS. Thereafter, the institute was graduated to the status of a survey institute in the year 1974 under the name Exploratory Fisheries Project (EFP) with the Bases known as Offshore Fishing Stations in all the maritime states. The objectives of the exploratory fishing were charting of fishing grounds, training of fishing operatives and testing commercial possibilities of deep sea fishing were assigned. With the changing developmental needs of the marine fishery sector and the growing data requirements in the context of EEZ declaration in 1976, the institute has undergone major structural and functional transformations. In 1983, it was re-organised and upgraded as a national institute, the Fishery Survey of India. Subsequently, it was recognised as Science and Technology Institute in the year 1988. Consequent to the re-organisation, the institute was amplified, enlarged and upgraded the scope and contents of its functions and activities. The Institute has thus, emerged as the Nodal Fishery Institute in India with the primary responsibility of marine fisheries resources survey, assessment and monitoring in the Indian Exclusive Economic Zone (EEZ) and adjoining seas for promoting sustainable exploitation and management of the fish stocks.

Presently the institute is in the administrative control of Department of Fisheries, Ministry of Fisheries, Animal Husbandry and Dairying since 2019 with a survey fleet of 11 deep sea vessels operating from seven operational Bases viz., Mumbai, Mormugao, Cochin, Porbandar on the west coast and Chennai, Visakhapatnam and Port Blair on the east coast in order to accomplish the mandate of the Institute.

Vision

To augment the fish production and fishermen income through exploration of new and untapped fishery resources and fishing grounds, while ensuring the sustainability of the resources and ecosystem.

Mission

Become a “Centre of excellence” for fishery exploration and assessment to ensure new and sustained fishery resources availability to the fishermen, thereby providing cheap protein rich food for the citizens and raw materials for the industry; meeting the geo-referred data requirements of the fisheries management authorities of the nation and international Organisations.

1. Mandate

The FSI is a sub-ordinate institute under the Department of Fisheries, Ministry of Fisheries Animal Husbandry and Dairying for carrying out the survey, assessment and monitoring of the marine fishery resources of the Indian EEZ within the framework of a well defined mandate. The mandate of the Institute is tuned from time to time to match the developmental activities of the fisheries sector as well as to meet the national and global requirements.

- Exploratory surveys, charting of fishing grounds, assessment of fish stocks in the Indian EEZ and adjoining high seas and research thereof, besides the specific surveys on request from the States and the Union Territories.
- Data collection and periodic re-validation of potential of fishery resources to provide advice on fishery management issues enshrined in the national, regional and global conventions and agreements and other associated activities.
- Monitoring survey of fishery resources in the exploited areas including coral reefs, application of Monitoring, Control and Surveillance (MCS) for regulating fishing activities and promoting Code of Conduct for Responsible Fisheries (CCRF) in the Indian EEZ.
- Maintain Data Bank and disseminate information on fishery resources to the end - users and act as an interface between the State/UTs and the Ministry of Fisheries, Animal Husbandry and Dairying, Government of India for Marine and Inland fish production and related aspects.
- Assessment of suitability of fishing gear, accessories and equipment with special reference to the preservation of environment and ecology of marine habitat.
- Fish stock identification and biodiversity studies including application of genetic tools and techniques.
- Marine fisheries forecasting including application of Remote Sensing for the benefit of Artisanal, Mechanized and Industrial sectors.
- Human Resources Development through the practical training of fishing operatives, fishermen, fisheries officials and students.

2. Major Achievements & contributions

- Survey and stock assessment of marine fishery resources of Indian Exclusive Economic Zone (EEZ) covering all the maritime states and Uts.
- Biological studies of all the major resources have been carried out for fisheries management and conservation.
- Depth-wise, area-wise biomass estimates for important resources were made.
- Located perch resources all along Karnataka and Kerala coast between 70-150 m depth zone and also in Andaman waters.
- Located deep-sea prawn and lobster grounds off Kerala and Gulf of Mannar.
- Discovered new lobster grounds in Quilon bank and off Ponnani during the period 1999-2004.
- Introduced Perch traps for exploitation of perch resource dwelling in the rocky fishing grounds.
- Systematic survey of the fishery resources of Wadge bank and Gulf of Mannar started during 1990's were continued.
- Rich Shrimp grounds in the Sand heads off West Bengal and off Paradip, Odisha were located.
- Rich Indian mackerel grounds were located along the Odisha coast in 50-150 m depth.
- Mid water / pelagic trawling undertaken along the upper east coast of India showed encouraging results.
- Demersal resources survey of Andaman waters was conducted and located the availability of spear lobster (*Linuparus somniosus*) for the first time in Indian waters.
- Deep sea shrimps fishing grounds identified by FSI forms one of the major exporting fishery resources from the A&N Islands.
- Feasibility of hand line fishing for demersal resources in the shelf area of A&N Islands was established by FSI.
- Introduced resource-specific diversified techniques like trap fishing, long lining etc.
- Popularized demersal trawling technique in Indian waters.
- Bottom set vertical longline gear for perch resources were established by FSI.
- FSI developed Lobster traps and trained the fishers onboard to use of these traps.
- The computerization of the data collected by the exploratory survey vessels of the FSI was commenced in the eighties. At present FSI data bank holds about 82,000 records and about 100 records are added annually.
- Location of potential resources of tunas and bill fishes, sharks were identified and published as Atlas for the benefit of fishermen and stake holders.
- Special drive Survey programmes such as preliminary surveys in the continental slope during 1997 – 2002, demersal fishery resources surveys of Andaman & Nicobar waters in 2008 & 2019, survey and assessment of oceanic and allied tuna resources around the Lakshadweep islands and Skip jack and Yellow-fin tuna by Pole & Line fishing in Lakshadweep and Andaman & Nicobar waters were implemented.
- Modified Deep Long Line (MDLL) gear for Big eye tuna resources was established in the Union Territory of A & N Islands.
- Drift long line gear using light sticks for Sword fish resources were established in A&N Islands.
- Preliminary survey of Skipjack and Yellow-fin tuna by Pole & Line fishing in A&N waters.
- Located of skip jack tuna grounds off Mangalore and Lakshadweep.

- Introduced and established feasibility of multifilament and monofilament tuna logline fishing by locating productive tuna grounds in Lakshadweep and the Indian EEZ.

3. Other Achievements

a. Technology introduced

- Purse seining in 1980 for pelagic resources survey.
- Squid jigging by deploying the vessel MFV Matsya Sugundhi.
- Pot fishing for harvesting Cephalopods targeting Octopus spp.
- Tuna tagging for Yellow fin and Skipjack tuna during 2005 – 2006 with the support of IOTC to understand the tuna migrations in Indian Ocean in order to locate the tuna stocks for sustainable exploitation.
- The scheme of Conversion of Shrimp Trawlers to Tuna Long Liner in 2005 was entrusted by the Govt. of India by providing subsidy. Fishery Survey of India was instrumental in the conversion of these shrimp trawlers to monofilament longliners and provided all the technical and scientific support.
- The Marine Engineering Division (MED) at Kochi is having facilities of dry-docking, slip way, life raft station, jetty and providing services to the fishing industry, Indian Coast Guard and Indian Navy at an affordable cost and revenue is being generated.

b. Publications

- Based on the survey findings the FSI has brought out Resource Information Series (Quarterly), Meena news (Quarterly), Bulletins, Occasional papers and Special publications, Cruise reports and Research papers.
- The FSI has been assigned with the Revalidation of marine fisheries stock potential in the Indian EEZ and accordingly in 1991, 2000, 2010 and 2018 Revalidation of marine fisheries stock potential in the Indian EEZ was carried out and reports has been published.
- Handbook on Fisheries Statistics is being published in association with the Ministry of Fisheries, AH&D.

c. Extension programmes

- Workshop, Open Houses, Marine Exhibition Street plays and Fishermen Rallies are being regularly for the benefit of the fishermen / fisherwomen, boat owners, NGOs working in fishery sector, students and policy makers.
- Dissemination of survey findings also being done through Doordarshan, All India Radio.
- Participation in Kisan Mela, Krishi Unnati mela, Agriculture and Fish Expo for disseminate the information collected through surveys by putting up an exhibition stalls.
- Awareness on CCRF is being provided among Fishers/Stakeholders for conducting responsible fishing practices, propagating and encouraging fishermen to diversify fishing effort to deep sea fishing.

d. Academic interest

- The FSI has been recognized as a research institute by various Universities for research leading to Ph.D., & Masters Degree in Science. Scientists of FSI were also recognized by these universities as the research guides for Ph.D., and M.Sc., degree courses.

e. Marine census

- As per the Ministry's assignment of carrying out marine census in Island groups, accordingly, during the years 2005, 2010 and 2015 FSI has successfully conducted Marine Census for the Lakshadweep and Andaman & Nicobar Islands in co-ordination with the Fisheries Departments of the UTs.

f. Training

- Onboard Training Programmes conducted on Monofilament / Multifilament Tuna Longlining sponsored by National Fisheries Development Board (NFDB), Hyderabad, Maritime States/ UTs and Puducherry under the FIMSUL – II Project funded by the World Bank.
- Training to the Fishermen and Stakeholders of Maritime States/ UTs on fishing techniques, navigational, sea safety equipments etc.
- In-Vessel training to the CIFNET Trainees is being provided regularly enabling them to achieve required skill and sea service for the competency examination as certified officers by Mercantile Marine Department (MMD) both on Engine side and Decksides.

g. Collaborative research

- Remote Sensing and Fishery Forecasting in collaboration with SAC and ISRO has engaged in the development of resource specific fishery forecast models using Ocean Satellite derived data on ocean colour (Chlorophyll) and Sea Surface Temperature (SST).
- FSI had undertaken various International and institutional projects in collaboration with Indian National Centre for Ocean Information Services (INCOIS), GEF/UNDP/IMP, Indian Ocean Tuna Commission (IOTC), ICAR, DOD, CMFRI, MoEF, SAC-ISRO, CMLRE, MoES etc.
- Implemented Centrally Sponsored Scheme (CSS) as per the directives of the Ministry, accordingly, the FSI had conducted various programmes in order to strengthen data collection and fish taxonomy.

h. Linkages with national and international agencies

- FSI is the designated Nodal agency of the Government of India to meet the research and data requirements of the Indian Ocean Tuna Commission (IOTC) as part of India's international obligation. The IOTC provides technical and scientific support and training to the member countries to expand their tuna fishing activity in the Indian Ocean.
- The FSI has been associated with Bay of Bengal Large Marine Ecosystem (BOBLME) since 2003.
- The FSI has been representing various committees for policy formulation and planning.
- FSI has vital linkages with several national and international agencies / institutions associated with ocean studies and fisheries development.

i. Other activities

- Assistance being rendered to Fishing Industries as and when required.
- Assistance also being rendered for Surveillance support regularly to the Indian Navy and Indian Coast Guard while out at sea.
- The FSI was entrusted with the responsibilities of acquiring the catch statistics of LoP vessels and analysis of raw data and subsequent submission to Ministry for the LoP vessels data base for future record. Accordingly, during the period 2003-2015, this task was accomplished.

OPERATIONAL BASES AND SURVEY VESSELS

The survey fleet of the Institute comprised of 11 vessels.



MFV Matsya Vrushti



MFV Matsya Nireekshani



MFV Matsya Varshini



MFV Matsya Drushti



MFV Matsya Varshini



MFV Lavanika



MFV Matsya Drushti



MFV Samudrika



MFV Matsya Shikari



MFV Matsya Darshini



MFV Blue Marlin

Fishery Survey of India (HQ) and Base Offices



FSI Head Quarters and Mumbai Base
Sassoon Dock, Colaba, Mumbai – 400 005



Mormugao Base
Opp. Microwave Towers, Mormugao – 403 803



Cochin Base
Kochangady, Kochi- 682005



Chennai Base
Fishing Harbour Complex, Chennai – 600 013



Visakhapatnam Base
Fishing Harbour, Visakhapatnam – 530 001



Port Blair Base
Post Box No.46, Port Blair – 744 101

CENTRAL INSTITUTE OF COASTAL ENGINEERING FOR FISHERY (CICEF)

1. ABOUT CICEF

The Central Institute of Coastal Engineering for Fishery (CICEF), formerly known as Pre- Investment Survey of Fishing Harbours (PISFH) is a premier institution of the Government of India established in January 1968 with its jurisdiction covering the entire Indian coastline for conducting engineering and economic investigations and preparing the Techno Economic Feasibility Reports (TEFRs) for the Fishing Harbour projects. Being a subordinate office of the Government of India, Department of Fisheries, Ministry of Fisheries, Animal Husbandry and Dairying the Institute is playing a pivotal role in assisting the maritime States/UTs in extending the necessary technical support in conducting engineering and economic investigations and preparing the TEFRs of the FH projects. The costs of these projects are shared by the Department and the respective maritime State governments/ Union Territories (UTs) as per the norms of centrally sponsored scheme (CSS) which is in vogue since 1966-67.

Vision

To be a technology driven, scientifically and professionally managed consulting organization and to transform itself as a Centre of Excellence for the creation and development of fishing harbours (FHs) / fish landing centres (FLCs)

Mission

Create world class fishery engineering services and state-of the art technology for the development of fishery related infrastructure projects on demand from coastal State Governments, UTs, Port Trusts and other Public/ Private Sector undertakings.

Objectives

- Carry out reconnaissance surveys/ pre-feasibility studies to identify priority sites for development of fishery harbours, follow it up by detailed engineering and economic investigations and prepare TEFRs.
- Conduct post-construction evaluation of existing FHs/FLCs.
- Provide technical advice on engineering and economic aspects wherever required for the development of fishery harbours and fish landing centres.
- Monitor the progress of construction of ongoing fishery harbours and fish landing centres sanctioned under the Centrally Sponsored Scheme in association with the Ministry of Fisheries, Animal Husbandry and Dairying.

2. ACHIEVEMENTS OF THE INSTITUTE

The achievements of the Institute are mainly in respect of development of FHs/FLCs, identifying new FH/FLC sites under Master Plan development, creation of coastal aquaculture farms, besides scrutiny of project proposals received from Coastal states/UT administration which are summarised below.

2.1 Development of FH/FLC projects

The core expertise and experience of the Institute lies in the subject matter of developing FHs/FLCs for which the organization was set up under the aegis of FAO-UN/SIDA technical assistance. The Institute till the end of June 2020 had carried out engineering and economic investigations for the development of FHs/FLCs at 104 sites and prepared TEFRs for 120 sites, besides rendering technical assistance to maritime States/UT Administrations in the scrutiny and finalization of TEFRs. On the basis of TEFRs prepared and submitted by the Institute and technical assistance rendered to maritime States/UTs, the Government of India and Maritime State Governments/UTs under the various schemes have developed 7 major fishing harbours and 83 minor fishing harbours by the end of June, 2020. Out of these, construction of 7 major fishing harbours and 47 minor fishing harbours have been completed and the remaining are under various stages of construction. The Institute periodically monitors the progress of construction of FH projects in association with the Government of India.

2.2 Master Plan for development of FHs/FLCs

The Institute has taken up the task of identifying potential sites and preparation of Master Plan reports for development of FHs/FLCs in all the maritime States/UTs. It has so far identified 117 fishery harbour sites comprising of 14 major and 103 minor fishery harbours suitable for development, prepared detailed master plan reports and submitted to the respective maritime States/UTs and Government of India.

2.3 Coastal aquaculture farms and hatchery projects

The Institute has so far reconnoitered 66,218 ha of coastal aquaculture farm area and investigations were carried out in 15,584 ha, spread over the maritime States of Gujarat, Maharashtra, Goa, Kerala, Tamil Nadu, Andhra Pradesh, Orissa and West Bengal. During the period 1986 to 1991, this Institute developed 4 pilot coastal aquaculture farms and one shrimp seed hatchery under the FAO/UNDP assistance.

Nominated by the World Bank as a Nodal Agency for the development of coastal aquaculture farms under the World Bank assisted Shrimp and Fish Culture project, this Institute has carried out survey and sub-soil investigations at 13 sites covering a total area of 9,640 ha in the States of West Bengal, Orissa and Andhra Pradesh. TEFRs were prepared in respect of 10 sites covering a total productive pond area of 3,826 ha. Out of the TEFRs prepared in respect of 10 sites, construction of six shrimp farms totaling about 792 ha of water spread area were completed during 1992-99 and trial culture operations carried out. Of these 6 project sites, 4 are located in West Bengal, namely Canning, Dighirpar, Digha and Dadanpatra Bar, one project at Jagatjore/Banapada in Orissa and one project at Bhairavapalem in Andhra Pradesh. However, owing to wide spread shrimp diseases and strict enforcement of environmental guidelines/regulations in the coastal aquaculture farms/hatcheries, the culture practices in shrimp farms and hatching in hatchery projects received a great setback not able to recover fully till date.

3 FUTURE CHALLENGES

The main mandate of the Institute is to develop FHs/FLCs to enable the fishing boats operating in the country reckoned at 2,70,050 which includes 65,876 traditional craft, 1,36,920 motorised traditional craft and 67,254 mechanised boats including deep sea vessels. India has a long coastline of 8,118 km covering 9 maritime States and 4 UTs. The mechanized fishing boats including the motorized/ non-motorized traditional craft need major/minor FH and FLC facilities for fish landing, outfitting, idle-berthing and repair. And they need other waterside and landside harbour infrastructure facilities for operational convenience and post-harvest handling of fish and prawn catches under hygienic conditions.

However, the fact remains that the FH/FLC facilities developed so far in the country are capable to meet the requirements of only about 54.10% of the total mechanised fishing boats operating in the country. As of now, nearly 46% of the total mechanised boats i.e., about 30,867 are operating without any harbour facilities. In order to provide FH facilities for these 30,867 boats, over 60 - 75 FHs need to be developed in all the maritime States/UTs. It is, therefore, obvious that enormous efforts are required to be made for the development of FHs which in turn requires this Institute to undertake survey, investigation and preparation of project feasibility reports.

Owing to overcrowding of fishing boats, poor management and maintenance of the FH infrastructure in the country, the fish hygienic conditions and sanitation standards have met with all-time ebb and being severely criticized by the fish importing countries. As such, for the implementation of HACCP/EU norms for fish hygienic standards and to meet the requirement of export inspection agency of Government of India, this Institute is presently assisting the maritime State governments/UTs, and National Fisheries Development Board (NFDB) in the upgradation/renovation of existing FH facilities in the country and the country need to go a long way.

