



Work Participation of Fisher Men & Women among Coastal Fishing Communities: A Comparative Study of Two Indian States

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Introduction

- Globally, **>250 million people (India - 14.5 million)** depend directly on fisheries and aquaculture for their livelihoods and millions are employed in its value chains in roles such as processing or marketing (World Fish, 2015)
- Majority of the people are **small-scale, artisanal fishers**
- Highest no. of fishers and aquaculture workers are in **Asia (85 %)**
- Women participate in a wide range of fisheries activities both paid and unpaid
- Women mainly involved in **pre- and post-harvest operations**, as caregivers of their family and in maintaining social networks.

Introduction

- Women make up nearly half (46%) of the fisheries workforce when fish processing activities are included, and this percentage is as high as 57% in Cambodia, **72% in India**, and 73% in Nigeria (FAO,2008).
- **How gender roles are characterised in small-scale fisheries**
 - Men catch fish, while women predominantly process and sell them at market; spend 40-50% of their time in fishing related activities.
 - Perform many key activities making their husband's fishing possible - carry fishing gear & boats, transport catch to shore, repair gear.
 - Usually collect fish, frogs, snails, insects and other aquatic animals from wetlands, rice fields, mangroves, or near shore areas (Moser, 2013).

Questions & Methods

Are there any indications of changes in work participation between men and women?

Are there any evidences of further deskilling in fisheries sector? And feminisation of labour?

Study area

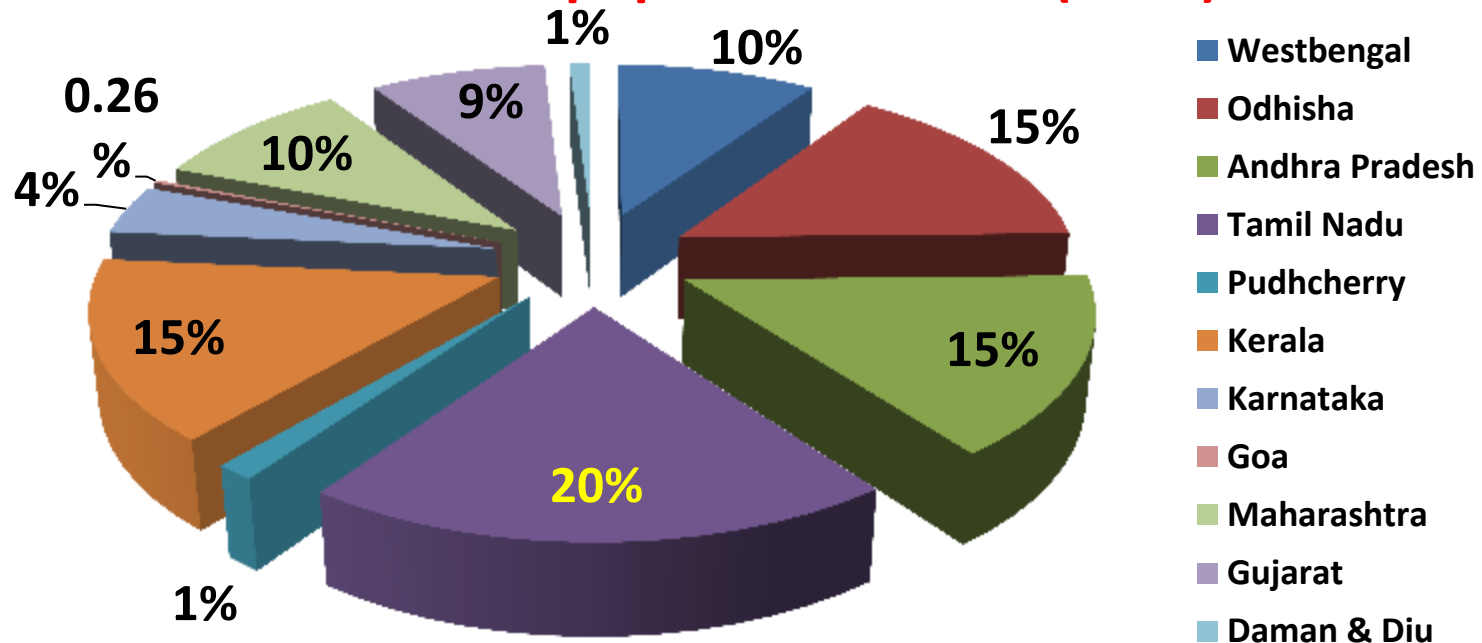
- Two coastal states of India Viz., Tamil Nadu and Maharashtra.
- Comparative study of Marine Fisheries Census of 2005 and 2010 for two coastal states.

Statistical tools used

- Descriptive analysis (Frequency, percentage etc.)
- Graphical Representation

Results & Discussion

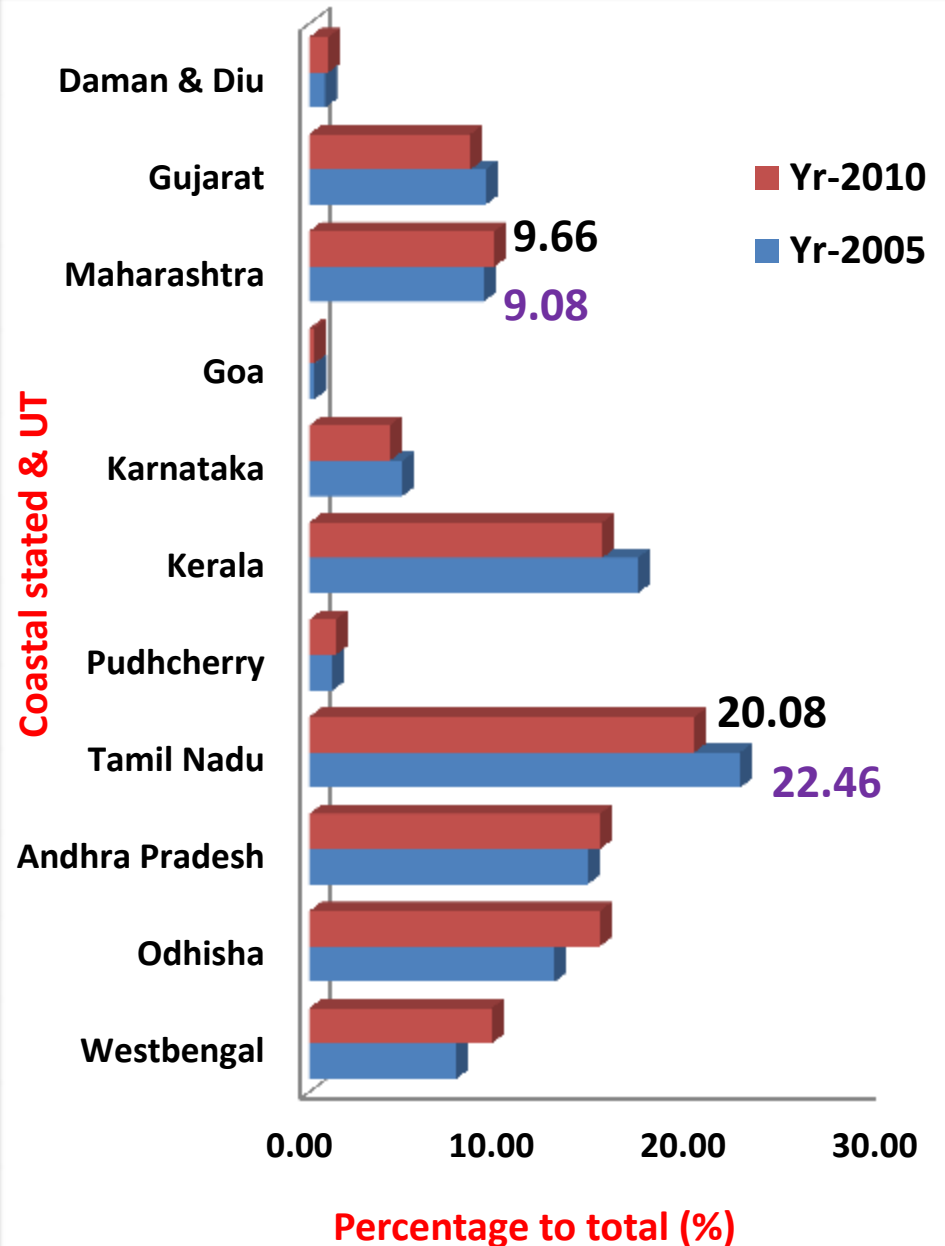
Fisherfolk population - India (2010)



- India's total fisherfolk: 3.52 million in 2005 & it grew **13.64 %** to 3.99 million by 2010
- Male and Female population are **51 %** and **49 %** respectively (2010).
- Tamil Nadu accounts for 20% population but grew only **1.58 %** whereas Maharashtra has only 9.7 % of total but grew **21 %** in 5 years

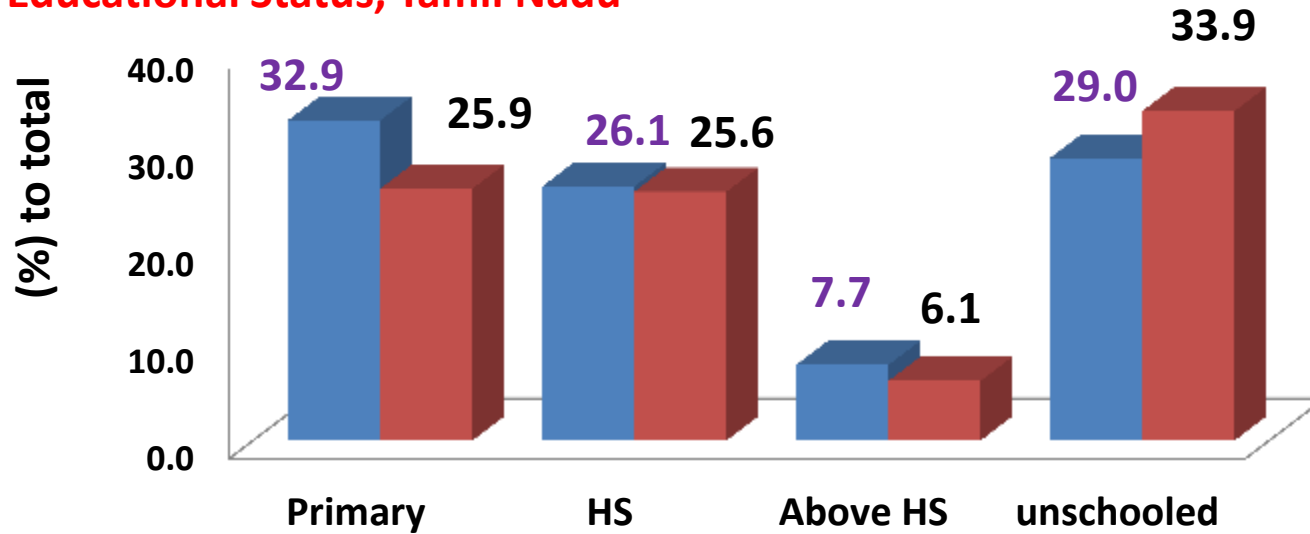
Fisherfolk Population of India

Coastal States & UT	Fisherfolk population			
	2005	(% to total)	2010	(% to total)
West Bengal	2,69,565	7.66	380,138	9.51
Odisha	4,50,391	12.80	605,514	15.14
Andhra Pradesh	5,09,991	14.49	605,428	15.14
Tamil Nadu	7,90,408	22.46	8,02,912	20.08
Pudhcherry	43,028	1.22	54,627	1.37
Kerala	602234	17.11	610,165	15.26
Karnataka	170914	4.86	167,429	4.19
Goa	10668	0.30	10,545	0.26
Maharashtra	3,19,397	9.08	3,86,259	9.66
Gujarat	323215	9.18	336,181	8.41
Daman & Diu	29305	0.83	40,016	1.00
Total	35,19,116		39,99,214	