In addition to the above, this Institute is required to scrutinize the FH project feasibility reports prepared by various government/private consultancy organizations engaged by the State governments. On behalf of the Department, these reports are examined thoroughly in this Institute and detailed technical observations/comments are prepared on engineering and economic aspects of the report to enable the Department of Fisheries, Government of India in the decision-making process and sanctioning of projects for development and financial assistance. Further, the Institute has so far played a pivotal role in identifying potential sites, conducting necessary investigations and preparation of TEFRs for the development of FHs and there is need for the Institute to continue the unfinished tasks in the years ahead.

COASTAL AQUACULTURE AUTHORITY (CAA)

The Coastal Aquaculture authority (CAA) was established under the Coastal Aquaculture Authority Act, 2005 and notified vide Gazette Notification dated 22nd December, 2005. The main objective of the Authority is to regulate coastal aquaculture activities in coastal areas in order to endure sustainable development without causing damage to the coastal environment. The Authority is empowered to make regulations for the construction and operation of aquaculture farms in coastal areas, inspection of farms to ascertain their environmental impact, registration of aquaculture farms, fixing standards for inputs and effluents, removal or demolition of coastal aquaculture farms, which cause pollution etc. One of the major tasks accomplished by the CAA was the registration of shrimp farms on the recommendations of the State and District Level Committees constituted for this purpose. It is mandatory that all persons carrying on coastal aquaculture shall register their farm with the Coastal Aquaculture Authority. Registration is made for a period of five (5) years, which can be renewed further. The registration process would be continued in respect of new farms as well as farms that may be renovated for taking up coastal aquaculture activities in future

Registration of Coastal aqua farms:

- Totally 1,179 shrimp farms with total farm area of 1,251.74 ha (Water Spread Area – 855.02 ha) were registered from June, 2019 to May, 2020. Altogether 39,705 shrimp farms with total farm area of 61,044.89 ha (Water Spread Area - 41,624.70 ha) received from State Level Committees/District Level Committees of states were registered since inception to till May, 2020.

Renewal of Registration of Coastal aqua farms:

- During June, 2019 to May, 2020, 1248 farms with total farm area of 2,460.55 ha (WSA – 1,713.50 ha) were renewed. Total Renewal of registration of 7,973 farms with total farm area of 15,000.49 ha (WSA – 10,507.21 ha) were done from 2013 till May, 2020.

Letter of Permission for Culture of SPF L. vannamei:

- A total of 2575 Letter of Permissions (LoPs) with total farm area of 12,460.52 ha (WSA – 8,388.13 ha) were registered since inception (August-2009) to May, 2020.

Empaneling of SPF Broodstock suppliers:

- CAA carried out the exercise of empaneling the suppliers of SPF L. vannamei & SPF P. monodon broodstock based on the genetic base and disease status in consultations with CIBA, NFDB and MPEDA. Based on the recommendations of Committee, 14 suppliers (12 suppliers for SPF L. vannamei and 2 suppliers for SPF P. monodon) were short-listed for supply of SPF broodstock to CAA permitted hatcheries.
- The Terms and Conditions for the supply of quality specific pathogen free (SPF) Broodstock and parent post larvae of shrimp by overseas suppliers to hatcheries in India and the same was placed before the 18th Technical Committee meeting held on 10.1.2020. The Committee has approved the draft Terms and Conditions. The Ministry has been requested to notify the Terms and Conditions under the provisions of Livestock Importation Act, 2001 (Act 28 of 2001) as was done for the SOP of AQF.

Approval of SPF hatcheries and Nauplii Rearing Hatcheries (NRHs):

- A total of 315 SPF L. vannamei hatcheries and 123 Nauplii Rearing Hatcheries (NRH) spread all over the coastal states were approved from 2009 till May, 2020. A total of 7,57,800 nos. of L. vananmei broodstock were permitted to import and so far, during June, 2019 to May, 2020, 2,59,009 number of broodstock has been imported from the shortlisted suppliers.
- Two hatcheries were approved to import broodstock of SPF P. monodon and its seed production.

Screening of New Viruses Decapod iridescent virus 1 or DIV1:

- In addition to OIE listed pathogens, all the empaneled exporters from abroad and the Importers in India including hatchery operators are advised to screen SPF brood stock and other live stocks including artemia cysts connected with shrimp Aquaculture Industry in India for Decapod iridescent virus 1 or DIV1 and ensure that they are free from Decapod iridescent virus 1 or DIV1 for the safety of Shrimp Aquaculture Industry in India

Update of Database:

- Data base in CAA website www.caa.gov.in hosted by National Informatics Centre, Chennai updated with new and latest information periodically.

New Regulations:

- In accordance with the decision of the Authority in its 63rd meeting, new regulations for overseas broodstock supply has been prepared to inculcate responsibilities and accountability on the part of the suppliers and importers.

Effluent Treatment System:

- The design of Effluent Treatment System and model calculation was approved by the Authority in its 63rd meeting.

The models of ETS are given below:**Aquatic Animal Health and Quality Testing Laboratory:**

- CAA has recognized the “Aquatic Animal Health and Quality Testing Laboratory” at NFDB as the National Referral Laboratory of CAA for Aquaculture under the category of Government of India laboratories to perform the following:
 - Seed Quality Analysis,
 - Disease Analysis,
 - Soil and Water Quality Analysis,
 - Quality Analysis of Aquaculture Inputs,
 - Antimicrobial Residual Analysis and
- Microbiological Analysis related to aquaculture

Memorandum of Understanding (MOU) with NFDB:

- An MOU has been entered into between CAA and NFDB for the implementation of monitoring and compliance programme for the benefit of coastal aquaculture sector in the country. CAA and NFDB intend to work together in making AAHQ laboratory for ensuring compliances of the aquaculture establishments in India. CAA intends to utilize the services of the National Referral Laboratory for its monitoring of coastal aquaculture.

Pre border quarantine requirement:

- CAA had issued an order No. 57-6/2015 Tech Vol. II dated 12.12.2019 to implement the pre border quarantine requirement of testing done not earlier than 30 days before the actual shipment for the import of SPF L. vannamei into India and the same was sent to nodal ministry for necessary amendment in the Notification.

International Collaboration:

- CAA has established contact with University of Arizona, the referral laboratory of OIE with intent to collaborate in the field of aquaculture Pathology. University of Arizona has provided a draft MoU to be executed between CAA and University of Arizona to provide guidance and technical assistance in disease diagnostics, develop therapeutics and biosecurity measures to prevent shrimp diseases. The draft has been incorporated with inputs from CAA and the same has been confirmed by the University of Arizona.

Online File Management System:

- CAA has commenced online File Management System (FMS) in an attempt to make CAA paperless environmental friendly office.

Renewal of Registration of Coastal Aqua Hatcheries:

- The Inspection Committee of CAA constituted for this purpose had inspected 185 hatcheries located at Andhra Pradesh and Tamil Nadu for renewal of registration as provided under sub para (2) of para 1 of Guidelines for regulating hatcheries and farms for introduction of SPF *Litopenaeus vannamei* issued under Annexure II of CAA Rules, 2005.

CHAPTER 12

INTERNATIONAL SCENARIO

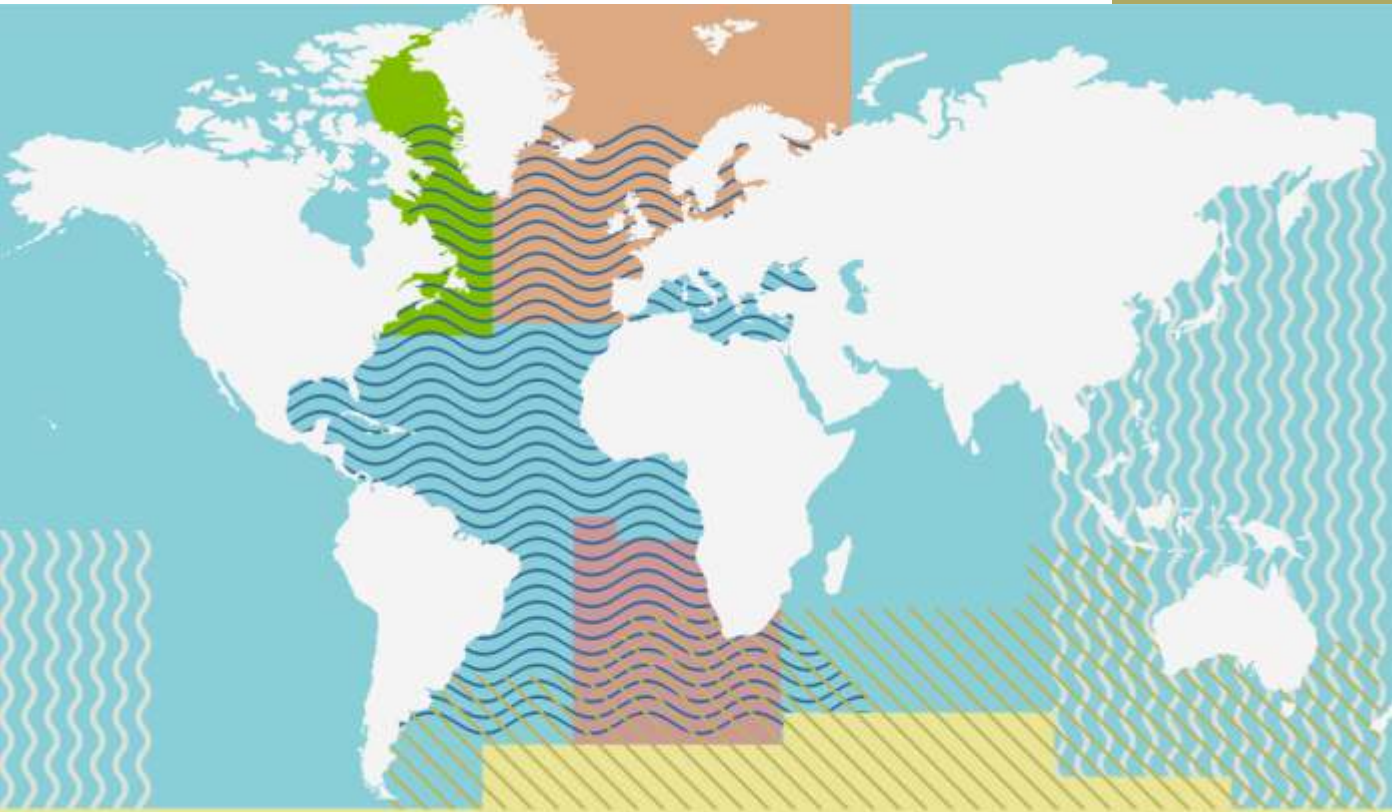


Table 12.1: Contribution of India to World Fish Production in selected years

World production (In MMT)			Contribution of India (In MMT)			
Year	Total	Marine	Inland	Total	Marine	Inland
2017	172.7	111.2	61.5	12.6	3.7	8.9
2018	178.93	115.36	63.57	13.6	3.9	9.7
2019	177.83	112.40	65.43	14.2	3.8	10.4
2020	179.00	112.00	67.00	14.73	3.5	11.23

Source: Food and Agriculture Organization (FAO), SOFIA-2022

Note: Fishery statistical data presented in the above table exclude the production for mammals, crocodiles, corals, sponges, pearls, mother – of – pearl and aquatic plants. Totals may not match due to rounding

Fig 37 : World Production (in MMT)

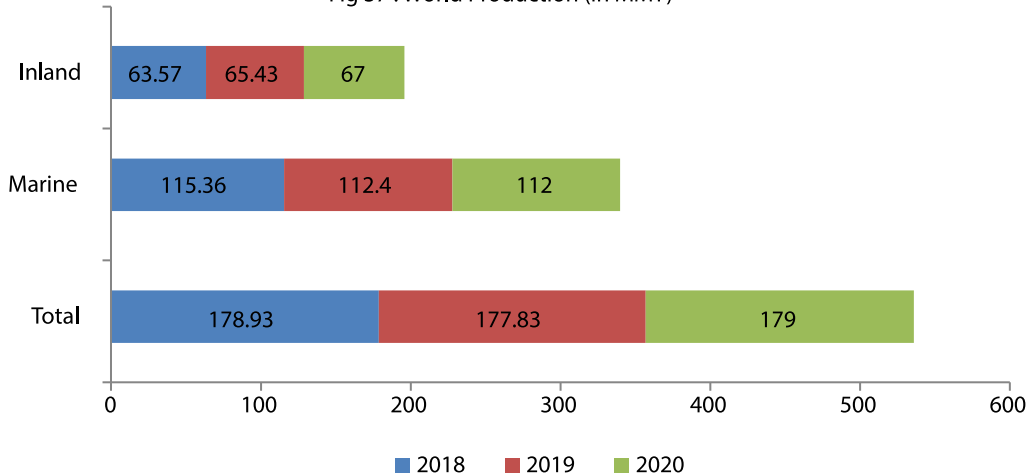


Fig 38 : Contribution of India to World Fish Production (in MMT)

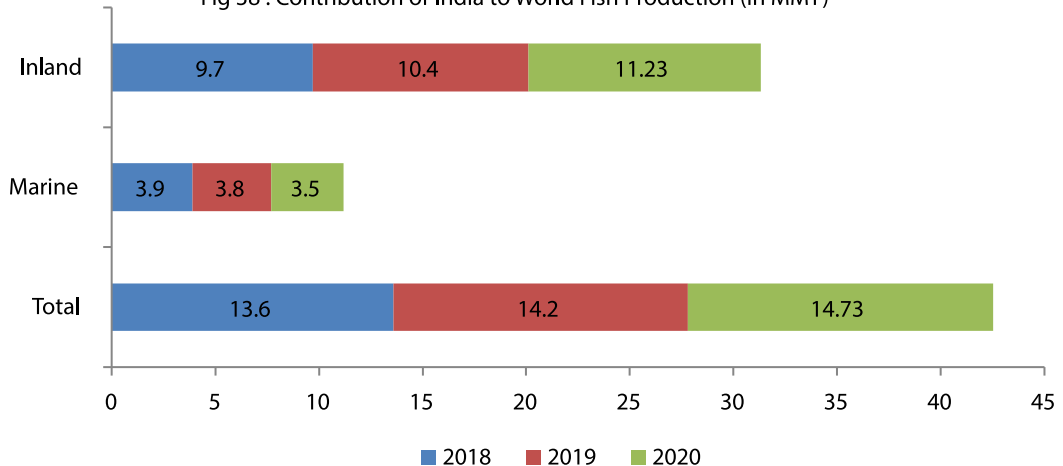


Table 12.2: Inland Waters Capture Production: Major Producing Countries and Territories

Country	2016	2017	2018	2019	2020	Percentage of total 2020
	(Million tonnes, live weight)					
Bangladesh	1.05	1.16	1.22	1.24	1.25	11
Brazil	0.22	0.22	0.22	0.22	0.22	2
Cambodia	0.51	0.53	0.54	0.52	0.41	4
Chad	0.11	0.11	0.11	0.11	0.11	1
China	2	2.18	1.96	1.84	1.46	13
Congo	0.23	0.23	0.23	0.23	0.21	2
Egypt	0.23	0.26	0.27	0.3	0.32	3
Ghana	0.09	0.09	0.09	0.09	0.09	1
India	1.46	1.59	1.7	1.79	1.8	16
Indonesia	0.43	0.43	0.51	0.52	0.49	4
Iran (Islamic Republic of)	0.09	0.1	0.1	0.1	0.1	1
Kenya	0.13	0.1	0.11	0.1	0.1	1
Malawi	0.15	0.2	0.22	0.15	0.17	1
Mali	0.1	0.11	0.09	0.11	0.12	1
Mexico	0.2	0.17	0.22	0.16	0.15	1
Mozambique	0.1	0.1	0.1	0.12	0.1	1
Myanmar	0.89	0.89	0.89	0.89	0.84	7
Nigeria	0.38	0.42	0.39	0.37	0.35	3
Pakistan	0.14	0.14	0.14	0.14	0.15	1
Philippines	0.16	0.16	0.16	0.15	0.15	1
Russian Federation	0.29	0.27	0.27	0.25	0.28	2
Thailand	0.19	0.19	0.14	0.13	0.13	1
Uganda	0.39	0.39	0.44	0.6	0.57	5
United Republic of Tanzania	0.31	0.33	0.31	0.38	0.41	4
Vietnam	0.15	0.16	0.16	0.15	0.15	1
Total 25 major producers	10.01	10.53	10.6	10.68	10.13	88
Total of all other producers	1.36	1.37	1.4	1.35	1.34	12
World Total	11.37	11.91	12	12.09	11.47	100