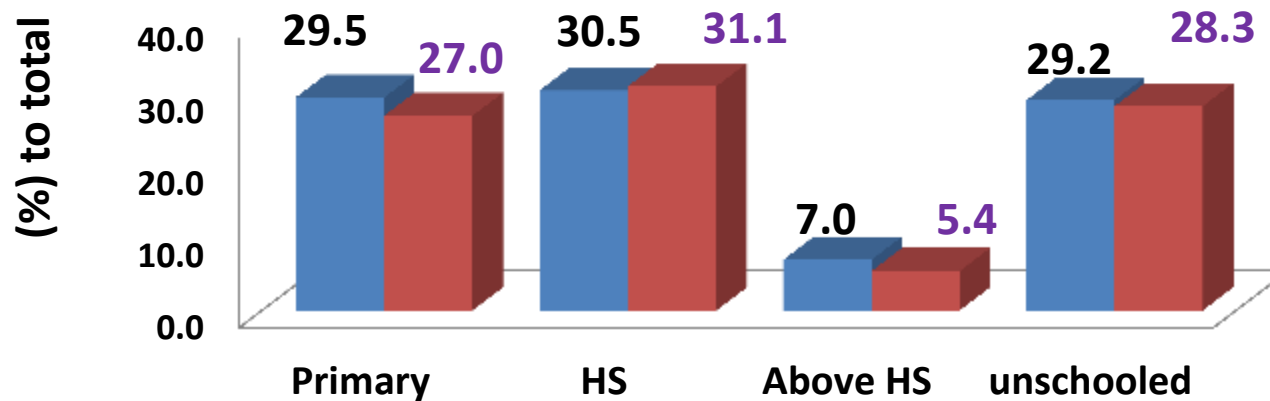


Educational Status of fisherfolk

Educational Status, Tamil Nadu



Educational Status, Maharashtra

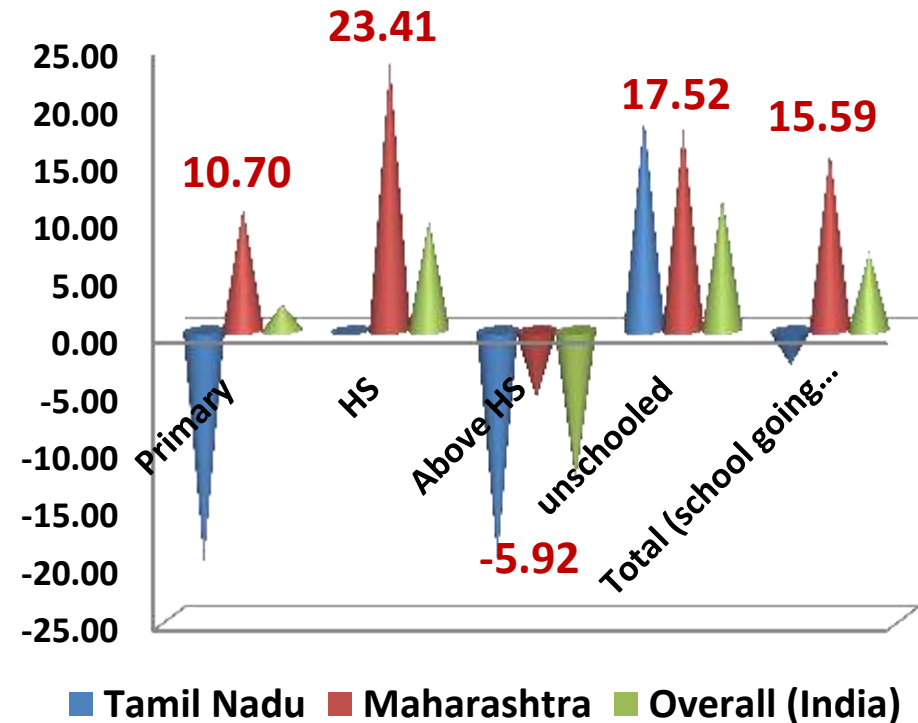


■ Yr- 2005 ■ Yr- 2010

Cont...

Rate of change from 2005 to 2010 (%)

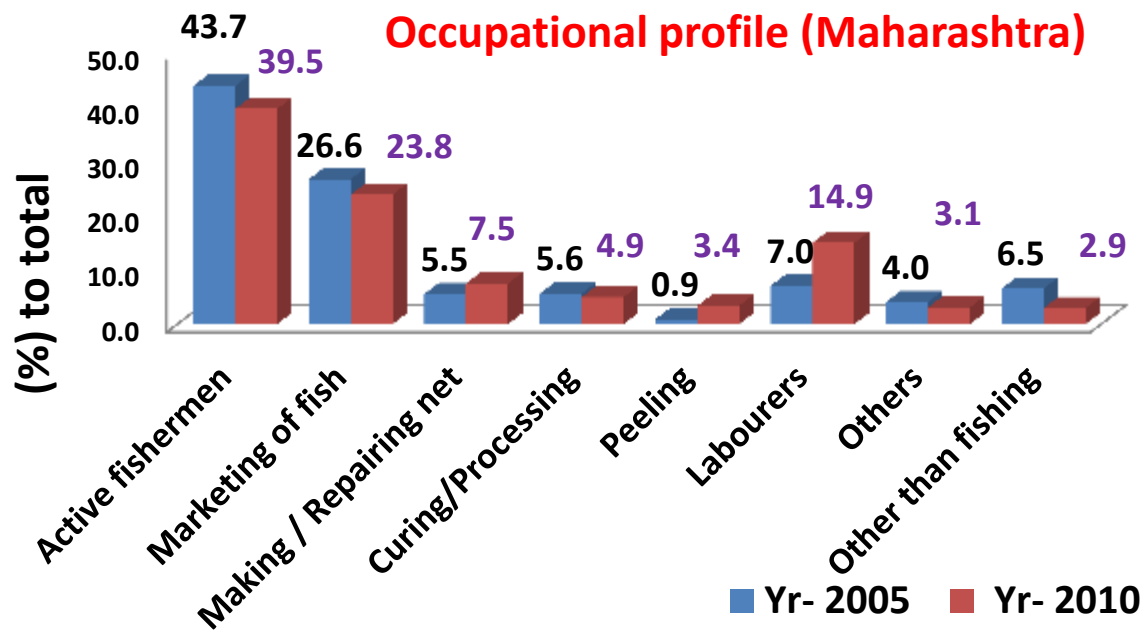
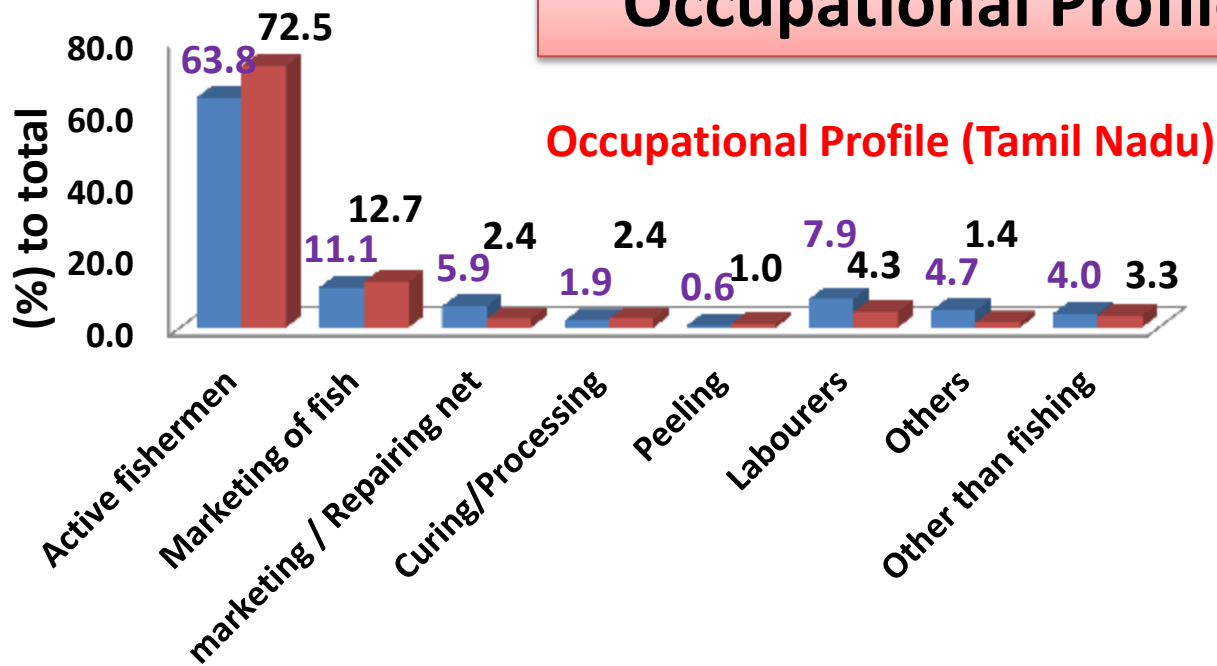
Educational Status	Tamil Nadu	Maharashtra	Overall (India)
Primary	-20.09	10.70	2.31
Higher Secondary	-0.45	23.41	9.65
Above HS	-19.84	-5.92	-13.17
Unschooling	18.48	17.52	11.63
Total (school going population)	-3.03	15.59	6.89



Gender wise education (2010)

	Tamil Nadu		Maharashtra		India	
	M	F	M	F	M	F
Primary	52.74	47.26	48.86	51.14	52.02	47.98
HS	52.17	47.83	57.15	42.85	54.69	45.31
Above HS	51.90	48.10	58.14	41.86	57.33	42.67
unschooling	50.42	49.58	45.71	54.29	49.63	50.37

Occupational Profile of Coastal States

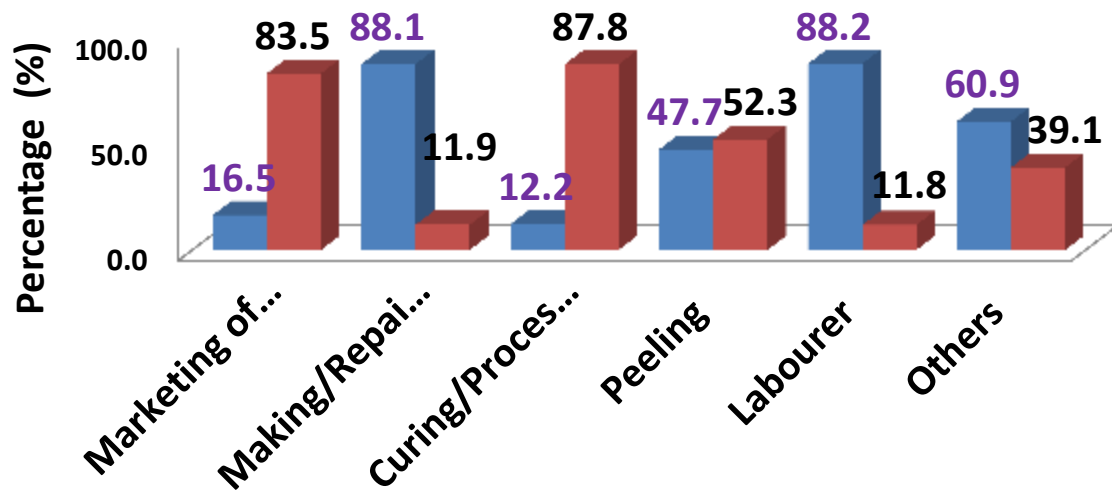


Growth Rate from 2005 to 2010

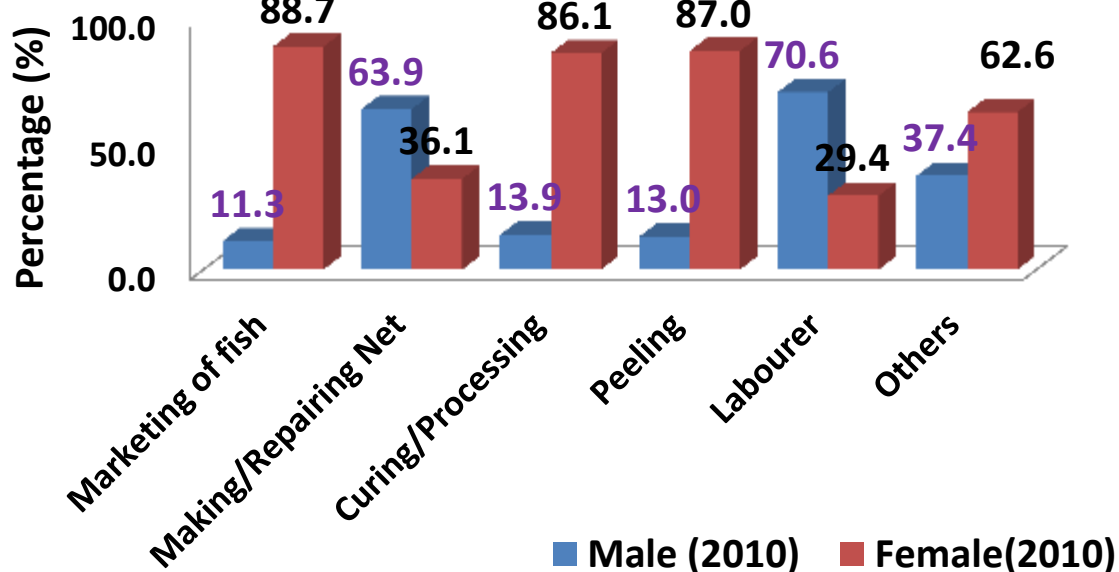
Occupational Profile	Tamil Nadu (%)	Maharashtra (%)
Active fishermen	3.46	5.93
Marketing of fish	3.64	4.90
Making / Repairing net	-63.28	59.33
Curing/Processing	14.00	3.75
Peeling	45.99	351.22
Laborers	-50.00	149.66
Others	-73.38	-11.28
Other than fishing	-23.17	-47.25
Total occupied	-8.88	17.28