Source: Food and Agriculture Organization (FAO), SOFIA-2022

Fig 39 : Percentage of Inland Fish Production of Major Countries , 2020

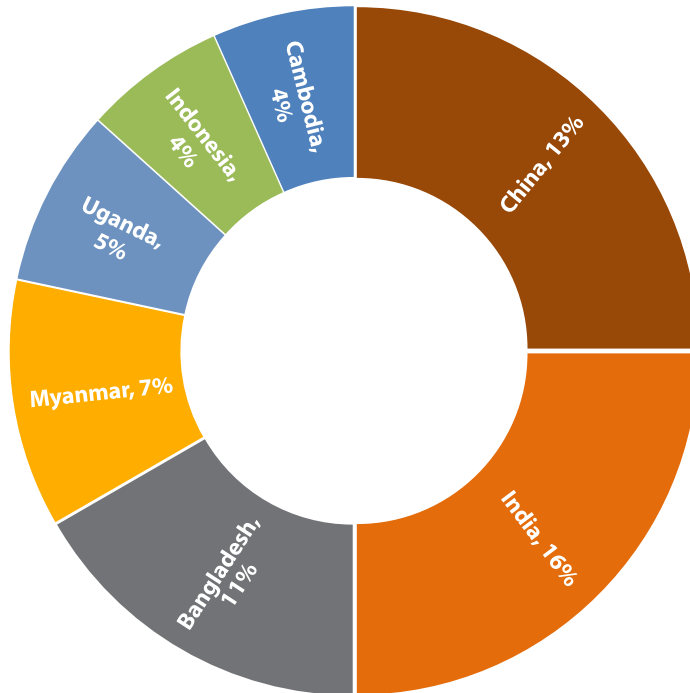


Fig 40 : Percentage of Marine Fish Production of Major Countries , 2020

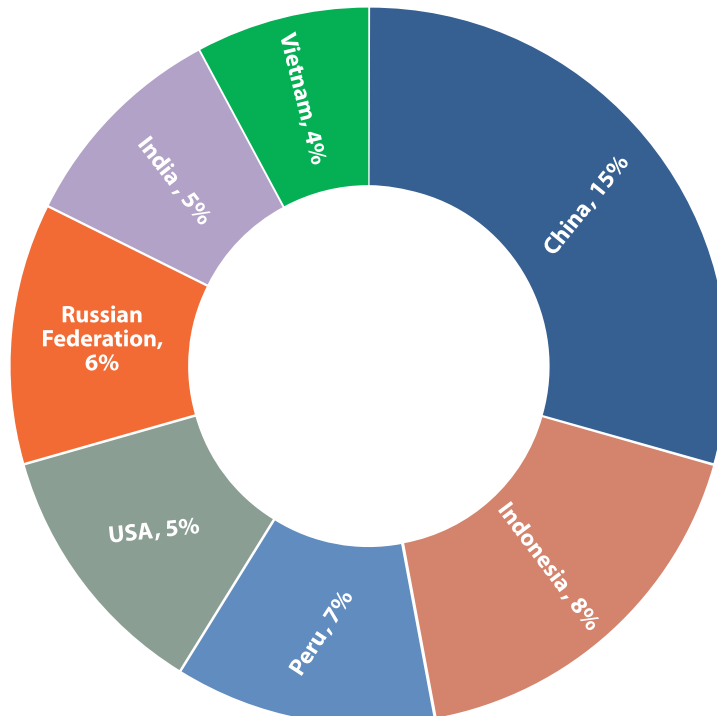


Table 12.3: Marine Capture Production: Major Producing Countries and Territories

Country	2016	2017	2018	2019	2020	Percentage of total 2020
	(Million tonnes, live weight)					
Argentina	0.74	0.81	0.82	0.80	0.82	1
Canada	0.84	0.81	0.80	0.75	0.71	1
Chile	1.5	1.92	2.37	1.98	1.77	2
China	13.78	13.19	12.87	12.15	11.77	15
Denmark	0.67	0.9	0.79	0.63	0.73	1
Iceland	1.07	1.18	1.28	1.04	1.02	1
India	3.71	3.94	3.64	3.67	3.71	5
Indonesia	6.11	6.31	6.75	6.56	6.43	8
Iran (Islamic Rep. of)	0.59	0.69	0.72	0.73	0.70	1
Japan	3.17	3.18	3.31	3.16	3.13	4
Malaysia	1.57	1.47	1.45	1.46	1.38	2
Mauritania	0.59	0.78	0.95	0.71	0.74	1
Mexico	1.31	1.46	1.48	1.42	1.35	2
Morocco	1.43	1.36	1.37	1.46	1.36	2
Myanmar	1.19	1.27	1.15	1.06	1.01	1
Norway	2.03	2.38	2.66	2.31	2.45	3
Peru	3.77	4.13	7.19	4.80	5.61	7
Philippines	1.87	1.72	1.89	1.67	1.76	2
Korea, Republic of	1.35	1.35	1.40	1.41	1.36	2
Russian Federation	4.47	4.59	4.85	4.72	4.79	6
Spain	0.91	0.94	0.92	0.88	0.80	1
Taiwan Province of China	0.75	0.75	0.80	0.75	0.75	1
Thailand	1.34	1.31	1.39	1.41	1.52	2
United States of America	4.88	5.02	4.73	4.81	4.23	5
Vietnam	2.93	3.15	3.19	3.29	3.27	4
Total 25 major producers	62.58	64.6	68.64	63.41	63.17	80
Total all other producers	15.69	16.61	16.92	16.57	15.62	20
World Total	78.27	81.21	85.56	81.49	78.79	100

Source: Food and Agriculture Organization (FAO), SOFIA-2022

CHAPTER 13

POST HARVEST INFRASTRUCTURE



Table 13.1 : Major and Minor Fishing Harbours – Outlays and Expenditure, since inception of the scheme in 1964 (₹ in Lakhs)				
Plan period	Major Harbours		Minor Harbours and fish landing centre	
	Outlay	Expenditure	Outlay	Expenditure
Third Plan	5	17	0	0
Three Annual Plan (1966-67 to 1968-69)	253	3	295	157
Fourth Plan	1350	158	600	485
Fifth Plan	1800	1210	1200	321
Annual Plan				
i) 1978-79	500	308	600	394
ii) 1979-80	550	206	0	1
Sixth Plan	1700	1320	1900	1795
Seventh Plan	1700	1684	1900	2169
Annual Plan				
i) 1990-91	492	492	432	432
ii) 1991-92	500	545	600	600
Eighth Plan	5213	4575	4675	4903
Ninth Plan*	0	0	11000	6144.96
Tenth Plan*	0	0	10000	7666.84
Eleventh Plan (2007-08 to 2011-12)*	0	0	21571.79	21571.79
12th Plan (Implemented from 2012-13 to 2016-17)*				
2012-13	0	0	5375.86	5375.86
2013-14	0	0	5234.605	5234.605
2014-15	0	0	5393.78	5393.78
Blue Revolution Scheme for new projects(2015-16 to 2019-20)				
2015-16	0	0	10076.85	10076.85
2016-17	0	0	9210	9210
Total of 12th Plan	0	0	35291.095	35291.095
2017-18	0	0	14815.0	14814.97
2018-19	0	0	29356.17	29356.17
2019-20	0	0	10273.5	10273.5
Pradhan Mantri Matsya Sampada Yojana (PMMSY)				
2020-21	0	0	6661.5	6661.5
2021-22	0	0	10433.2	10433.2
Total	14,063.00	10,518.00	161604.2	153471.025

* Includes both Major and Minor Fishing harbours

Table 13.2: Major Fishing Harbours

Port	Cost (Rs. Lakhs)*	Year of sanction	Status	Designed Capacity			
				DSV (No)	MFV (No)	Draft (m)	TL
1. Visakhapatnam							
Stage I	955.5	1975	C	90	300	4.5	1,938
Stage II	1,099.20	1978	C	No change in capacity. Stage II for additional facilities			
Stage III	454.3	1998	C	No change in capacity. Stage III for additional facilities			
Stage IV	354	2001	C	No change in capacity. Stage IV for additional facilities			
2. Chennai							
Stage I	1,334.00	1973	C	50	500	3	1,220
Stage II	850	1994	C	No change in capacity. Stage II for additional facilities			
3. Cochin							
Stage I	494	1971	C	57	450	6	560
Stage II	77.00 (100)	1993	C	No change in capacity. Stage II for additional facilities			
Modernisation	980.2	2009					
4. Kolkata							
Roychowk	370	1971	C	15	--	6	120
5. Paradip							
Paradip	2834.00 (3807)	1990	C	50	500	6	2335
6. Mumbai							
(Sasson Dock)	825 (1,099)	1977	C	--	700	3	1153
7. Petuaghat	6,092.65	2008/2010	C	50	320	3	2871

* -Figures in brackets indicate the revised cost. C - Completed/ Commissioned
UC -Under construction DSV -Deep Sea Vessels
MFV -Mechanised Fishing Vessels
TL -Total length of landing + berthing + outfitting + repair quay/wharf (in meters)

Table 13.3(A) : Fishing Harbours and Fish Landing Centres constructed / commissioned till, 2020-21*

Location	FH/FLC	Sanctioned cost (Rs. Lakhs)	Location	FH/FLC	Sanctioned cost (Rs. Lakhs)
ANDHRA PRADESH			Odisha		
Kakinada	FH	973.17	Gopalpur	FH	805.3
Nizamapatnam	FH	157.66	Dhamra	FH	70
Bhavanapadu	FH	340	Naugarh (Astrang)	FH	507
Machilipatnam	FH	470.88	Dhamara Stage-II	FH	640
Calingapatnam	FLC	60.35	Chandipur	FLC	15
Etimoga	FLC	61.57	Pathara	FLC	2.5
Baruva	FLC	83.6	Nairi Stage-I	FLC	5.41
Perupalem	FLC	88.86	Nairi-Stage-II	FLC	6
Navvalarevu	FLC	79.35	Jamboo	FLC	73.03
Chintapalli	FLC	79.77	Palaur	FLC	17
Pudimadakara	FLC	78	Kansabansa	FLC	65.1
Mukkam	FLC	79.77	Soran	FLC	9.97
Mynavanilanka	FLC	59.74	Sabelia	FLC	2.42
Vodarevu	FLC	88.86	Chudamani	FLC	14.06
Gondisamudram	FLC	85.62	Panchubisa	FLC	32.68
Isakapalli Pattapupalem	FLC	84.86	Talchua	FLC	110.7
Thatichetlapalem	FLC	79	Kharanasi	FLC	99.9
Bandaruvanipeta	FLC	81.16	Chandrabhaga	FLC	8.32
Mypadu	FLC	92.84	Rushikulya	FLC	9.4
Kothapatanam	FLC	92.47	Tantiapal	FLC	99.06
Anthervedi Pallepalem	FLC	1698	Sorala	FLC	70.28
GOA			Bandara	FLC	160.5
Cortalim	FLC	0.51	Khandiapatana	FLC	105.83
Malim	FLC	89.25	Bhusandpur Baliapatpur	FLC	108.6
Cutbona	FLC	89.2	Bahabalpur	FLC	98.04
Qortalim stage II	FLC	89.31	Kirtania	FLC	172
Chapora	FLC		Talasari	FLC	162.1
GUJARAT			Gopalpur on Sea	FLC	96
Veraval	FH	900	Nairi Stage-III	FLC	38.86
Mangrol Stage-I	FH	200	TAMIL NADU		
Porbandar	FH	276	Tuticorin	FH	210
Mangrol Stage-II	FH	701	Mallipatnam	FH	10.6
Jhakau	FH	3031	Kodiakarai	FH	14.4
jafrabad	FLC	25	Vallinokkam	FH	77
Dholai	FH	1477.7	Tondi	FH	56.56
Jakhau-I	FLC	5	Pazhayar	FH	67.32
Vansi-Borsi	FLC	16	Chinnamuttom	FH	684
Kosamba	FLC	13	Muttom(BOT Project)	FH	5392
Mandvi	FLC	16	Chinnamuttom Stage-II	FH	7352

Table 13.3 (B) : Fishing Harbours and Fish Landing Centres constructed / commissioned till, 2020-21*

Location	FH/FLC	Sanctioned cost (Rs. Lakhs)	Location	FH/FLC	Sanctioned cost (Rs. Lakhs)
Salaya	FLC	17	Thengapattinam FH	FH	9740
GUJARAT			TAMIL NADU		
Umarsadi	FLC	5	Colachal	FH	8775
Jakhau	FLC	5	Mookaiyur	FH	11390
Sachana	FLC	20	Cuddalore	FLC	12
Madhavvad	FLC	17.76	Rameshwaram	FLC	10
Surajbari	FLC	31.53	Kottaipatnam	FLC	22
Magod Dungari	FLC	38.74	Muttom	FLC	12.6
Dholai	FLC	54.66	Vallapalam	FLC	7.14
Chorwad	FLC	46.12	Vallavillai	FLC	7.5
Port Onjal	FLC	42	Nagapattinam	FLC	0.75
Rajpara	FLC	43.35	Palk Bay	FLC	1
Umargaon	FLC	1	Erawadi	FLC	26
Kolak	FLC	4.15	Poompuhar	FLC	7.87
Hirakot	FLC	0.71	Kodimurai	FLC	7.5
Navapur	FLC	0.61	Punnakkayal	FLC	132.32
Dhamlej	FLC	31	Mudasalodi	FLC	132.32
			Pulicat	FLC	132.32
KARNATAKA			Sethubavachatram	FLC	132.32
Karwar Stage-I	FH	30	Jagathapathinam	FLC	132.32
Honnavar	FH	75	Arcocuttothurai	FLC	132.32
Tadri	FH	4.59	Soliakudi	FLC	132.32
Mangalore Stage-I	FH	33	Mondapam	FLC	132.32
Malpe Stage-I	FH	426	Nagapattinam	FLC	122
Malpe Stage-II	FH	1146.7	KERALA		
Mangaloare Stage - II	FH	75	Vizhinjam stage-I	FH	208
Karwar Stage-II	FH	130	Puthiappa	FH	962.5
Kundapur	FLC	1	Munambam	FH	1167.2
Kagal Heni	FLC	0.6	Vizhinjam stage-II	FH	704
Gangolli Stage-I	FH	832	Neendakara	FH	672
Gangolli	FLC	3.7	Chombal	FH	556
Belikeri	FLC	0.99	Mopla Bay	FH	816
Keni	FLC	0.99	Thangassery	FH	1930.5
Bhatkal	FLC	6	Muthalapozhy	FH	1366
Moolky	FLC	0.1	Kayamkulam	FH	624.6
Sadasivgad	FLC	0.99	Thottappally	FH	1458.3
Belambar	FLC	0.99	Ponnani	FH	27.59
Kodibengre	FLC	55	Kasaragode	FLC	13
Hejmadikudi	FLC	95	Cannanore	FLC	1.46
Alvekodi	FLC	223.99	Neeleswaram	FLC	15
Belikeri Stage-II	FLC	67.4			
KERALA			WEST BENGAL		
Munakkadavu	FLC	19	Madanganj	FLC	9.6

Table 13.3 (C) : Fishing Harbours and Fish Landing Centres constructed / commissioned till, 2020-21*

Location	FH/FLC	Sanctioned cost (Rs. Lakhs)	Location	FH/FLC	Sanctioned cost (Rs. Lakhs)
Beypore	FLC	2.1	Brajabalapur	FLC	9.65
New Mahe	FLC	24.59	Maya Gaolini ghat	FLC	345.23
Vellayil Beach	FLC	22	MAHARASHTRA		
Vallikunu	FLC	17.9	Ratnagiri	FH	1840.5
Chettuvai	FLC	19.5	Agro	FH	414
Arthungal	FLC	32.22	Karanja	FLC	11
Ponnani	FLC	8	Navalgaon	FLC	0.03
Beliapatnam	FLC	13	Borli Mandla	FLC	0.52
Thottappally	FLC	30	Nandgaon	FLC	0.1
Cheruvathur	FLC	18	Nurad	FLC	0.03
Dharmadon	FLC	21	Theorinda	FLC	0.01
South Paravoor	FLC	24.94	Ajanala	FLC	0
Vizhinjam South	FLC	19.1	Ade-Uttambar	FLC	0.02
Vizhinjam North	FLC	19.1	Borin	FLC	0.03
Chalil Gopalpettah	FLC	25	Burondi	FLC	0.05
Quilandy	FLC	23	Bagamandla	FLC	1
Punnapra	FLC	36.8	Datiware	FLC	0.92
Kattor Pollathai	FLC	50.25	Dahanu	FLC	0.99
Thikkodi	FLC	49.25	Dakti-Dahanu	FLC	0.99
Moylakikadappuram	FLC	85.2	Khardanda	FLC	0.82
Kadapra	FLC		Ekdara	FLC	0.01
WEST BENGAL			Mandavi	FLC	0.51
Fraser Ganj	FH	452.32	Mulgaon	FLC	1.86
Digha Stage-I	FH	139	Navapur	FLC	0.2
Digha Stage-II	FH	492.52	Omni-Bhatti	FLC	0.03
Sultanpur	FH	708.16	Thurnvadi	FLC	0.16
(Diamond Harbour)			Thai	FLC	0.55
Harwood point	FH	2462	Uttob	FLC	0.02
Namkhana	FLC	7.06	Vashi	FLC	0.31
Jalda	FLC	9.5	Wadrai	FLC	0.74
New Jalda	FLC	5	Rajpuri	FLC	0.54
Kharpai	FLC	6.3	Jeevne Bundar	FLC	0.54
Kalinagar	FLC	7.13	Mahim Causeway	FLC	23.07
Bamanagar	FLC	4.18	Alibagh Koliwada	FLC	32.53
Ganeshpur	FLC	5.31	Tarkarli	FLC	53.34
Akhoynagar	FLC	3.08	Taramumbri	FLC	97.02
Junapat	FLC	9.8	Achara Peerwada	FLC	55.16
Soula	FLC	13.27	Rajpuri Koliwada	FLC	73.96
MAHARASHTRA			PONDICHERRY		
Ekdara Koliwada	FLC	38.66	Pondicherry	FH	423
Agrao	FLC	0.55	Karaikal	FH	3406.5
A & N ISLANDS			Yanam	FH	1885
Phoenix Bay	FH	67	Mahe	FLC	0.04

Table 13.3 (D) : Fishing Harbours and Fish Landing Centres constructed / commissioned till, 2020-21*