Gender wise fishing allied activities , Tamil Nadu

Tami Nadu - 2005



Tamil Nadu - 2010

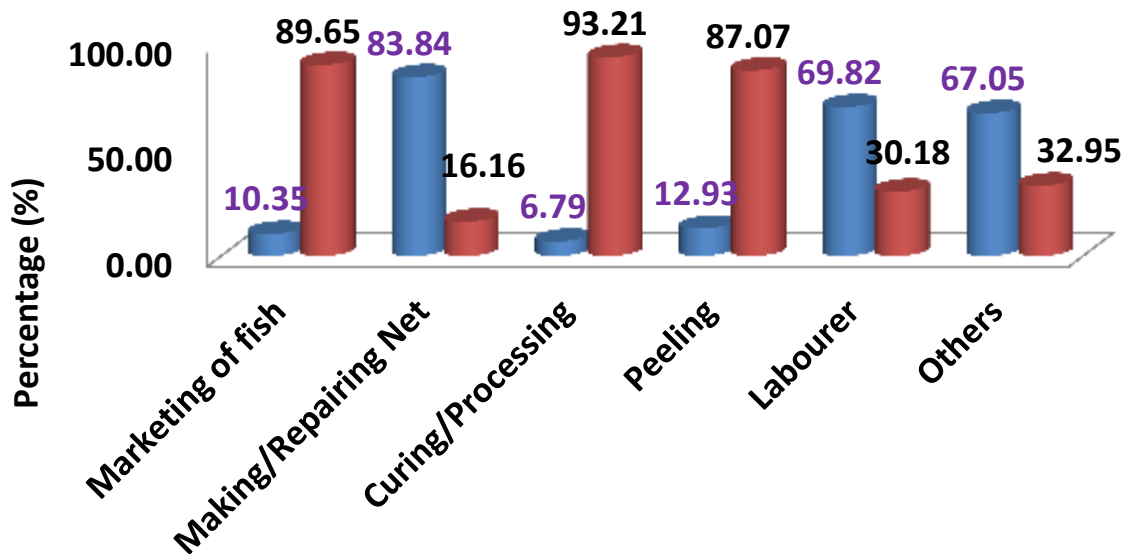


Gender wise Fishing Allied Activities (GR from 2005 to 2010)

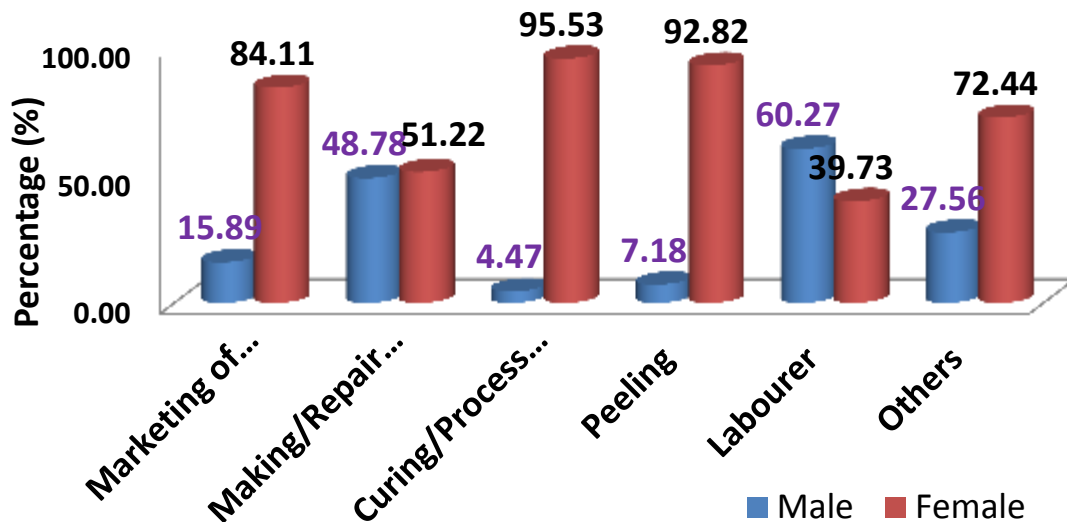
Activities	Tamil Nadu (%)	
	M	F
Marketing of fish	-17.2	7.1
Making/Repairing Net	-73.4	11.1
Curing/Processing	30.3	11.7
Peeling	-41.0	87.5
Laborers	-60.0	24.4
Others	-83.7	-57.4
Total	-63	3

Gender wise fishing allied activities, Maharashtra

Maharashtra (2005)



Maharashtra (2010)

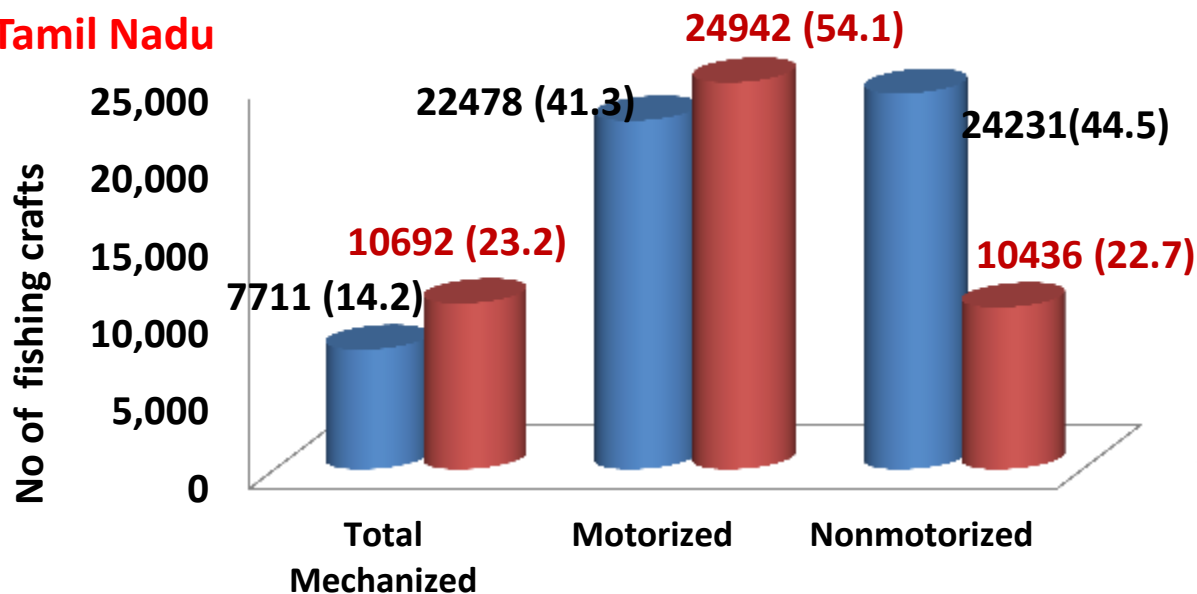


Gender-Wise Fishing Allied Activities (GR from 2005 to 2010)