Location	FH/FLC	Sanctioned cost (Rs. Lakhs)	Location	FH/FLC	Sanctioned cost (Rs. Lakhs)
Dairy Farm (Junglighat)	FLC	368	5. Thanur(FH)	FH	4487
LAKSHADWEEP			6. Vellayil (FH)	FLC	3930.2
Kavaratti	FLC	11	7. Arthungal (FH)	FH	4939
Minicoy	FLC	15.52	8. Munakkakkadavu (FLC)	FLC	231
Agathi	FLC	5	9. Manjeshwaram (FH)	FH	4880
DAMAN & DIU & D & N Haveli			MAHARASHTRA		
Ghoghla	FLC	52.12	1. Arnala FH	FH	6156
Vanakbara	FLC	43.8	2. Mirkarwada (Ratnagiri)	FH	7180.88
ANDHRA PRADESH			3. Modernization of Sassoan Dock	FH	5217
1. Juvvaladinne	FH	28880	4. Karanja	FH	14980
2. Biyyaputhippa	FLC	1358	5. Anandwadi	FH	8844
GOA			6. Development of Mallet Bunder Mazgaon	FH	9660
1. Malim	FH	1333	ODISHA		
2. Cutbona	FH	2874	1. Penthakata	FLC	80.2
3. Chapora	FH	3705	2. Chandipur	FH	4994
4. Cortalim	FH	506	3. Dhamra (Modernization)	FH	1310
GUJARAT			4. up-gradation and modernization of fishing harbour at Paradip	FH	9975
1. Mangrol modernization	FH	614.52	TAMIL NADU		
2. 3rd Stage of Mangrol	FH	15583	1. Veerapandiapattinam	FLC	132.32
KARNATAKA			2. Poompuhar (FH)	FH	14800
1. Mangalore FH Stage- III	FH	5760	3. Kunthukal	FLC	7400
2. Malpe FH Stage-III	FH	3715	PUDUCHERRY		
3. Honnavar Stage-II	FH	4744	1. Mahe	FH	7162
4. Amadalli FH (Moder)	FH	1874	2. Puducherry FH (Up- gradation)	FH	1563
5. Gangoli FH Stagae-II	FH	10211			
6. Kulai	FH	19651			
7. Hejamadikodi	FH	13860			
8. Taining walls at Alvekodi and Tenginagundi FLCs	FLCs	8608			
KERALA					
1. Koyilandi FH	FH	6399			
2. Thalai FH	FH	3479.5			
3. Cheruvathur FH	FH	2906			
4. Chettuva FH	FH	3024			

* The figures are to be reconciled by State/UT

Table 13.4 : State-wise details of fishing harbours and fish landing centres completed/commissioned and under construction with the central assistance under the CSS

S. No.	Name of the State/ Union Territory	Notified Landing Centres	Centres taken up for development under CSS	FISHING HARBOURS			FISH LANDING CENTRE	
				Major fishing harbours commission	Minor fishing harbours		Commissioned	Under construction
					Commissioned	Under construction		
(i)	(ii)	(iii)	(iv)	(v)	(vi)	(vii)	(viii)	(ix)
1	West Bengal	66	20	2	5	-	13	-
2	Odisha	73	35	1	4	2	28	-
3	Andhra Pradesh	350	29	1	4	1	22	1
4	Tamil Nadu	301	36	1	13	-	22	-
5	Pondicherry	41	5	-	3	1	1	-
6	Kerala	204	51	1	19	3	28	-
7	Karnataka	115	28	-	10	6	12	-
8	Goa	34	9	-	-	4	5	-
9	Maharashtra	173	44	1	2	4	35	1
10	Gujarat	107	28	-	6	1	21	-
11	Daman & Diu	12	2	-	-	-	2	-
12	Andaman & Nicobar Islands	51	19	-	1	-	1	17*
13	Lakshadweep	20	3	-	-	-	3	-
	Total [#]	1547	309	7	67	22	193	19

* 4 FLCs approved under the Tsunami Rehabilitation Package (TRP). Besides, 13 FLCs under the UT plan.

Creation of infrastructure facilities at a total of 308 fishing centres against 1547 existing fishing centres in the Country has been taken up, which forms about 19.90% coverage.

Provisional, - : Nil

CHAPTER 14

FISHERIES DEVELOPMENT



DEVELOPMENT OF FISHERIES SECTOR UNDER BLUE REVOLUTION SCHEME

Table 14.1: Statement of Physical achievements under the component of Motorization of Traditional Craft (MTC) under Blue Revolution Scheme in various States/UTs during last 5 years from 2014-15 to 2019-20

S.N	Name of the States	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	76	50	100	100	100	0	426
2	Andhra Pradesh	0	0	0	500	300	0	800
3	Daman & Diu	25	0	0	0	0	0	25
4	Goa	133	0	60	48	50	0	291
5	Gujarat	733	0	100	0	0	0	833
6	Karnataka	304	386	300	219	300	0	1509
7	Kerala	0	400	0	0	0	0	400
8	Lakshadweep	0	0	0	111	111	0	222
9	Odisha	1658	0	437	900	1000	0	3995
10	Puducherry	0	0	167	0	40	0	207
11	Tamil Nadu	634	0	0	0	2600	0	3234
	Grand Total	3563	836	1164	1878	4501	0	11942

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.2: Safety of fishermen at sea Physical under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	1756	0	0	0	0	1756
2	Andhra Pradesh	1625	0	0	0	0	1625
3	Goa	0	100	0	0	0	100
4	Karnataka	0	0	0	375	0	375
5	Kerala	0	0	120	200	0	320
6	Maharashtra	224	2735	0	0	0	2959
7	Lakshadweep	0	0	0	0	35	35
8	Odisha	450	95	0	500	0	1045
9	Puducherry	0	0	0	120	0	120
10	Tamil Nadu	1667	0	0	0	4997	6664
	Grand Total	5722	2930	120	1195	5032	14999

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.3: Assistance to Traditional/Artisanal fishermen Procurement of FRP boats upto 10m OAL Physical units under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	0	0	20	15	0	35
2	Andhra Pradesh	0	0	50	100	0	150
3	Daman & Diu	0	0	0	0	0	0
4	Goa	0	25	20	15	0	60
5	Karnataka	0	24	0	30	0	54
6	Kerala	0	0	120	200	0	320
7	Lakshadweep	0	0	0	0	110	110
8	Maharashtra	0	10	0	0	0	10
9	Odisha	0	100	75	0	0	175
10	Tamil Nadu	0	100	0	200	0	300
	Grand Total	0	259	285	560	110	1214

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.4: Open Sea Cage Culture Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	0	0	7	0	0	7
2	Andhra Pradesh	0	0	318	0	0	318
3	Goa	0	0	120	0	0	120
4	Karnataka	0	60	0	0	0	60
5	Kerala	0	160	0	0	0	160
6	Maharashtra	0	5	0	100	0	105
	Grand Total	0	225	445	100	0	770

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.5: Seaweed Cultivation- Rafts sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	0	0	10	0	0	10
2	Andhra Pradesh	0	0	10000	0	0	10000
3	Gujarat	0	100	0	0	0	100
4	Karnataka	0	0	0	500	0	500
5	Tamil Nadu	0	0	0	0	0	0
	Grand Total	0	100	10010	500	0	10610

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.6: Bivalve Culture (Rafts) Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Karnataka	0	50	0	200	0	250
2	Kerala	0	0	2000	1000	0	3000
3	Maharashtra	0	20	0	0	0	20
	Grand Total	0	70	2000	1200	0	3270

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.7: Pearl Culture Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
		Physical (Unit)	Physical (Unit)	Physical (Unit)	Physical (Unit)	Physical (Unit)	Physical (Unit)
1	A & N Islands	0	0	1	0	0	1
2	Gujarat	0	1	0	0	0	1
3	Rajasthan	0	0	1	2	0	3
4	Maharashtra	0	0	0	1	0	1
	Grand Total	0	1	2	3	0	6

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.8: Introduction of deep-sea fishing vessels (24m OAL and above) under PPP mode Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	0	0	0	2	0	2
2	Andhra Pradesh	0	0	12	0	0	12
3	Daman & Diu	0	0	5	0	0	5
4	Gujarat	0	0	10	135	0	145
5	Tamil Nadu	0	0	663	0	0	663
6	Karnataka	0	1	0	0	0	1
7	Odisha	0	0	0	0	4	4
	Grand Total	0	1	690	137	4	832

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.9: Renovation of Ice Plant Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Daman & Diu	0	0	1	0	0	1
2	Karnataka	0	120	0	0	7	127
	Grand Total	0	120	1	0	7	128

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.10: Establishment of FH/FLC Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	0	0	0	2	2
2	Goa	0	1	0	0	0	1
3	Gujarat	0	0	0	0	0	0
4	Karnataka	-	0	0	1	1	2
5	Kerala	0	0	0	0	0	0
6	Maharashtra	0	3	0	0	0	3
7	Odisha	0	0	0	1	0	1
8	Puducherry	0	0	0	0	0	0
9	Tamil Nadu	0	1	0	0	0	1
10	West Bengal	0	0	0	0	0	0
	Grand Total	0	5	0	2	3	10

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying
- NIL information**Table 14.11: Ice Plants Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20**

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	60	0	1	0	61
2	Chhattisgarh	0	3	0	0	0	3
3	Goa	0	3	0	0	0	3
4	Gujarat	0	0	3	0	0	3
5	Karnataka	0	0	7	0	4	11
6	Madhya Pradesh	0	2	1	0	30	33
7	Maharashtra	0	1	4	70	0	75
8	Mizoram	0	0	2	0	0	2
9	Nagaland	0	0	0	0	0	0
10	Tamil Nadu	0	0	0	0	0	0
11	Telangana	0	0	0	30	0	30
	Grand Total	0	69	17	101	34	221

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.12: Cold Storage Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	0	0	1	0	1
2	Goa	0	3	0	0	0	3
3	Jharkhand	0	1	0	0	0	1
4	Karnataka	0	0	1	0	0	1
5	Maharashtra	0	0	2	0	0	2
	Grand Total	0	4	3	1	0	8

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.13: Ice Plant cum Cold Storage Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Jammu & Kashmir	0	25	0	0	0	25
2	Karnataka	0	78	0	0	0	78
3	Maharashtra	0	0	1	0	0	1
	Grand Total	0	103	1	0	0	104

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.14: Refrigerated/ Insulated Truck 10t capacity Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	0	0	20	0	20
2	Andaman & N Is.	0	0	1	3	0	4
3	Arunachal Pradesh	0	0	1	0	0	1
4	Assam	0	0	1	0	0	1
5	Bihar	0	0	0	100	0	100
6	Chhattisgarh	0	0	0	1	1	2
7	Daman & Diu	0	0	3	0	0	3
8	Goa	0	13	4	3	0	20
9	Karnataka	0	5	1	15	0	21
10	Madhya Pradesh	0	0	2	0	0	2
11	Maharashtra	0	0	6	9	0	15
12	Meghalaya	0	0	4	2	0	6
13	Odisha	0	0	0	7	0	7
14	Rajasthan	0	0	0	2	0	2
15	West Bengal	0	0	2	0	0	2
	Grand Total	0	18	25	162	1	206

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.15: Insulated Truck 6 t capacity Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Arunachal Pradesh	0	0	1	0	0	1
2	A & N Islands	2	0	1	1	0	4
3	Andhra Pradesh	0	10	0	0	0	10
4	Assam	1	0	1	0	0	2
5	Goa	0	6	0	0	0	6
6	Karnataka	0	2	1	35	0	38
7	Madhya Pradesh	0	0	0	0	1	1
8	Maharashtra	0	0	6	2	0	8
9	Meghalaya	0	0	4	0	0	4
10	Odisha	0	0	0	29	0	29
11	Telangana	2	0	0	0	0	2
12	Uttarakhand	1	1	0	0	0	2
13	West Bengal	0	3	2	0	0	5
	Grand Total	6	22	16	67	1	112

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.16: Establishment of Retail Fish Outlet Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	1	0	0	0	0	1
2	Andhra Pradesh	0	1	0	0	0	1
3	Assam	0	0	2	0	0	2
4	Bihar	0	0	0	9	0	9
5	Chhattisgarh	0	20	2	40	0	62
6	Himachal Pradesh	0	0	0	3	0	3
7	Jammu & Kashmir	0	0	0	0	0	0
8	Jharkhand	0	0	0	40	0	40
9	Karnataka	172	3	0	0	0	175
10	Kerala	0	50	0	0	0	50
11	Madhya Pradesh	0	20	0	10	0	30
12	Maharashtra	25	4	1	1	0	31
13	Manipur	0	0	0	0	0	0
14	Meghalaya	40	5	20	52	0	117
15	Nagaland	0	0	0	0	0	0
16	Odisha	24	0	1	0	0	25
17	Puducherry	0	0	0	0	0	0
18	Punjab	0	20	0	0	0	20
19	Rajasthan	0	1	0	0	0	1
20	Tamil Nadu	319	2	0	0	0	321
21	Telangana	1	2	0	100	0	103
22	Tripura	0	0	0	0	0	0
23	Uttar Pradesh	0	1	0	0	1	2
	Grand Total	582	129	26	255	1	993

Table 14.17: Setting up mobile/retail fish outlet (Kiosk) Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	50	0	0	0	50
2	Bihar	0	0	0	31	0	31
3	Chhattisgarh	0	0	0	5	0	5
4	Goa	0	5	4	0	0	9
5	Karnataka	0	3	1	10	0	14
6	Madhya Pradesh	0	0	2	26	0	28
7	Maharashtra	0	0	4	0	0	4
8	Odisha	5	0	0	0	0	5
9	Punjab	0	25	0	0	0	25
10	Telangana	0	0	0	50	0	50
11	Uttarakhand	0	0	0	0	4	4
	Grand Total	5	83	11	122	4	225

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.18: AutoRickshaw with Ice box units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	10	0	10	10	0	30
2	Andhra Pradesh	1	0	0	200	0	201
3	Assam	43	0	0	0	0	43
4	Chhattisgarh	0	38	10	10	10	68
5	Goa	0	20	0	0	0	20
6	Haryana	0	0	80	0	0	80
7	Jammu & Kashmir	0	20	20	0	0	40
8	Jharkhand	0	0	0	10	0	10
9	Karnataka	0	0	0	10	0	10
10	Madhya Pradesh	0	0	0	0	54	54
11	Maharashtra	0	0	7	1	0	8
12	Odisha	0	50	80	50	0	180
13	Rajasthan	0	0	0	1	0	1
14	Tripura	0	51	0	0	20	71
15	Uttar Pradesh	0	6	0	10	0	16
	Grand Total	54	185	207	302	84	832

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.19: Motor Cycle with Ice box Physical units sanctioned under Blue Revolution Scheme during 2015- 16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Assam	128	0	3	0	0	131
2	Chhattisgarh	0	166	100	200	200	666
3	Goa	0	20	20	10	0	50
4	Jammu & Kashmir	0	1016	0	0	0	1016
5	Karnataka	0	150	0	100	0	250
6	Madhya Pradesh	0	14	65	50	682	811
7	Maharashtra	0	0	11	66	0	77
8	Odisha	0	500	0	300	0	800
9	Rajasthan	0	0	0	1	0	1
10	Tamil Nadu	887	0	0	0	0	887
11	Uttar Pradesh	0	56	0	700	11	767
12	Uttarakhand	0	0	8	0	0	8
13	West Bengal	0	100	50	0	0	150
	Grand Total	1015	2022	257	1427	893	5614

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.20: Bicycle with Ice box Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Assam	1277	0	0	0	0	1277
2	Chhattisgarh	0	800	0	0	0	800
3	Jammu & Kashmir	0	0	1200	0	0	1200
4	Uttar Pradesh	0	84	0	0	0	84
	Grand Total	1277	884	1200	0	0	3361

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.21: Solar power support system Physical units sanctioned under Blue Revolution Scheme during 2015- 16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	10	0	0	0	10
2	Arunachal Pradesh	0	0	5	0	0	5
3	Assam	0	0	45	0	0	45
4	Chhattisgarh	0	0	0	10	0	10
5	Himachal Pradesh	0	4	7	2	0	13
6	Jammu & Kashmir	0	0	3	0	0	3
7	Jharkhand	0	0	0	10	0	10
8	Karnataka	0	0	0	10	0	10
9	Madhya Pradesh	0	0	0	0	3	3
10	Nagaland	0	0	0	10	0	10
11	Punjab	0	0	0	15	0	15
12	Sikkim	0	0	0	0	2	2
13	Tamil Nadu	0	4	0	0	0	4
14	Tripura	0	3	0	4	5	12
15	Uttar Pradesh	0	9	13	0	43	65
16	Uttarakhand	0	1	15	0	0	16
	Grand Total	0	31	88	61	53	233

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.22: Innovative Activities Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Arunachal Pradesh	0	0	23	0	0	23
2	Assam	0	0	1	0	0	1
3	Himachal Pradesh	0	0	0	1	0	1
4	Punjab	0	1	0	0	0	1
5	Sikkim	0	1	0	0	0	1
6	Telangana	0	0	0	1	0	1
7	Uttar Pradesh	1	0	0	0	0	1
8	Uttarakhand	1	0	0	0	0	1
9	West Bengal	0	0	1	0	0	1
	Grand Total	2	2	25	2	0	31

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.23: Saving cum Relief Assistance provided to fishers under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Bihar	10000	0	0	0	0	10000
2	Chhattisgarh	8000	6665	6666	8500	7740	37571
3	Goa	5197	5416	0	0	0	10613
4	Himachal Pradesh	4641	5092	0	2696	3717	16146
5	Karnataka	39048	0	34239	0	35757	109044
6	Kerala	197058	0	0	0	680250	877308
7	Madhya Pradesh	16143	6667	10000	15100	12318	60228
8	Maharashtra	0	2000	0	0	0	2000
9	Mizoram	0	0	0	5355	6283	11638
10	Odisha	25110	0	10000	0	5992.00	41102
11	Puducherry	27691	3333	0	37488	15379	83891
12	Rajasthan	1451	0	0	0	0	1451
13	Tamil Nadu	108031	0	0	0	0	108031
14	Telangana	1123	0	0	0	0	1123
15	Tripura	0	0	835	1000	0	1835
	Grand Total	443493	29173	61740	70139	767436	1371981

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.24: Number of Housing for fishers sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	100	0	0	0	0	100
2	Andhra Pradesh	1300	0	0	1340	1500	4140
3	Arunachal Pradesh	92	0	48	100	0	240
4	Assam	0	75	50	200	0	325
5	Bihar	0	0	0	1000	0	1000
6	Chhattisgarh	400	0	0	200	0	600
7	Gujarat	100	100	0	0	0	200
8	Himachal Pradesh	133	0	0	200	200	533
9	Jammu & Kashmir	133	0	200	200	657	1190
10	Jharkhand	1000	417	0	1000	0	2417
11	Kerala	0	167	0	132	0	299
12	Madhya Pradesh	195	167	0	0	0	362
13	Maharashtra	0	65	0	0	0	65
14	Mizoram	200	0	43	50	80	373
15	Manipur	0	0	34	0	0	34
16	Nagaland	270	0	0	0	1800	2070
17	Rajasthan	0	20	0	0	0	20
18	Tripura	250	0	140	1493	0	1883
19	Uttar Pradesh	327	0	313	0	1400	2040
20	Uttarakhand	309	666	0	600	0	1575
21	West Bengal	0	0	122	300	0	422
	Grand Total	4809	1677	950	6815	5637	19888