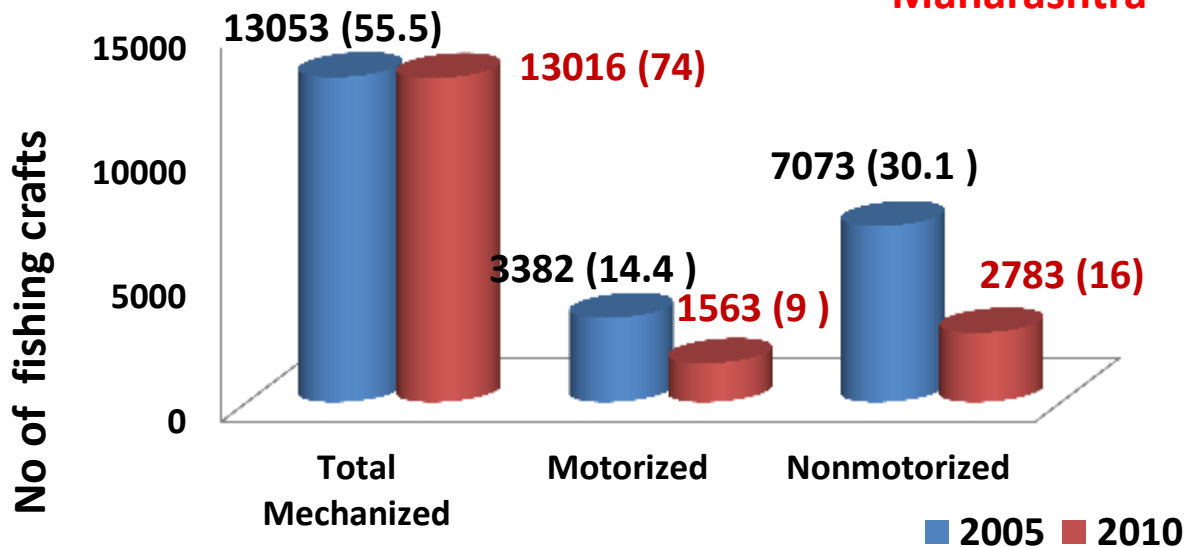
Activities	Maharashtra (%)	
	M	F
Marketing of fish	61.1	-1.6
Making/Repairing Net	-7.3	405.1
Curing/Processing	-31.7	6.3
Peeling	150.5	381.0
Laborer	115.5	228.7
Others	-63.5	95.1
Total	34.5	36.8

Fishing crafts in the fishery

Tamil Nadu



Maharashtra



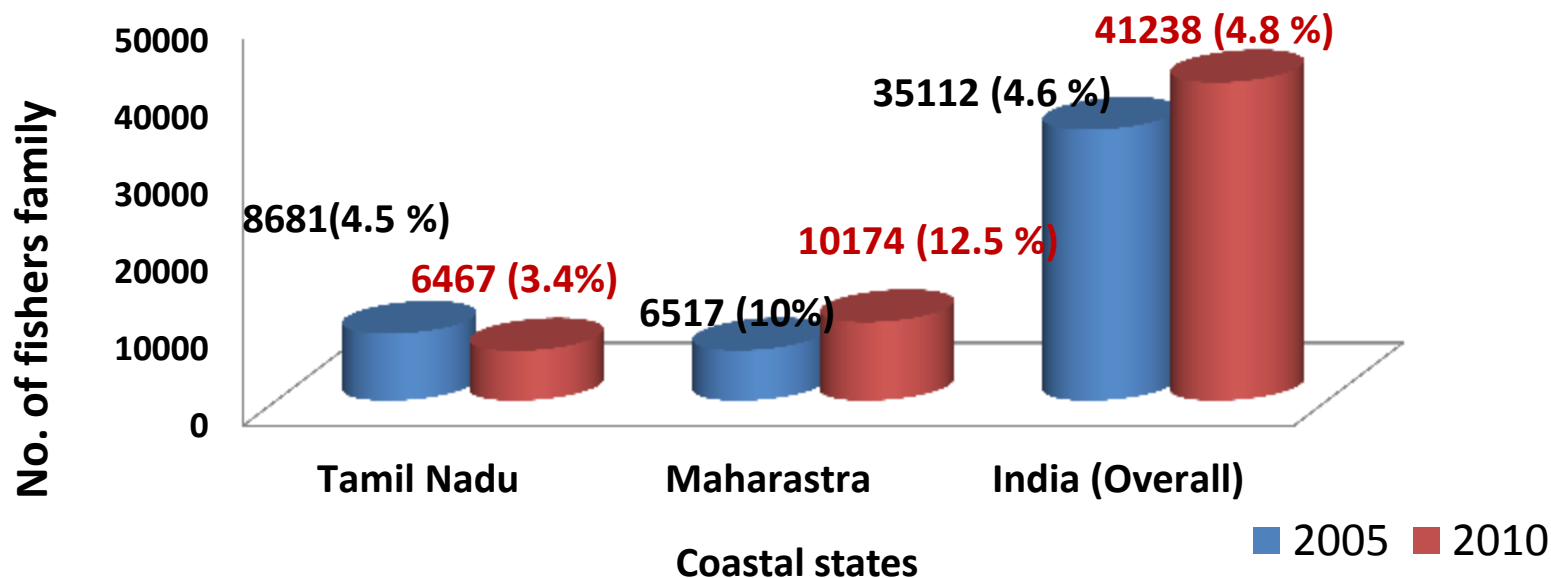
Fishing crafts in the fishery (GR from 2005 to 2010)

Fishing crafts	Tamil Nadu	Maharashtra
Total Mechanized	38.66	-0.28
Motorized	10.96	-53.78
Non motorized	-56.93	-60.65
Total	-15.34	-26.14

Women families in fishing allied activities

Coastal states	Total fishers family		Families with only women involved in fishing allied activities		
	2005	2010	2005	2010	women families GR (2005 to 2010) %
Tamil Nadu	1,92,152	1,92,697	8,681 (4.52 %)	6,467 (3.36 %)	-25.50
Maharashtra	65,313	81,492	6,517 (9.98 %)	10,174 (12.5%)	56.11
Overall	7,56,212	8,64,550	35,112 (4.64 %)	41,238 (4.8 %)	17.45

Families with only women involved in FAA



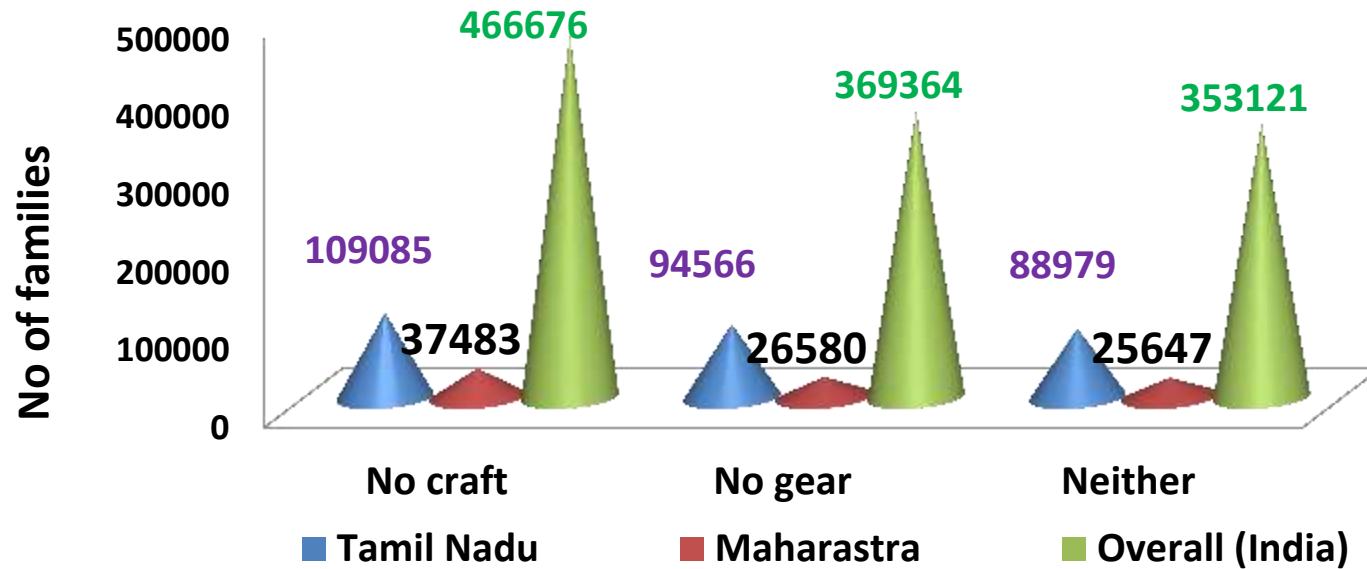
Work participation / Economic Dependency of fishers

SN	States	Total population		Active Population (fishing & allied activities)	
		2005	2010	2005	2010
1	Tamil Nadu	7,90,408	8,02,912	3,24,234 (41.0 %)	2,95,452 (36.8 %)
2	Maharashtra	3,19,397	3,86,259	1,64,794 (51.6 %)	1,93,278 (50.0 %)
3	Overall (India)	35,19,116	3,999,214	17,28,992 (49.1 %)	16,65,342 (41.64 %)

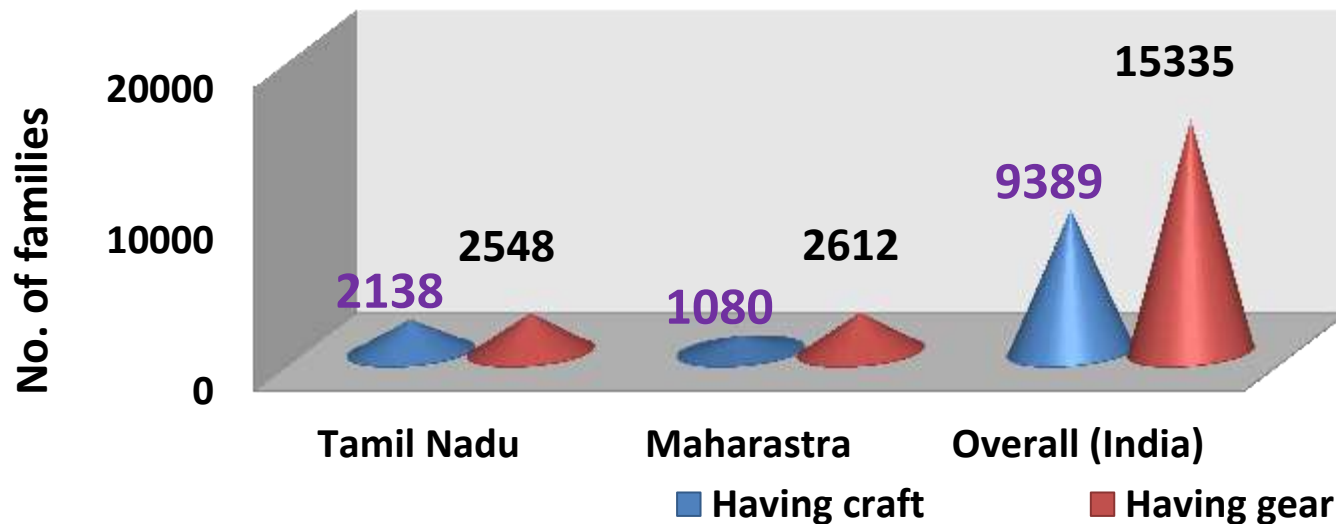
SN	States	2005	2010	Change in dependency rate (%)
1	Tamil Nadu	1.44	1.72	19.46
2	Maharashtra	0.94	1.00	6.43
3	Overall (India)	1.03	1.4	35.92

Fishers family (involved/ uninvolved in fishing)

No of families involved in fishing (2005)