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.25: Construction of community hall Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Assam	0	1	0	0	0	1
2	Himachal Pradesh	0	0	1	0	0	1
3	West Bengal	0	0	1	0	0	1
	Grand Total	0	1	2	0	0	3

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.26: Insurance for Active fishers provided under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
		Physical (No.)	Physical (No.)	Physical (No.)	Physical (No.)	Physical (No.)	Physical (No.)
1	A & N Islands	14839	14839	14839	0	0	44517
2	Andhra Pradesh	404242	405347	0	0	0	809589
3	Arunachal Pradesh	10000	7000	1000	0	0	18000
4	Assam	164939	157325	157325	0	0	479589
5	Bihar	300000	300000	300000	0	0	900000
6	Chhattisgarh	210000	210000	210000	0	0	630000
7	Daman & Diu	9500	9500	9500	0	0	28500
8	Delhi	-	-	400	0	0	400
9	Goa	12721	11847	11840	0	0	36408
10	Gujarat	218270	218270	218270	0	0	654810
11	Himachal Pradesh	12153	12901	13413	0	0	38467
12	Jammu & Kashmir	15000	15000	15000	0	0	45000
13	Jharkhand	114500	126000	126000	0	0	366500
14	Karnataka	204689	204689	204689	0	0	614067
15	Kerala	237501	0	0	0	0	237501
16	Lakshadweep	12052	12052	12052	0	0	36156
17	Madhya Pradesh	175199	180988	184933	0	0	541120
18	Maharashtra	323838	323838	323838	0	0	971514
19	Manipur	12000	12000	1000	0	0	25000
20	Mizoram	10000	10000	1000	0	0	21000
21	Odisha	1111111	1150000	1150000	0	0	3411111
22	Puducherry	54367	54367	54367	0	0	163101
23	Punjab	1500	5000	5000	0	0	11500
24	Rajasthan	10833	11027	11220	0	0	33080
25	Sikkim	7000	7000	1000	0	0	15000
26	Tamil Nadu	716308	666380	666380	0	0	2049068
27	Telangana	276799	326154	326154	0	0	929107
28	Tripura	1000	1000	1000	0	0	3000
29	Uttar Pradesh	193000	193000	193000	0	0	579000
30	Uttarakhand	2000	2000	1000	0	0	5000
31	West Bengal	221563	-	-	0	0	221563
	Grand Total	5056924	4647524	4214220	0	0	13918668

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

- : NIL

Table 14.27: Training, Skill development Physical & Financial status under Fisheries Sector for FY 2015- 20(Rs in Lakhs)

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
		Physical (No.)	Physical (No.)	Physical (No.)	Physical (No.)	Physical (No.)	Physical (No.)
1	Andhra Pradesh	0	750	2250	525	8685	12210
2	Arunachal Pradesh	0	0	100	0	350	450
3	Assam	60	290	600	500	800	2250
4	Bihar	0	0	450	400	0	850
5	Chhattisgarh	270	0	600	800	500	2170
6	Goa	0	200	100	0	0	300
7	Gujarat	20	0	650	250	0	920
8	Haryana	0	0	0	0	0	0
9	Himachal Pradesh	900	0	200	100	250	1450
10	Jammu & Kashmir	20	520	200	225	100	1065
11	Jharkhand	160	728	700	750	0	2338
12	Karnataka	0	50	5525	300	0	5875
13	Kerala	0	0	350	400	1800	2550
14	Madhya Pradesh	0	150	0	200	0	350
15	Maharashtra	250	0	800	505	1250	2805
16	Manipur	1110	300	200	225	1000	2835
17	Meghalaya	2000	0	0	0	0	2000
18	Mizoram	256	200	100	100	900	1556
19	Nagaland	440	0	0	0	600	1040
20	Odisha	300	0	1500	0	860	2660
21	Punjab	500	0	150	500	500	1650
22	Rajasthan	0	0	775	650	500	1925
23	Sikkim	0	0	0	250	0	250
24	Tamil Nadu	20	0	2575	3850	0	6445
25	Telangana	500	70	3675	625	2220	7090
26	Tripura	1450	250	200	200	1700	3800
27	Uttar Pradesh	1130	0	3650	0	250	5030
28	Uttarakhand	0	0	100	0	0	100
29	West Bengal	120	90	2200	2300	2000	6710
	Grand Total	9506	3598	24700	13130	24265	78674

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.28: Construction of new ponds/Tanks Areas (Ha) sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	0	0	25	0.9	4.1	0	30.0
2	Andhra Pradesh	57.19	54.61	0	0	0	0	111.8
3	Assam	124.29	304.82	181.65	0	0	0	610.8
4	Arunachal Pradesh	0	0	0	0	50	0	50.0
5	Bihar	10	9.63	150.06	0	500	0	669.7
6	Chhattisgarh	669	0	200	288.82	300	550	2007.8
7	Goa	0	0	0	2	0	0	2.0
8	Gujarat	0	0	16	9.32	0	0	25.3
9	Haryana	1786	258.46	100	50	200	0	2394.5
10	Himachal Pradesh	0	22	15	0.57	20	0	57.6
11	Jammu & Kashmir	0	0	10	10	0	0	20.0
12	Karnataka	0	0	68	150.03	105	0	323.0
13	Kerala	0	977	15	0	0	0	992.0
14	Madhya Pradesh	1315	227	122	28	100	327.3	2119.3
15	Maharashtra	0	0	115	0	19.21	0	134.2
16	Manipur	843	450	0	77	100	0	1470.0
17	Meghalaya	0	0	70.5	0	1000	0	1070.5
18	Mizoram	2700	1275	25	0	30	0	4030.0
19	Nagaland	304	488	50	0	0	0	842.0
20	Odisha	1056	2447	340	0	130	0	3973.0
21	Puducherry	0	0	11	0	0	0	11.0
22	Punjab	0	0	1.12	0	1000	0	1001.1
23	Rajasthan	0	0	8	0	0	10	18.0
24	Tamil Nadu	10.44	0	100	0	0	0	110.4
25	Telangana	13.48	0	20	100	500	0	633.5
26	Tripura	0	543	0	208.52	50	20	821.5
27	Uttar Pradesh	3739	3691	22	25	375	300	8152.0
28	Uttarakhand	0	60	10	0	0	11.5	81.5
29	West Bengal	552	931	77	0	0	0	1560.0
	Grand Total	13179.4	11738.52	1752.33	950.16	4483.31	1218.80	33322.52

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.29: Renovation of existing ponds/tanks (Ha) units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	A & N Islands	0	0	30	0	0	30
2	Andhra Pradesh	0	0	145	0	0	145
3	Assam	226.58	32	0	0	0	258.58
4	Arunachal Pradesh	0	0	0	50	0	50
5	Bihar	0	0	0	0	0	0
6	Chhattisgarh	350	100	0	0	0	450
7	Goa	0	26.7	24	0	0	50.7
8	Gujarat	0	0	2	0	0	2
9	Haryana	196	210	0	0	0	406
10	Himachal Pradesh	0	10	0	0	0	10
11	Jammu & Kashmir	0	30	0	0	0	30
12	Karnataka	0	10	0	0	0	10
13	Kerala	0	80	150	0	0	230
14	Madhya Pradesh	947	0	9.5	0	0	956.5
15	Maharashtra	0	50	0	0	0	50
16	Manipur	0	0	0	0	0	0
17	Meghalaya	4	44	0	0	0	48
18	Mizoram	1000	100	0	0	0	1100
19	Nagaland	0	120	0	0	0	120
20	Odisha	0	138	10	0	0	148
21	Puducherry	0	0	0	0	0	0
22	Punjab	0	10.16	0	0	0	10.16
23	Rajasthan	0	0	0	0	0	0
24	Tamil Nadu	3	70	0	0	0	73
25	Telangana	0	0	0	0	0	0
26	Tripura	0	12.4	3.56	0	0	15.96
27	Uttar Pradesh	0	325	325	0	0	650
28	Uttarakhand	40	5	0	5.37	0	50.37
29	West Bengal	0	72.9	24.56	0	0	97.46
	Grand Total	2766.58	1446.16	723.62	55.37	0	4991.73

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.30: Renovation of MNERGA ponds & tanks with Input developed under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
		Physical (Ha.)	Physical (Ha.)	Physical (Ha.)	Physical (Ha.)	Physical (Ha.)	Physical (No.)
1	Bihar	0	260	0	0	0	260
2	Karnataka	0	0	0	139	0	139
3	Madhya Pradesh	0	0	0	200	0	200
4	Maharashtra	0	0	0	66.8	0	66.8
5	Meghalaya	0	0	0	50	0	50
6	Mizoram	0	0	0	0	0	0
7	Tamil Nadu	0	30	0	0	0	30
8	Tripura	0	280	0	387.5	0	667.5
9	Uttar Pradesh	0	0	0	500	0	500
	Grand Total	0	570	0	1343.3	0	1913.3

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.31: Establishment of BW Hatcheries Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	0	6	0	0	6
2	Gujarat	0	3	0	0	0	3
3	Madhya Pradesh	0	1	0	0	0	1
4	Odisha	0	0	8	0	0	8
5	Rajasthan	0	0	1	0	0	1
6	Karnataka	0	0	0	1	0	1
	Grand Total	0	4	15	1	0	20

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.32: Establishment of Fish Seed Hatcheries Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S. N	Name of the States	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Arunachal Pradesh	0	0	0	1	2	0	3
2	Assam	0	0	10	22	20	0	52
3	Bihar	0	0	20	0	4	0	24
4	Chhattisgarh	0	0	4	3	2	0	9
5	Gujarat	3	0	5	0	0	0	8
6	Haryana	0	0	0	2	0	0	2
7	Himachal Pradesh	0	0	4	16	12	0	32
8	Jammu & Kashmir	0	0	2	2	3	0	7
9	Jharkhand	0	0	4	4	0	0	8
10	Karnataka	0	0	1	0	10	0	11
11	Madhya Pradesh	0	0	4	10	8	0	22
12	Maharashtra	0	1	9	0	7	0	17
13	Manipur	0	0	0	6	6	0	12
14	Meghalaya	0	2	3	0	0	0	5
15	Mizoram	0	0	4	4	4	7	19
16	Nagaland	2	0	2	0	4	0	8
17	Odisha	1	0	10	12	0	0	23
18	Punjab	0	0	0	10	0	0	10
19	Rajasthan	0	0	1	0	0	2	3
20	Sikkim	0	0	0	0	3	0	3
21	Tamil Nadu	1	0	0	5	0	0	6
22	Telangana	0	0	5	17	60	0	82
23	Tripura	0	0	3	10	2	2	17
24	Uttar Pradesh	0	0	10	33	2	7	52
25	Uttarakhand	0	0	1	0	0	0	1
26	West Bengal	3	0	2	4	0	0	9
	Grand Total	10	3	104	161	149	18	445

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.33: Construction of Brackish water Nursery pond (Ha) sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S. N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	0	70	0	0	70
2	Gujarat	0	0	1	0	0	1
3	Odisha	0	0	0	48	0	48
	Grand Total	0	0	71	48	0	119

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.34: Construction of Brackish water Grow out pond (Ha) sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S. N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	0	75	0	0	75
2	Goa	0	0	1	0	0	1
3	Gujarat	0	0	22	0	0	22
4	Tamil Nadu	0	0	60	0	0	60
5	Odisha	0	0	100	0	0	100
	Grand Total	0	0	258	0	0	258

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.35: Construction of Raceways Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the Sates	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Arunachal Pradesh	0	0	22	40	0	62
2	Himachal Pradesh	0	106	117	330	0	553
3	Jammu & Kashmir	0	114	59	80	0	253
4	Meghalaya	0	0	0	10	0	10
5	Mizoram	0	10	0	0	0	10
6	Sikkim	0	100	0	250	310	660
7	Uttarakhand	0	60	96	158	138	452
8	West Bengal	0	25	0	0	0	25
	Grand Total	0	415	294	868	448	2025

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.36: Running cold water in earthen units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Mizoram	0	20	0	0	0	20
2	Sikkim	0	50	0	0	0	50
3	Uttarakhand	0	60	0	0	0	60
4	West Bengal	0	25	0	0	0	25
	Grand Total	0	155	0	0	0	155

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.37: Development of Waterlogged Area (Ha) sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Bihar	0	0	0	1123.6	0	1123.6
2	Haryana	0	20	0	100	0	120
3	Kerala	0	0	80	80	0	160
4	Mizoram	0	10	0	20	0	30
5	Odisha	0	55	0	0	0	55
6	West Bengal	0	160	0	0	0	160
7	Uttar Pradesh	0	0	0	0	7	7
8	Uttarakhand	0	0	0	10	2	12
	Grand Total	0	245	80	1333.6	9	1667.6

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.38: Productive Utilization for Pond Construction in Alkaline Saline (Ha) sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Delhi	0	0	10	0	0	10
2	Haryana	0	15	21	150	0	186
3	Himachal Pradesh	0	25	0	0	0	25
5	Punjab	0	0	50	100	0	150
6	Rajasthan	0	0	0	0	10	10
7	Uttar Pradesh	0	0	0	0	10	10
	Grand Total	0	40	81	250	20	391

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.39: Fish Seed Rearing Area (Ha) sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	0	100	0	0	100
2	Arunachal Pradesh	0	0	4	0	0	4
3	Assam	20	0	90	0	0	110
4	Bihar	0	0	0	1151	0	1151
5	Chhattisgarh	0	13.5	142	150	250	555.5
6	Haryana	0	0	256	0	0	256
7	Himachal Pradesh	0	0	13	0	0	13
8	Karnataka	0	10	2	0	0	12
9	Madhya Pradesh	0	0	25	52	48	125
10	Maharashtra	0	10		10	0	20
11	Manipur	0	0	11.4	60	0	71.4
12	Mizoram	0	10	9.4	22	30	71.4
13	Nagaland	15	0	0	60	0	75
14	Rajasthan	0	0	33	50	0	83
15	Telangana	0	10	76	500	0	586
16	Tripura	0	0	21	0	0	21
17	Uttar Pradesh	41.91	20	265	0	23	349.91
18	Uttarakhand	0	14	30	26.15	0	70.15
19	West Bengal	0	0	5	0	0	5
	Grand Total	76.91	87.5	1082.8	2081.15	351	3679.36

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.40: Brood Bank Facility Physical sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Chhattisgarh	0	0	0	1	0	1
2	Jammu & Kashmir	0	0	1	0	0	1
3	Meghalaya	0	0	1	1	0	2
4	Punjab	0	1	1	0	0	2
5	Telangana	0	0	0	1	0	1
6	Uttar Pradesh	0	0	1	0	0	1
7	Uttarakhand	0	0	1	1	0	2
	Grand Total	0	1	5	4	0	10

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.41: Craft & Gear for Inland Capture Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	500	480	0	0	980
2	Arunachal Pradesh	0	0	0	10	0	10
3	Assam	0	0	592	0	0	592
4	Goa	0	50	20	10	0	80
5	Haryana	0	37	0	0	0	37
6	Himachal Pradesh	0	0	0	250	0	250
7	Jammu & Kashmir	0	59	0	0	0	59
8	Karnataka	0	0	0	500	0	500
9	Maharashtra	0	25	0	22	0	47
10	Mizoram	0	5	0	0	0	5
11	Odisha	0	300	0	250	0	550
12	Uttar Pradesh	0	0	0	10	0	10
13	Tripura	0	0	0	0	250	250
	Grand Total	0	976	1092	1052	250	3370

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.42: Construction of landing centres Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	50	0	0	0	50
2	Chhattisgarh	0	0	0	10	20	30
3	Goa	0	3	2	1	0	6
4	Himachal Pradesh	0	0	0	0	0	0
5	Jammu & Kashmir	0	5	0	0	0	5
6	Jharkhand	0	0	0	10	0	10
7	Mizoram	0	5	3	0	0	8
8	Odisha	0	1	0	30	0	31
9	Telangana	0	4	0	0	0	4
	Grand Total	0	68	5	51	20	144

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.43: Number of Conservation and Awareness in Riverine Fisheries programme sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Arunachal Pradesh	0	0	0	1	0	1
2	Haryana	0	10	0	0	0	10
3	Jammu & Kashmir	0	1	0	0	0	1
4	Karnataka	0	1	0	0	0	1
5	Meghalaya	0	25	0	0	0	25
6	Sikkim	0	1	0	0	0	1
7	Tripura	0	0	0	0	1	1
8	West Bengal	0	0	0	0	0	0
9	Uttarakhand	0	0	1	0	0	1
	Grand Total	0	38	1	1	1	41

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.44: Integrated Development of Reservoirs Physical & Financial status under Fisheries Sector for FY 2015-16 to 2019-20 (Rs in Lakhs)

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Himachal Pradesh	0	11	0	0	0	11
2	Karnataka	0	1	0	1	0	2
3	Madhya Pradesh	0	16	0	0	0	16
	Grand Total	0	28	0	1	0	29

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.45: Establishing fish feed mills(1-5q/d) Physical & Financial status under Fisheries Sector for FY 2015-16 to 2019-20 (Rs in Lakhs)

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Arunachal Pradesh	0	0	0	1	0	1
2	Andhra Pradesh	0	10	0	0	0	10
3	Assam	0	12	0	2	0	14
4	Bihar	0	5	0	0	0	5
5	Chhattisgarh	0	5	0	0	0	5
6	Gujarat	0	5	0	0	0	5
7	Himachal Pradesh	0	0	0	15	0	15
8	Jharkhand	0	1	0	1	0	2
9	Madhya Pradesh	0	5	5	10	0	20
10	Maharashtra	0	10	0	32	0	42
11	Meghalaya	0	0	0	10	0	10
12	Mizoram	0	2	0	0	5	7
13	Telangana	0	4	0	0	0	4
14	Uttar Pradesh	0	1	9	2	42	54
15	Uttarakhand	0	0	0	2	1	3
16	West Bengal	0	2	0	0	0	2
	Grand Total	0	62	14	75	48	199

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.46: Establishing fish feed mills(6-10t/hr) Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	0	3	0	0	0	3
2	Bihar	0	1	0	0	0	1
3	Chhattisgarh	0	1	0	0	3	4
4	Gujarat	0	1	1	0	0	2
5	Jharkhand	0	2	0	0	0	2
6	Karnataka	0	0	0	4	0	4
7	Madhya Pradesh	0	0	0	0	4	4
8	Punjab	0	6	0	0	0	6
9	Telangana	0	0	0	2	0	2
10	Uttar Pradesh	0	1	0	0	0	1
11	Uttarakhand	0	0	1	0	0	1
	Grand Total	0	15	2	6	7	30

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.47: Installation of cages/pens in reservoirs Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Andhra Pradesh	288	72	67	0	0	427
2	Assam	0	0	0	8	0	8
3	Bihar	0	84	0	550	0	634
4	Chhattisgarh	0	0	117	48	960	1125
5	Daman & Diu	0	0	25	0	0	25
6	Delhi	0	0	48	0	0	48
7	Goa	0	0	12	0	0	12
8	Haryana	0	0	0	0	0	0
9	Himachal Pradesh	0	0	0	24	0	24
10	Jharkhand	0	2815	0	0	0	2815
11	Jammu & Kashmir	0	0	0	72	0	72
12	Karnataka	0	96	0	24	0	120
13	Kerala	0	200	0	0	0	200
14	Madhya Pradesh	0	310	250	120	66	746
15	Maharashtra	0	60	0	5380	0	5440
16	Manipur	0	0	24	48	0	72
17	Meghalaya	0	0	20	0	0	20
18	Mizoram	0	50	66	0	0	116
19	Odisha	0	0	24	0	0	24
20	Rajasthan	0	170	0	0	0	170
21	Tamil Nadu	0	0	0	0	0	0
22	Telangana	0	800	0	300	0	1100
23	Tripura	0	40	64	0	64	168
24	Uttar Pradesh	0	0	260	0	260	520
25	Uttarakhand	0	48	48	0	0	96
	Grand Total	288	4745	1025	6574	1350	13982

Table 14.48: Re-circulatory Aquaculture Systems Physical units sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2016-17	2017-18	2018-19	2018-19	Total
1	Andhra Pradesh	0	5	0	0	5
2	Assam	0	4	10	0	14
3	Bihar	0	1	0	0	1
4	Chhattisgarh	0	7	0	1	8
5	Delhi	0	2	0	0	2
6	Haryana	0	16	15.00	0	31
7	Himachal Pradesh	0	0	1	0	1
8	Jammu & Kashmir	0	1	0	0	1
9	Jharkhand	0	8	0	0	8
10	Karnataka	0	0	0	1	1
11	Kerala	0	100	125	0	225
12	Madhya Pradesh	0	10	10	0	20
13	Manipur	0	1	2	0	3
14	Meghalaya	0	1	0	0	1
15	Mizoram	0	1	0	2	3
16	Odisha	0	4	2	0	6
17	Punjab	0	6	0	0	6
18	Rajasthan	0	0	1	2	3
19	Sikkim	0	0	2	14	16
20	Telangana	1	2	10	0	13
21	Uttar Pradesh	0	27	18	107	152
22	Uttarakhand	0	0	2	0	2
23	West Bengal	0	2	0	0	2
	Grand Total	1	198	198	127	524

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

Table 14.49: Stocking of fish fingerlings in beels (ha) sanctioned under Blue Revolution Scheme during 2015-16 to 2019-20

S.N	Name of the States	2015-16	2016-17	2017-18	2018-19	Total
1	Arunachal Pradesh	0	0	0	100	100
2	Bihar	0	1000	0	0	1000
3	Chhattisgarh	33.22	0	0	0	33.22
4	Jharkhand	21.56	0	0	0	21.56
5	Karnataka	66.5	0	0	0	66.5
6	Madhya Pradesh	38.12	0	0	0	38.12
7	Odisha	129.4	0	0	0	129.4
8	Telangana	121.32	0	0	0	121.32
9	Tripura	0	1125	0	0	1125
	Grand Total	410.12	2125	0	100	2635.12

Source: Department of Fisheries, M/o Fisheries, Animal Husbandry & Dairying

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Table 14.50: Approved Area of New Grow-out ponds

S.N	Name of the States	2020-21			2021-22		
		Physical (Ha.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	4	28	12.6	10	70	35
2	Arunachal Pradesh	108	907.2	489.89	0	0	0
3	Assam	205	1722	813.46	100	840	399.17
4	Bihar	300	2100	448.56	100	700	203.28
5	Chhattisgarh	650	4550	1218	200	1400	336
6	Daman & Diu	1	7	4.2	0	0	0
7	Gujarat	0	0	0	10	70	18.48
8	Haryana	150	1050	294	65	455	121.8
9	Jharkhand	96	672	211.68	50	350	121.8
10	Karnataka	400	2800	890.4	500	3500	1092
11	Madhya Pradesh	689	4823	1430.52	700	4900	1473.36
12	Maharashtra	75	525	171.36	100	700	235.2
13	Manipur	120	1008	483.84	0	0	0
14	Meghalaya	90	756	408.24	0	0	0
15	Mizoram	157	1318.8	712.15	0	0	0
16	Nagaland	120	1008	234.32	50	350	189
17	Odisha	300	2100	630	150	1050	327.6
18	Puducherry	30	210	114.8	5	35	16.8
19	Punjab	120	840	201.6	100	700	178.08
20	Rajasthan	20	140	43.68	10	70	21.84
21	Tamil Nadu	100	700	193.2	85	595	171.36
22	Telangana	200	1400	420	200	1400	403.2
23	Tripura	145	1218	579.1	100	840	391.61
24	Uttar Pradesh	1022.85	7159.97	1993.97	250	1750	488.84
25	Uttarakhand	0	0	0	31.55	220.85	90.22
	Total	5102.85	37042.97	11999.57	2816.55	19995.85	6314.64

Table 14.51: Approved Area of New Rearing Ponds

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	2	14	6.3	1	7	2.8
2	Assam	100	700	324.45	100	700	342.72
3	Bihar	350	2450	718.2	0	0	0
4	Chhattisgarh	75	525	168	100	700	226.8
5	Daman & Diu	1	7	4.2	0	0	0
6	Gujarat	0	0	0	10	70	18.48
7	Haryana	25	175	50.4	112	784	231.84
8	Himachal Pradesh	5	35	16.38	0	0	0
9	Jharkhand	190	1330	428.4	200	1400	433.44
10	Karnataka	60	420	126	25	175	54.6
11	Madhya Pradesh	60.5	423.5	123.9	60	420	126
12	Maharashtra	37	259	83.16	8	56	19.32
13	Manipur	25	175	81.9	0	0	0
14	Meghalaya	22.2	155.4	83.92	0	0	0
15	Mizoram	46	322	173.88	0	0	0
16	Nagaland	55	385	207.9	50	350	189
17	Odisha	100	700	210	200	1400	420
18	Punjab	0	0	0	3	21	5.04
19	Tamil Nadu	10	70	19.32	40	280	80.64
20	Uttar Pradesh	196	1372	383.88	7	49	14.28
	Total	1359.7	9517.9	3210.19	916	6412	2164.96

Table 14.52: Approved New Biofloc Units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Arunachal Pradesh	0	0	0	5	37.5	20.25
2	Assam	7	175	85.5	176	1800	879.75
3	Bihar	105	2587.5	774.9	0	0	0
4	Delhi	0	0	0	1	25	10
5	Chhattisgarh	10	75	18	0	0	0
6	Goa	0	0	0	1	50	12
7	Gujarat	6	150	36	16	250	68
8	Haryana	45	725	208.8	22	165	48.6
9	Himachal Pradesh	15	165	73.35	0	0	0
10	Jammu and Kashmir	12	90.00	39.00	50	375	165
11	Jharkhand	134	1743.2	557.1	151	1778	582
12	Manipur	20	150	71.55	15	112.5	47.25
13	Kerala	400	3000	900	400	3000	900
14	Madhya Pradesh	141	1057.5	340.2	143	1825	576
15	Punjab	50	435	104.4	48	420	112.5
16	Rajasthan	2	75	18	0	0	0
17	Tamil Nadu	10	75	20.7	100	750	216
18	Tripura	50	107	53.93	114	855	413.1
19	Uttarakhand	26	455	207.9	35	720	343.8
	Total	1033	11065.2	3509.33	1277	12162.5	4394.25

Table 14.53: Approved New RAS Units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	4	30	13.5	3	22.5	10.5
2	Andhra Pradesh	4	200	60	0	0	0
3	Assam	53	997.5	483.3	19	575	279
4	Bihar	45	762.5	227.4	0	0	0
5	Chhattisgarh	1	50	18	167	1337.5	436.5
6	Delhi	7	172.5	97	1	50	30
7	Goa	2	28	945.72	9	120	33.6
8	Gujarat	6	150	36	20	325	85.8
9	Haryana	70	1252.5	414.24	35	405	118.44
10	Jharkhand	55	1505.5	476.58	15	338	108.78
11	Karnataka	160	1514	443.94	303	4760	1486.92
12	Kerala	319	2392.5	720	100	750	225
13	Madhya Pradesh	29	1450	486	182	1957.5	639
14	Maharashtra	376	1387	451.62	240	4127	1428.84
15	Meghalaya	3	8.5	4.59	1	25	13.5
16	Nagaland	0	0	0	5	37.5	20.25
17	Odisha	62	1325	277.5	35	650	198
18	Punjab	12	480	226.4	10	195	55.8
19	Rajasthan	3	107.5	32.7	0	0	0
20	Tamil Nadu	20	150	41.4	0	0	0
21	Telangana	0	0	0	10	250	78
22	Tripura	0	0	0	10	75	39.15
23	Uttar Pradesh	322	11213.5	3539.76	174	4210	1273.5
24	Uttarakhand	0	0	0	22	447.5	212.4
	Total	1553	25176.5	8995.65	1361	20657.5	6772.98

Table 14.54: Approved Units of Installation of Cages in Reservoir

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andhra Pradesh	200	600	172.8	100	300	81.36
2	Assam	150	450	232.2	0	0	0
3	Bihar	200	600	174.24	200	600	174.24
4	Chhattisgarh	1000	3000	1080	1000	3000	936
5	Goa	0	0	0	25	75	21.6
6	Gujarat	0	0	0	3000	9000	3060
7	Jharkhand	365	1095	312.84	1913	5739	2009.52
8	Karnataka	100	300	95.04	100	300	91.8
9	Kerala	0	0	0	500	1500	450
10	Madhya Pradesh	223	669	216.36	368	1104	356.4
11	Maharashtra	1160	3480	1108.8	1384	4152	1418.4
12	Manipur	100	300	162	100	300	162
13	Odisha	500	1500	450	1800	5400	1620
14	Rajasthan	144	432	136.08	72	216	51.84
15	Telangana	150	450	108	600	1800	432
16	Uttarakhand	0	0	0	100	300	108
	Total	4292	12876	4248.36	11262	33786	10973.16

Table 14.55: Approved Area Under Pen Culture in Open Water Bodies

S.N	Name of the States	2020-21			2021-22		
		Physical (Ha.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (Ha.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Assam	60	180	86.4	60	180	88.02
2	Karnataka	5.2	15.6	4.46	12	36	10.44
3	Madhya Pradesh	0	0	0	36	108	25.92
4	Uttar Pradesh	7.5	22.5	5.616	18	54	12.96
	Total	72.7	218.1	96.476	126	378	137.34

Table 14.56: Approved Units of New Freshwater Finfish Hatcheries

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	1	25	10	2	50	20
2	Andhra Pradesh	2	50	15	0	0	0
3	Arunachal Pradesh	0	0	0	3	75	40.5
4	Assam	10	250	112.5	16	400	193.5
5	Bihar	12	300	84	7	175	54
6	Chhattisgarh	4	100	24	6	150	42
7	Gujarat	0	0	0	1	25	6
8	Haryana	1	25	9	2	50	12
9	Himachal Pradesh	3	75	36	0	0	0
10	Jharkhand	25	625	198	8	200	69
11	Karnataka	6	150	45	4	100	33
12	Madhya Pradesh	7	175	54	10	250	72
13	Maharashtra	16	400	122	12	300	102
14	Manipur	8	120	54	4	100	49.5
15	Meghalaya	0	0	0	6	150	81
16	Mizoram	6	150	81	6	150	81
17	Nagaland	3	75	40.5	2	50	27
18	Odisha	20	500	153	7	175	54
19	Punjab	0	0	0	2	50	12
20	Rajasthan	1	25	9	0	0	0
21	Sikkim	0	0	0	2	50	27
22	Tamil Nadu	2	50	15	8	200	57
23	Telangana	6	150	48	15	375	120
24	Tripura	6	150	72	7	175	90
25	Uttar Pradesh	27	675	204	15	375	114
	Total	166	4070	1386	145	3625	1356.5

Table 14.57: Approved New Ponds for Saline-Alkaline Areas

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Haryana	150	1200	350.4	400	3200	936
2	Karnataka	0	0	0	65	520	157.44
3	Maharashtra	15	120	31.68	4	32	9.6
4	Punjab	150	1000	216	123	984	241.92
5	Rajasthan	20	40	12.48	30	240	74.88
6	Uttar Pradesh	58	464	123.84	10	80	24
	Total	393	2824	734.4	632	5056	1443.84

Table 14.58: Approved Units of New Brood Banks

S.N	Name of the States	2020-21		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andhra Pradesh	1	500	300
2	Bihar	1	500	300
3	Daman & Diu	1	120	120
4	Kerala	1	500	300
5	Maharashtra	1	500	300
6	Mizoram	1	415.6	374.04
7	Nagaland	1	500	450
8	Tamil Nadu	2	1000	600
	Total	9	4035.6	2744.04

Table 14.59: Approved Units for Acquisition of Deep Sea Fishing Vessels for Traditional Fishermen

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	1	120	48	4	480	216
2	Andhra Pradesh	20	2400	604.8	30	3600	921.6
3	Goa	20	2400	720	0	0	0
4	Gujarat	50	6000	1670.4	50	6000	1444
5	Karnataka	4	480	144	10	1200	374.4
6	Kerala	10	1200	288	0	0	0
7	Lakshadweep	10	1200	720	0	0	0
8	Maharashtra	0	0	0	7	840	288
9	Odisha	5	600	172.8	0	0	0
10	Puducherry	2	240	144	0	0	0
11	Tamil Nadu	0	0	0	50	6000	1728
	Total	122	14640	4512	151	18120	4972

Table 14.60: Approved Up Gradation of Existing Fishing Vessels for Export Competency

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (Ha.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	10	150	66	0	0	0
2	Gujarat	0	0	0	200	3000	720
3	Goa	15	225	63	0	0	0
4	Karnataka	15	225	66.6	0	0	0
5	Kerala	100	1500	360	0	0	0
6	Lakshadweep	70	344.63	206.78	0	0	0
7	Maharashtra	7	105	30.6	10	150	39.6
8	Odisha	50	750	225	50	750	225
	Total	267	3299.63	1017.98	260	3900	984.6

Table 14.61: Approved Establishment of Bio-Toilet Units in Mechanised Fishing Vessels

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	5	2.5	1	3	1.5	0.7
2	Andhra Pradesh	300	150	36.6	1000	500	123
3	Gujarat	0	0	0	350	175	42
4	Goa	100	50	15	0	0	0
5	Karnataka	100	50	14.64	0	0	0
6	Maharashtra	2000	1000	276	0	0	0
7	Odisha	10	5	1.5	0	0	0
8	Puducherry	240	120	50.5	0	0	0
9	Tamil Nadu	0	0	0	100	50	12
	Total	2755	1377.5	395.24	1453	726.5	177.7

Table- 14.62: Approved Units of Installation of New Sea Cages

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	6	30	15	0	0	0
2	Andhra Pradesh	500	2500	678	300	1500	406.8
3	Gujarat	0	0	0	500	2500	600
4	Maharashtra	100	500	165	90	450	162
5	Tamil Nadu	10	50	13.8	50	250	64.8
	Total	616	3080	871.8	940	4700	1233.6

Table- 14.63 : Approved Units for Establishment of Small Marine Fin Fish Hatchery

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	1	50	20	0	0	0
2	Karnataka	1	50	12	2	100	30
	Total	2	100	32	2	100	30

Table- 14.64: Approved Area Under New Ponds for Brackish Water Aquaculture

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	10	80	38.4	14	112	52.8
2	Goa	2	16	3.84	0	0	0
3	Gujarat	0	0	0	200	1600	384
4	Karnataka	14	112	34.56	25	200	62.4
5	Kerala	0	0	0	60	480	144
6	Maharashtra	40	320	99.84	3	24	5.76
7	Odisha	400	3200	960	400	3200	960
8	Puducherry	5	40	22.4	0	0	0
9	Tamil Nadu	0	0	0	100	800	205.44
	Total	471	3768	1159.04	802	6416	1814.4

Table- 14.65: Establishment of Need Based New Brackish Hatcheries (Shell & Fin Fish)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andhra Pradesh	4	200	60	0	0	0
2	Karnataka	0	0	0	1	50	18
3	Odisha	2	100	30	2	100	30
	Total	6	300	90	3	150	48

Table- 14.66: Approved Units of Boats (Replacement) and Nets for Traditional Fishermen

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andhra Pradesh	450	2250	570	741	3705	889.2
2	Assam	61	305	144	0	0	0
3	Chhattisgarh	20	100	24	0	0	0
4	Goa	20	100	27	6	30	10.8
5	Himachal Pradesh	500	1000	450	0	0	0
6	Jammu and Kashmir	25	125	50	0	0	0
7	Jharkhand	20	100	31.2	0	0	0
8	Karnataka	100	500	147	43	215	57
9	Kerala	0	0	0	100	500	120
10	Lakshadweep	100	500	300	0	0	0
11	Maharashtra	14	70	21	71	355	98.4
12	Odisha	200	1000	300	100	500	150
13	Puducherry	130	650	285	0	0	0
14	Tamil Nadu	200	1000	240	300	1500	390
15	Tripura	16	80	43.2	13	65	35.1
	Total	1856	7780	2632.4	1374	6870	1750.5

Table- 14.67: Approved Livelihood and Nutritional Support for Socio-Economically Backward Active Traditional Fishers' Families for Conservation of Fisheries Resources During Fishing Ban/Lean Period

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman & Nicobar	0	0	0	1000	45	30
2	Andhra Pradesh	0	0	0	98360	4426.2	1475.4
3	Assam	20000	900	480	21000	945	504
4	Bihar	0	0	0	50000	2250	750
5	Chhattisgarh	8000	360	120	8000	360	120
6	Gujarat	0	0	0	30000	1350	450
7	Himachal Pradesh	3557	160.07	85.37	3557	160.065	85.368
8	Jammu and Kashmir	17396	782.820	521.88	16286	732.87	488.58
9	Karnataka	24003	1080.135	360.05	20414	918.63	306.21
10	Kerala	0	0	0	179316	7654.2	2551.4
11	Lakshadweep	0	0	0	2500	112.5	75
12	Madhya Pradesh	10385	467.325	155.775	11237	505.67	168.56
13	Mizoram	6283	282.735	150.79	6283	282.735	150.792
14	Odisha	12000	540	180	20000	900	299.97
15	Puducherry	28767	1294.52	863.01	28767	1295	863
16	Rajasthan	103	3.09	1.11	2200	99	33
17	Sikkim	0	0	0	200	9	4.8
18	Tamil Nadu	0	0	0	170000	7650	2550
19	Telangana	2000	90	30	4000	180	60
20	Tripura	2239	67.17	53.74	4142	186.39	99.408
21	Uttarakhand	0	0	0	200	9	4.8
	Total	134733	6027.865	3001.725	677462	30071.26	11070.3

Table- 14.68: Approved Units for Extension and Support Services

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman & Nicobar	0	0	0	1	25	10
2	Assam	0	0	0	1	25	13.5
3	Bihar	10	250	72	0	0	0
4	Jharkhand	1	25	9	2	50	12
5	Karnataka	0	0	0	7	175	51
6	Kerala	0	0	0	10	250	60
7	Maharashtra	20	500	129	8	200	66
8	Uttarakhand	0	0	0	2	50	18
	Total	31	775	210	31	775	230.5

Table- 14.69 : Approved Units for Construction of Cold Storages and Ice Plants

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	3	160	72	5	240	104
2	Assam	0	0	0	9	360	180
3	Bihar	12	525	105.12	0	0	0
4	Chhattisgarh	2	80	19.2	0	0	0
5	Daman & Diu	1	150	60	0	0	0
6	Goa	3	200	48	0	0	0
7	Gujarat	0	0	0	26	2430	619
8	Haryana	0	0	0	2	80	24
9	Himachal Pradesh	9	690	324	0	0	0
10	Jharkhand	8	320	96	7	320	105.6
11	Karnataka	15	1440	429.6	29	2820	820
12	Kerala	2	80	48	0	0	0
13	Lakshadweep	2	80	48	4	240	144
14	Madhya Pradesh	8	320	96	11	560	182.4
15	Maharashtra	7	710	208.8	37	3800	1201
16	Manipur	0	0	0	5	200	93.6
17	Meghalaya	4	80	43.2	2	80	43.2
18	Mizoram	2	80	43.2	0	0	0
19	Odisha	3	450	126	2	300	90
20	Puducherry	2	80	48	0	0	0
21	Punjab	0	0	0	1	40	9.6
22	Rajasthan	1	69	16.56	0	0	0
23	Tamil Nadu	0	0	0	14	1790	558
24	Tripura	0	0	0	1	40	21.6
25	Uttar Pradesh	1	150	54	0	0	0
26	Uttarakhand	0	0	0	1	40	14.4
	Total	85	5664	1885.68	156	13340	4210.4

Table- 14.70: Approved Fish Feed Mill Units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	1	30	12	2	60	30
2	Assam	15	450	216	34	1020	486
3	Bihar	23	1720	486	12	3300	990
4	Chhattisgarh	0	0	0	3	400	144
5	Gujarat	0	0	0	1	30	7.2
6	Haryana	4	460	138	4	360	102
7	Himachal Pradesh	8	410	169.2			
8	Jharkhand	15	450	136.8	11	400	133.2
9	Madhya Pradesh	27	1050	342	25	990	331.2
10	Maharashtra	15	450	140.4	46	2200	748.8
11	Manipur				4	120	54
12	Meghalaya	1	30	16.2	1	30	16.2
13	Odisha	10	150	45	6	600	180
14	Punjab	7	210	50.4	2	60	14.4
15	Telangana	2	60	18	2	60	18
16	Tripura	8	240	118.8	5	150	70.2
17	Uttar Pradesh	85	4550	1512			
	Total	221	10260	3400.8	158	9780	3325.2

Table- 14.71: Approved Refrigerated truck units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andaman and Nicobar	1	25	10	1	25	10
2	Assam	10	250	117	0	0	0
3	Bihar	10	250	72	0	0	0
4	Chhattisgarh	2	50	12	2	50	12
5	Delhi	1	25	15	0	0	0
6	Gujarat	0	0	0	20	500	168
7	Goa	4	100	30	0	0	0
8	Haryana	1	25	9	2	50	15
9	Himachal Pradesh	1	25	9	0	0	0
10	Jharkhand	0	0	0	7	175	57
11	Karnataka	6	150	45	6	150	45
12	Madhya Pradesh	0	0	0	3	75	27
13	Maharashtra	8	200	60	28	700	228
14	Nagaland	2	50	27	0	0	0
15	Odisha	10	250	75	0	0	0
16	Puducherry	2	50	30	0	0	0
17	Punjab	2	50	12	2	50	12
18	Rajasthan	3	75	24	0	0	0
19	Tamil Nadu	0	0	0	6	150	54
	Total	63	1575	547	77	1925	628

Table- 14.72 : Approved Insulated Truck units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	2	30	15	2	40	20
2	Andhra Pradesh	50	1000	278.4	150	3000	873.6
3	Assam	5	100	46.8	0	0	0
4	Bihar	5	100	28.8	0	0	0
5	Gujarat	0	0	0	24	480	115.2
6	Goa	10	200	60	4	80	24
7	Himachal Pradesh	7	140	61.2	0	0	0
8	Jharkhand	0	0	0	10	200	62.4
9	Karnataka	10	200	55.2	45	900	266.4
10	Madhya Pradesh	7	140	36	11	220	62.4
11	Maharashtra	10	200	40.8	37	740	223.2
12	Manipur	0	0	0	5	100	46.8
13	Meghalaya	4	160	108	3	60	32.4
14	Odisha	35	700	208.8	50	1000	300
15	Puducherry	4	80	48	0	0	0
16	Punjab	5	100	24	1	20	4.8
17	Rajasthan	3	60	19.2	0	0	0
18	Tamil Nadu	20	400	96	62	1240	386.4
19	Telangana	10	200	57.6	10	200	57.6
20	Uttar Pradesh	16	320	103.2	30	600	182.4
	Total	203	4130	1287	444	8880	2657.6

Table- 14.73 : Approved Motorcycle with Ice Box Units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman and Nicobar	33	24.75	12	10	7.5	3.6
2	Andhra Pradesh	500	375	108	300	225	64.8
3	Assam	100	75	36.045	100	75	35.51
4	Bihar	300	225	65.34	100	75	21.78
5	Chhattisgarh	300	225	54	50	37.5	9
6	Daman & Diu	10	7.5	4.5	0	0	0
7	Delhi	3	2.25	1.2	0	0	0
8	Goa	10	7.5	2.25	10	7.5	2.25
9	Gujarat	0	0	0	250	187.5	58.5
10	Haryana	40	30	8.28	10	7.5	2.25
11	Himachal Pradesh	100	75	35.1	0	0	0
12	Jammu and Kashmir	0	0	0	30	22.5	10.5
13	Jharkhand	100	75	23.4	100	75	24.03
14	Karnataka	100	75	20.88	159	119.25	36.72
15	Madhya Pradesh	729	546.75	160.2	500	375	116.01
16	Maharashtra	0	0	0	90	67.5	19.98
17	Ladakh	20	15	9	0	0	0
18	Meghalaya	20	15	8.1	3	2.25	1.22
19	Nagaland	2	1.5	0.81	0	0	0
20	Odisha	100	75	22.5	100	75	22.77
21	Puducherry	20	15	8.25	0	0	0
22	Punjab	80	60	14.4	50	37.5	9.36
23	Sikkim	0	0	0	10	7.5	4.05
24	Tamil Nadu	500	375	94.5	225	168.75	46.62
25	Tripura	50	37.5	17.01	24	18	9.18
26	Uttar Pradesh	50	37.5	10.53	100	75	20.34
27	Uttarakhand	32	24	10.4	10	7.5	3.65
	Total	3199	2399.25	726.695	2231	1673.25	522.12

Table- 14.74: Approved Cycle with Ice Box Units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Assam	500	50	23.94	437	43.7	20.74
2	Bihar	500	50	14.52	500	50	14.52
3	Delhi	5	0.5	0.28			
4	Haryana	100	10	2.76	110	11	3.36
5	Jharkhand	253	25.3	7.68	119	11.9	3.76
6	Karnataka	100	10	2.74	34	3.4	1.12
7	Madhya Pradesh	190	19	5.22	114	11.4	3.59
8	Punjab	20	2	0.48	79	7.9	1.9
9	Tripura	200	20	9.36	43	4.3	2.11
10	Uttar Pradesh	421	42.1	13.452	57	5.7	1.51
	Total	2289	228.9	80.432	1493	149.3	52.61

Table- 14.75 : Approved Three wheeler with Ice Box Units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andaman & Nicobar	10	30	15	10	30	15
2	Andhra Pradesh	250	750	216	150	450	129.6
3	Assam	135	270	128.16	50	150	69.12
4	Bihar	100	300	87.12	50	150	43.56
5	Chhattisgarh	10	30	7.2	10	30	7.2
6	Daman & Diu	5	15	9	0	0	0
7	Delhi	2	6	3	0	0	0
8	Goa	10	30	9	10	30	9
9	Gujarat	0	0	0	3	9	2.16
10	Haryana	10	30	8.28	10	30	9
11	Himachal Pradesh	10	30	14.04	0	0	0
12	Jammu and Kashmir	0	0	0	25	75	33
13	Jharkhand	233	699	223.92	100	300	96.12
14	Karnataka	25	75	21.6	60	180	55.08
15	Lakshadweep	14	42	25.2	0	0	0
16	Madhya Pradesh	64	192	56.52	101	303	92.52
17	Maharashtra	122	360	111.6	34	102	33.12
18	Meghalaya	10	30	16.2	10	30	16.2
19	Odisha	50	150	45	70	210	63
20	Punjab	25	75	18	5	15	3.96
21	Rajasthan	3	9	2.88	0	0	0
22	Tamil Nadu	15	45	12.6	40	120	31.32
23	Tripura	25	75	35.1	20	60	30.24
24	Telangana	125	375	117	75	225	70.2
25	Uttar Pradesh	0	0	0	40	120	31.32
26	Uttarakhand	1	3	1.62	1	3	1.08
	Total	1254	3621	1184.04	874	2622	842

Table- 14.76: Approved Fish Retail Markets (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andhra Pradesh	25	2500	720	125	9500	2568
2	Goa	4	400	96	0	0	0
3	Karnataka	0	0	0	1	100	36
4	Madhya Pradesh	1	100	24	0	0	0
5	Maharashtra	8	800	264	0	0	0
6	Odisha	7	700	216	5	500	156
7	Punjab	0	0	0	2	200	48
	Total	45	4500	1320	133	10300	2808

Table- 14.77 : Approved Fish Kiosks Including Kiosks of Aquarium/Ornamental Fish (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andaman and Nicobar	9	90	42	13	130	64
2	Andhra Pradesh	250	2500	720	1865	7388.75	2117.73
3	Assam	22	220	104.4	22	220	113.4
4	Bihar	20	200	57.6	30	300	90
5	Goa	8	80	24	0	0	0
6	Haryana	5	50	14.4	22	220	67.2
7	Himachal Pradesh	9	90	43.2	0	0	0
8	Jharkhand	6	60	18	1	10	3.6
9	Karnataka	25	250	75.6	35	350	104.4
10	Madhya Pradesh	51	510	154.8	72	720	213.6
11	Maharashtra	14	140	45.6	32	320	105.6
12	Meghalaya	17	170	91.8	20	200	108
13	Mizoram	4	40	21.6	0	0	0
14	Odisha	20	200	60	12	120	36
15	Puducherry	7	70	38	0	0	0
16	Punjab	0	0	0	25	250	60
17	Tamil Nadu	20	200	48	30	300	96
18	Telangana	40	400	132	145	1450	444
19	Tripura	8	80	41.4	0	0	0
20	Uttar Pradesh	27	270	80.4	14	140	40.8
21	Uttarakhand	19	190	77.4	0	0	0
	Total	581	5810	1890.2	2338	12118.75	3664.33

Table- 14.78 : Approved value added enterprise units

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andaman and Nicobar	1	50	20	4	200	100
2	Andhra Pradesh	25	1250	360	0	0	0
3	Daman & Diu	3	150	70	0	0	0
4	Goa	1	50	12	0	0	0
5	Karnataka	0	0	0	2	100	30
6	Lakshadweep	5	250	150	4	200	120
7	Maharashtra	7	350	108	7	350	126
8	Meghalaya	2	100	54	0	0	0
9	Puducherry	2	100	60	0	0	0
	Total	46	2300	834	17	850	376

Table- 14.79: Approved Units Under Establishment of Disease Diagnostic and Quality Testing Labs (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andhra Pradesh	2	50	15	0	0	0
2	Assam	0	0	0	1	25	9
3	Delhi	1	25	15	0	0	0
4	Madhya Pradesh	0	0	0	2	50	12
5	Maharashtra	2	50	12	1	25	6
6	Odisha	4	100	30	0	0	0
	Total	9	225	72	4	100	27

Table- 14.80: Disease Diagnostic and Quality Testing Mobile Labs/Clinics (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andhra Pradesh	8	280	79.8	0	0	0
2	Maharashtra	1	35	8.4	0	0	0
3	Odisha	4	140	42	0	0	0
4	Punjab	0	0	0	1	35	8.4
5	Uttar Pradesh	4	140	42	2	70	21
	Total	17	595	172.2	3	105	29.4

Table- 14.81: Approved Units Under Aquatic Referral Labs for Quality Testing and Disease Diagnostics (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Bihar	2	1000	600	0	0	0
2	Gujarat	0	0	0	1	140.99	84.43
3	Kerala	1	975	585	0	0	0
	Total	3	1975	1185	1	140.99	84.43

Table- 14.82 : Approved Backyard Ornamental Fish Rearing Units (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andaman and Nicobar	6	18	9	2	6	3
2	Assam	20	60	29.7	80	240	129.6
3	Bihar	12	36	10.8	30	90	27
4	Chhattisgarh	15	45	10.8	15	45	10.8
5	Daman & Diu	2	6	3.6	0	0	0
6	Delhi	5	15	7.80	0	0	0
7	Goa	0	0	0	2	6	1.8
8	Himachal Pradesh	1	3	1.62	0	0	0
9	Jharkhand	7	21	6.48	4	12	4.32
10	Karnataka	0	0	0	55	165	50.04
11	Kerala	0	0	0	300	900	270
12	Lakshadweep	3	9	5.4	0	0	0
13	Maharashtra	42	126	39.96	9	27	9
14	Manipur	0	0	0	10	30	13.5
15	Meghalaya	2	6	3.24	40	120	64.8
16	Mizoram	12	36	19.44	0	0	0
17	Nagaland	12	36	19.44	10	30	16.2
18	Odisha	0	0	0	5	15	4.68
19	Puducherry	9	27	13.8	0	0	0
20	Sikkim	20	60	32.4	50	150	81
21	Tamil Nadu	13	39	10.8	110	330	93.6
22	Tripura	8	24	12.42	8	24	11.88
23	Uttar Pradesh	8	24	12.42	10	30	9.36
	Total	197	591	249.12	740	2220	800.58

Table- 14.83: Approved Medium Scale Ornamental Fish Rearing Units (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Assam	10	80	23.04	20	160	84.96
2	Bihar	10	80	23.04	10	80	24
3	Chhattisgarh	2	16	3.84	2	16	3.84
4	Delhi	5	40	20.80	0	0	0
5	Goa	0	0	0	1	8	1.92
6	Haryana	3	24	6.72	5	40	11.52
7	Himachal Pradesh	1	8	4.32	0	0	0
8	Jharkhand	5	40	14.4	0	0	0
9	Karnataka	0	0	0	12	96	28.8
10	Kerala	0	0	0	50	400	120
11	Maharashtra	7	56	18.24	4	32	10.56
12	Manipur	0	0	0	8	64	28.8
13	Meghalaya	0	0	0	3	24	12.96
14	Mizoram	1	8	4.32	0	0	0
15	Odisha	0	0	0	2	16	4.8
16	Sikkim	0	0	0	4	32	17.28
17	Tamil Nadu	12	96	26.88	35	280	81.6
18	Tripura	5	40	20.16	2	16	8.64
	Total	61	488	165.76	158	1264	439.68

Table- 14.84: Approved Integrated Ornamental Fish Units (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Assam	2	50	15	5	125	67.5
2	Bihar	2	50	15	5	125	36
3	Chhattisgarh	1	25	6	4	100	36
4	Gujarat	0	0	0	5	125	30
5	Jammu & Kashmir	0	0	0	1	25	25
6	Jharkhand	5	125	42	1	25	9
7	Karnataka	0	0	0	6	150	45
8	Kerala	0	0	0	20	500	150
9	Madhya Pradesh	1	25	6	2	50	12
10	Maharashtra	7	175	57	9	27	9
11	Punjab	0	0	0	1	25	6
12	Tamil Nadu	0	0	0	22	550	195
13	Tripura	1	25	13.5	0	0	0
	Total	19	475	154.5	81	1827	620.5

Table- 14.85: Approved Units of Establishment of Seaweed Culture Rafts Including Inputs (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andhra Pradesh	6000	90	32.4	20000	300	82.8
2	Gujarat	0	0	0	1000	15	3.6
3	Karnataka	10000	150	45	0	0	0
4	Lakshadweep	0	0	0	500	9	5.4
5	Maharashtra	2000	30	10.8	2000	30	10.8
6	Tamil Nadu	13000	195	70.2	0	0	0
	Total	31000	465	158.4	23500	354	102.6

Table- 14.86: Approved Units for Establishment of Seaweed Culture with Monoline/Tubenet Method Including Inputs (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Andhra Pradesh	1200	96	34.56	40000	3200	867.84
2	Karnataka	20000	1600	480	1000	80	28.8
3	Maharashtra	800	64	23.04	0	0	0
4	Tamil Nadu	531	42.48	15.29	0	0	0
	Total	22531	1802.48	552.89	41000	3280	896.64

Table 14.87: Approved Area Under New Ponds in Himalayan Region (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Arunachal Pradesh	0	0	0	100	840	453.6
1	Himachal Pradesh	20	168	78.684	0	0	0
2	Jammu and Kashmir	7	58.80	26.88	20	168	73.92
3	Nagaland	0	0	0	50	420	226.8
4	Uttarakhand	23.6	165.2	70.31	0	0	0
	Total	50.6	392	175.874	170	1428	754.32

Table- 14.88 : Approved Construction of Raceway Units (in Rs. Lakhs)

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost	Gol Share	Physical (No.)	Proj. Cost	Gol Share
1	Arunachal Pradesh	50	150	81	200	500	270
2	Himachal Pradesh	120	360	167.4	0	0	0
3	Jammu and Kashmir	250	750.00	330.00	200	600	264
4	Ladakh	20	60	36	90	270	162
5	Meghalaya	0	0	0	1	5.5	2.97
6	Nagaland	0	0	0	10	30	16.2
7	Sikkim	200	600	324	200	600	324
8	Uttarakhand	518	1554	633.96	508	1524	675.54
	Total	1158	3474	1572.36	1209	3529.5	1714.71

Table- 14.89 : Approved Units for Establishment of Trout Fish Hatcheries

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Jammu and Kashmir	1	50.00	20.00	2	100	40
2	Himachal Pradesh	3	150	81	0	0	0
3	Ladakh	0	0	0	2	100	60
4	Nagaland	0	0	0	2	100	54
5	Sikkim	0	0	0	2	100	54
6	Uttarakhand	0	0	0	2	100	45
	Total	4	200	101	10	500	253

Table- 14.90: Approved Units of Establishment of Large RAS in Himalayan Region

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Sikkim	0	0	0	4	80	43.2
2	Uttarakhand	0	0	0	8	160	75.6
	Total	0	0	0	12	240	118.8

Table- 14.91: Approved Units Under Multipurpose Support Services – Sagar Mitra

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Andhra Pradesh	350	315	189	0	0	0
2	Andaman & Nicobar Islands	0	0	0	70	126	126
3	Daman & Diu	6	2.7	2.7	0	0	0
4	Goa	20	18	10.8	38	0	0
5	Gujarat	0	0	0	260	468	280.8
6	Karnataka	120	2704	829.26	0	0	0
7	Kerala	222	199.8	119.8	0	0	0
8	Lakshadweep	0	0	0	10	18	18
9	Maharashtra	173	103.8	62.28	0	0	0
10	Odisha	600	540	324	0	0	0
11	Puducherry	32	28.8	28.8	0	0	0
12	Tamil Nadu	600	540	324	0	0	0
	Total	2123	4452.1	1890.64	378	612	424.8

Table- 14.92: Approved Units Under Integrated Reservoir Development

S.N	Name of the States	2020-21			2021-22		
		Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share	Physical (No.)	Proj. Cost (in Rs. Lakhs)	Gol Share
1	Manipur	1	300	270	0	0	0
2	Kerala	4	1600	960	3	360.6	1081.8
3	Maharashtra	5	1700	1020	0	0	0
4	Odisha	2	750	450	0	0	0
5	Tamil Nadu	5	1108.25	664.95	0	0	0
	Total	17	5458.25	3364.95	3	360.6	1081.8

CHAPTER 15

FISHERIES AND AQUACULTURE INFRASTRUCTURE DEVELOPMENT FUND (FIDF)



Fisheries and Aquaculture Infrastructure Fund (FIDF)

- In order to address the infrastructure requirement for fisheries sector, the Department of Fisheries, Ministry of Fisheries, Animal Husbandry and Dairying during 2018-19 has created dedicated fund namely Fisheries and Aquaculture Infrastructure Development Fund (FIDF) with a total funds size of Rs 7522.48 crore.
- FIDF provides concessional finance to the Eligible Entities (Ees), including State Governments/Union Territories and State entities for development of identified fisheries infrastructure facilities through Nodal Loaning Entities (NLEs) namely
 - ❖ National Bank for Agriculture and Rural Development (NABARD),
 - ❖ National Cooperatives Development Corporation (NCDC) and
 - ❖ All scheduled Banks
- Under the FIDF, the Department of Fisheries provides interest subvention up to 3% per annum for providing the concessional finance by the NLEs at the interest rate not lower than 5% per annum.
- Loan lending period under FIDF is five years from 2018-19 to 2022-23 and maximum repayment period of 12 years inclusive of moratorium of 2 years on repayment of principal.
- Under the FIDF, so far proposals to the tune of Rs. 7644.50 crore have been received from various Eligible Entities (EEs) including State Governments and Union Territories.
- These proposals have been received from States/UTs namely Andhra Pradesh, Tamil Nadu, Maharashtra, J&K, Telanagana, Mizoram, West Bengal, Assam, Lakshadweep, Gujarat, Uttar Pradesh, Odisha and Haryana, Himachal Pradesh, Manipur, Andaman and Nicobar, Kerala, Tripura, Goa and Bihar.
- DoF has approved the proposals to the tune of Rs. 4923.94 crore with Project cost restricted for interest subvention of Rs. 3236.81 have been recommended to various States/UTs including the proposals of private beneficiaries.
- An amount of Rs. 1871.58 crores has been sanctioned by Nodal Loaning Entities (NLEs). NABARD has sanctioned an amount of Rs. 1860.28 crore to the State Governments and Rs. 11.30 crore has been sanctioned by Scheduled banks to private beneficiaries respectively.
- The Tripartite MoA is executed between the (i) concerned (loan availing) State Government, (ii) NABARD and (iii) Department of Fisheries (DoF), Ministry of Fisheries, Animal Husbandry and Dairying, GOI funding the State/UTs Projects under FIDF by NABARD. However, so far, only 12 States Governments namely Tamil Nadu, Gujarat, West Bengal, Andhra Pradesh, Karnataka, Kerala, Maharashtra, Haryana, Goa, UT of Jammu and Kashmir and Odisha and Himachal Pradesh have signed the Tripartite Memorandum of Agreement (MoA) for availing the initial concessional finance.

Fisheries and Aquaculture Infrastructure Development Fund

Fisheries and Aquaculture Infrastructure Development Fund

1. Fund size : Rs 7522.48 Crores, which includes ;
 - Rs 5266.40 Crores to be raised by the Nodal Lending Entities (NLEs)
 - Rs 1316.60 Crores beneficiaries' contribution
 - Rs 939.48 Crores budgetary support
2. Loan Lending period : 5 years from 2018-19 to 2022-23
3. Maximum Repayment period : 12 years inclusive of moratorium of 2 years on repayment of principal.
4. Lending Rate of Interest : Not lower than 5% per annum for all Eligible Entities.
5. Interest Subvention : Upto 3% per annum for all Eligible Entities.

Summary of Proposals approved

- (i) Total No. of Proposals received : 229
- (ii) Total Project cost of the proposals received : Rs. 7644.50 crores
- (iii) Number of proposals approved : 105 Nos
- (iv) Total cost of the approved proposals : Rs. 4923.94 crores
- (v) Project cost restricted to interest subvention : Rs. 3236.81 crores

Table 15.1 Details of the approved proposals under FIDF (₹ In Crores)*

Sl. No	Name of the Project	Total Project Cost	Project cost restricted for interest subvention (Rs. in crores)
1	Tamil Nadu (52 proposals)	1419.98	1182.16
2	Andhra Pradesh (4 proposals)	1291.40	600.00
3	Gujarat (5 proposals)	1354.92	750.00
4	West Bengal (10 proposals)	27.99	17.41
5	Goa (1 Proposal)	6.41	5.00
6	Himachal Pradesh (1 Proposal)	5.00	5.00
7	Odisha (3 proposals)	24.68	24.68
8	Maharashtra (4 Proposals)	673.33	566.54
	Sub Total	4803.71	3150.79
9	Proposals from Private Entrepreneurs (25 proposals from 12 States)	120.23	86.02
	Sub Total	120.23	86.02
	Total	4923.94	3236.81
*As on 16.11.2022			

Table 15.2 Details of the approved proposals under FIDF (₹ In crores)

S. No.	Name of the Project	Total Project Cost	Project cost restricted for interest subvention
(i)	(ii)	(iii)	(iv)
A	TAMIL NADU		
	Construction of Fishing Harbour		
1	Tharangampadi in Nagapattinam	120.00	120.00
2	ThiruvottriyurKuppam in Tiruvallur District	200.00	150.00
3	Development of existing Fishing Harbour at Mudhunagar in Cuddalore	100.00	100.00
4	Development of Fishing Harbour at Arcottuthurai in Nagapattinam District	150.00	150.00
5	Azhagankuppam in Villupuram District	235.00	150.00
6	Development of Fishing Harbour at Vellapallam in Nagapattinam District	100.00	100.00
7	Expansion and Modernization of Thengapattinam Fishing Harbour in Kanyakumari District	253.00	150.00
	Sub Total(A)	1158.00	920.00
B	ANDHRA PRADESH		
	Construction of Fishing Harbour		
1	Uppada in East Godavari	289.4	150.00
2	Vodarevu in Prakasham	409.22	150.00
3	Machilipattinam in Krishna	252.00	150.00
4	Nizampattinam in Guntur	340.78	150.00
	Sub Total (B)	1291.40	600.00
C	GUJARAT		
	Construction of Fishing Harbour		
1	Development of Fishery Harbour at Navabandar	295.85	150.00
2	Development of Fishery harbour at Madhwa	175.07	150.00
3	Development of Fishery Harbour at Veraval – Phase 2	260.00	150.00
4	Development of Fishery Harbour Porbandar –Phase 2	392.00	150.00
5	Development of Fishery Harbour at Sutrapada	232.00	150.00
	Sub Total (C)	1354.92	750
D	MAHARASHTRA		
	Construction of Fishing Harbour		
1	Fisheries Harbour at Jeevana, Taluka Shrivardhan, District Raigad	185.48	150.00
2	Fisheries Harbour at Bharadkhol, Near Shrivardham, District Raigad	119.64	119.64
3	Fisheries Harbour at Harnai Taluka Dapoli District Ratnagiri	221.31	150.00
4	Fisheries Harbour at Sakhari Nate Taluka Rajapur District Ratnagiri	146.90	146.90
	Sub Total (D)	673.33	566.54
	Grand Total (A+B+C+D)	4477.65	2836.54

Table 15.3: Details of the Fish Landing Centres approved under FIDF (₹ In crores)

S. No.	Name of the State	Name of the Project	Total Project Cost	Project Cost eligible for Interest Subvention	
1	Odisha	Establishment of Fish Landing Centre at Sorana in Khordha District	9.27	9.27	
2		Establishment of Fish Landing Centre at Kalupadaghat in Khordha District	7.56	7.56	
3		Establishment of Fish Landing Center at Kasia in Bhadrak District	7.85	7.85	
4	Tamil Nadu	Providing additional facilities to Fish Landing Centre at Portonovo-Annankovil in Cuddalore District.	10.00	10.00	
5		Construction of Fish Landing Centre at Keelamunthal in Ramanathapuram District.	10.00	10.00	
6		Providing Additional Infrastructure facilities to Fish Landing Centre at Mudasalodai Village in Cuddalore District.	9.50	9.50	
7		Construction of Fish Landing Centre at Chandrapadi village in Nagapattinum District.	10.00	10.00	
8		Construction of Fish Landing Centre at Vanagiri Village in Nagapattinam District	8.00	8.00	
9		Construction of Fish Landing Centre at Keezhathottam Village in Thanjavur District.	8.00	8.00	
10		Extension of T-Jetty at Tharuvaikulam in Thoothukudi District.	10.00	10.00	
11		Construction of Fish Landing Centre at Mandapam (North) in Ramanathapuram District.	10.00	10.00	
12		Construction of Fish Landing Centre at Mandapam (South) in Ramanathapuram District.	10.00	10.00	
13		Construction of Fish Landing Centre at Kottaipattinam, Village in Pudukottai District.	3.05	3.05	
14		Construction of Fish Landing Centre at Vadakkamapattinam, Village in Pudukottai District.	1.55	1.55	
15		Construction of Fish Landing Centre at Puthukudi, Village in Pudukottai District.	1.40	1.40	
16		Construction of Fish Landing Centre at Aruvikarai Village in Tirunelveli District.	10.00	10.00	
			Total	126.18	126.18

CHAPTER 16

KISAN CREDIT CARD (KCC) FOR THE FISHERIES SECTOR



16.1: About the Kisan Credit Card

Fisheries and aquaculture make vital contributions to nutrition, culture, food security and livelihoods for millions of people across the country. Indian Fisheries sector evolved gradually over the years and became an important socio-economic revolution for the nation. India is the third largest fish producing nation in the world accounting for 8% of global production, registering an average annual growth of more than 7% in recent years.

To minimize the financial issues of the fisheries sector, Government of India in the Budget-2018-19 announcement extended the facility of Kisan Credit Card (KCC) to Fisheries and Animal Husbandry farmers. The main objective of KCC is to minimize the financial issues of the fisheries sector by providing timely and adequate credit to farmers to meet their production credit needs through facilitating the borrowers for availing loans from the banking system under a single window with flexible and simplified procedure to the fishermen/farmers for their cultivation and other needs.

The general requirements/needs of fishermen that are covered under Kisan Credit Card are:

- Meeting the short term credit requirements for cultivation of fish
- Post-harvest expenses;
- Produce marketing loan;
- Consumption requirements of farmer household;

16.2: Eligibility Criteria

Inland Fisheries and Aquaculture

Fishers, Fish Farmers (individual & groups/partners/share croppers/ tenant farmers), Self Help Groups, Joint Liability Groups and women groups.

The beneficiaries must own or lease any fisheries related assets such as pond, tank, open water bodies, raceway, hatchery, rearing units, boats, nets and such other fishing gear as the case may be and possess necessary authorization/certification as may be applicable in respective states for fish farming and fishing related activities and for any other State specific fisheries and allied activities.

Marine Fisheries

Beneficiaries listed above, who own or lease registered fishing vessel/boat, possess necessary fishing license/permission for fishing in estuary and sea, fish farming/mariculture activities in estuaries and open sea and any other State specific fisheries and allied activities.

16.3: Credit Limit for interest subvention and prompt repayment incentive

- For the existing KCC holders the benefits of interest subvention and prompt repayment incentive will be admissible up to the credit limit of Rs. 3 lakhs including fisheries activities.
- In the case of new card holders, the credit limit is Rs. 2 lakhs to meet their working capital requirements for fisheries activities.
- In the KCC scheme @7% is the lending rate to farmers including @2% interest subvention per annum by Govt. of India. Also, another @3% per annum is provided in case of prompt repayment as an additional incentive as per the existing guidelines.
- This implies that the farmers repaying promptly as above would get a loan @ 4% per annum effectively for loan amount upto Rs 2 lakhs.

16.4: Scale of Finance

The scale of finance will be fixed by the District Level Technical Committee (DLTC) based on local cost worked out on the basis of per acre/per unit/per animal/per bird etc. As per the guidelines issued by National Bank for Agriculture and Rural Development (NABARD), District Level Technical Committees (DLTC) headed by the District Collector/District Magistrate finalizes the Scale of Finance (SoF) for each crop in the District. Fisheries and Animal Husbandry experts of the Govt. may be made members of the committee for giving technical inputs for assessing the cash credit requirement.

16.5: Current Status

- To expand the benefit of Kisan Credit Card to all the eligible fishers and fish farmers in the country, Department of Fisheries in association with the Department of Financial Services (DFS), has organized a "Nationwide Fishery KCC Campaign" from 15th November 2021 to 31st July 2022. Nationwide Fishery KCC Campaign is again resumed from 15.09.2022 till 15.03.2023.
- As per the data provided by the Department of Financial Services total of 1,13,076 numbers of KCCs have been sanctioned for Fisheries Sector as on 28.10.2022.

Table 16.1 : Status of Progress of Issuance of KCC for Fisheries Sector *

S.N	State Name	Number of Applications		
		Received	Sanctioned	Pending
1	Andaman & Nicobar Islands	4,272	3,906	0
2	Andhra Pradesh	21,915	11,570	0
3	Arunachal Pradesh	157	11	
4	Assam	13,442	4,291	264
5	Bihar	3,338	625	106
6	Chhattisgarh	4,290	1,217	206
7	Dadra And Nagar Haveli	2	2	0
8	Delhi	23	0	0
9	Goa	409	376	0
10	Gujarat	19,125	9,748	104
11	Haryana	288	127	33
12	Himachal Pradesh	784	669	7
13	Jammu And Kashmir	1,092	756	12
14	Jharkhand	9,391	2,074	42
15	Karnataka	9,230	5,178	1,465
16	Kerala	6,501	4,993	15
17	Ladakh	130	130	0
18	Lakshadweep	12	12	0
19	Madhya Pradesh	38,164	15,941	2,703
20	Maharashtra	16,794	8,410	171
21	Manipur	308	205	2
22	Meghalaya	181	161	0
23	Mizoram	165	41	0
24	Nagaland	192	5	0
25	Odisha	6,160	1,189	89
26	Puducherry Ut	853	599	0
27	Punjab	593	190	9
28	Rajasthan	3,878	2,515	4
29	Sikkim	222	45	0
30	Tamil Nadu	28,867	8,701	171
31	Telangana	22,513	4,024	2
32	Tripura	12,157	10,770	24
33	Uttar Pradesh	12,239	7,842	390
34	Uttarakhand	562	330	195
35	West Bengal	9,380	6,115	45
	Total	247,948	113,076	6,059

Source : Department of Financial Services

*As on 28.10.2022



सत्यमेव जयते

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Government of India, New Delhi