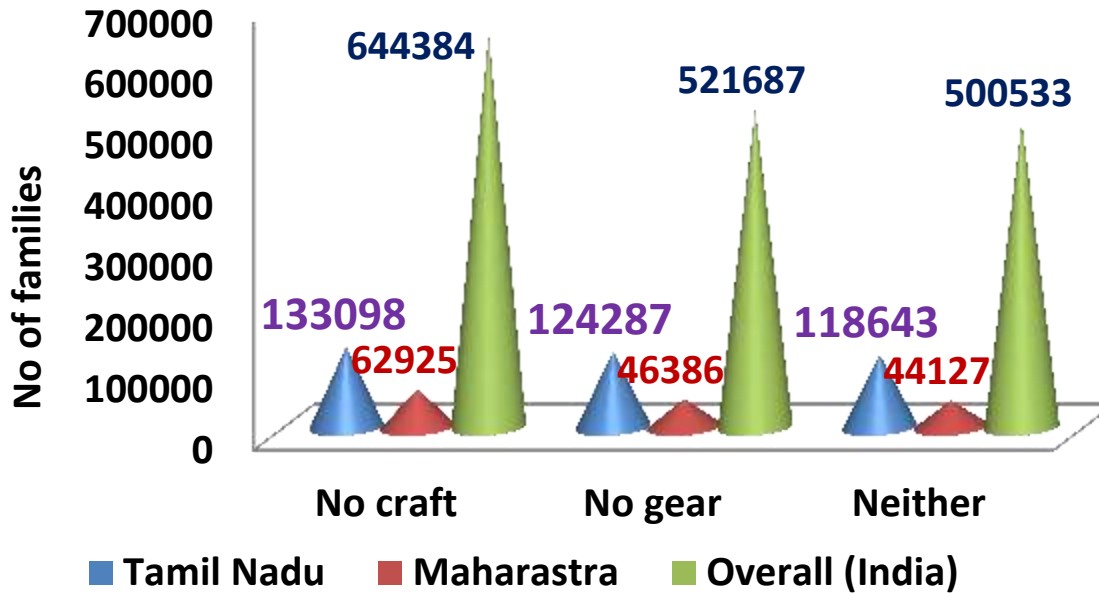


No of families not going for fishing (2005)

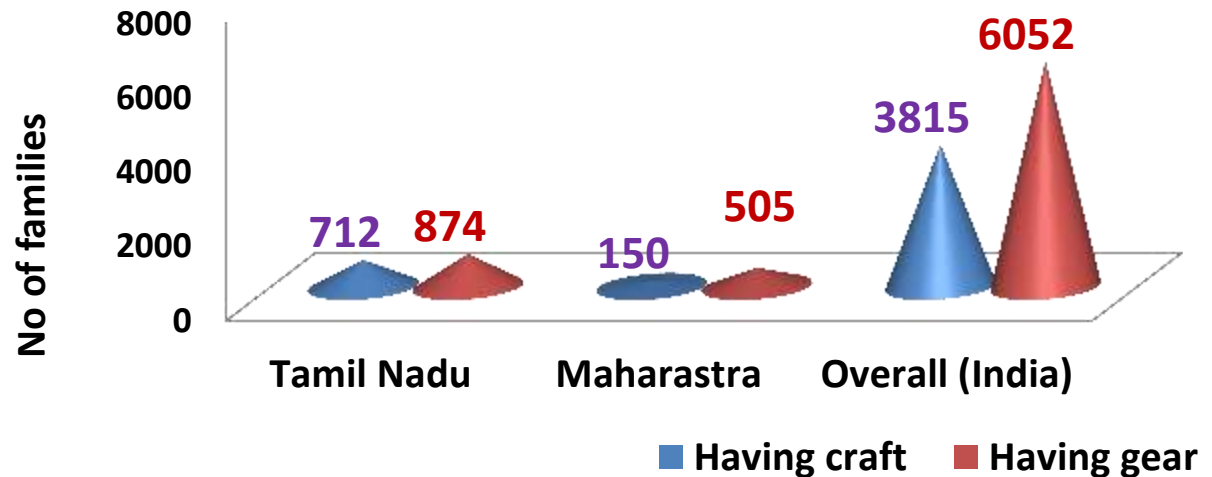


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No of families involved in fishing (2010)



No of families not going for fishing (2010)



Cont...

SN	Coastal States	Rate of change from 2005 to 2010 (%)				
		Involved in fishing			Not going for fishing	
		No craft	No gear	Neither	Having craft	Having gear
1	Tamil Nadu	22.01	31.43	33.34	-66.70	-65.70
2	Maharashtra	67.88	74.51	72.06	-86.11	-80.67
3	Overall (India)	38.08	41.24	41.75	-59.37	-60.53

Concluding Remarks

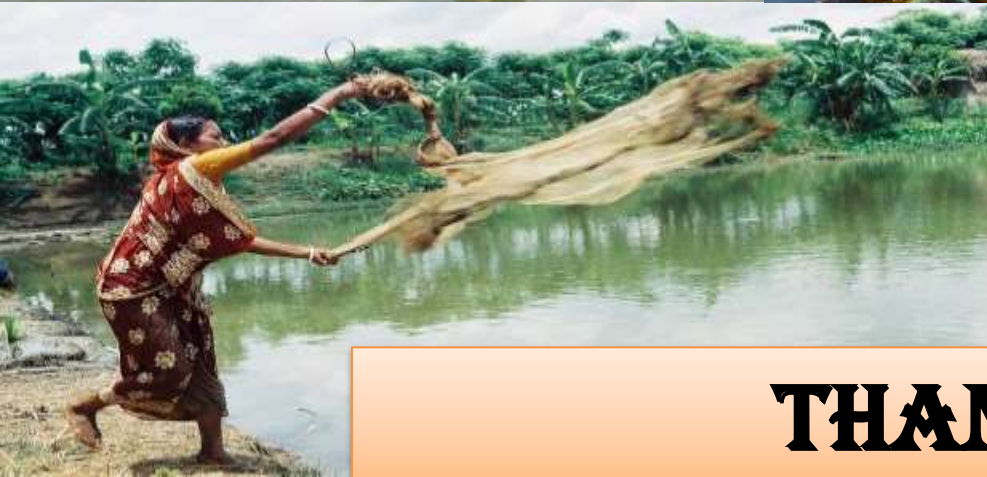
- India's total fisherfolk population had a growth of **13.64 %** from 2005 to 2010. Among which Tamil Nadu and Maharashtra had a growth of **1.58 %** and **20.9 %** respectively.
- Among the school going population, **Maharashtra had the highest growth (15.6 %)**, and **Tamil Nadu had -3.0 %**. Unfortunately, in the two coastal states and all over India unschooled population increased between these two periods.
- In the state of Maharashtra and overall (India), the females were dominant in unschooled population than the males.
- In Tamil Nadu, among the active population, it was observed that fishing allied activities viz., **peeling (46 %)** and **curing/ processing (14 %)** increased while making/repairing net and laborers (Head load workers, helpers) declined. Concerning Maharashtra's active population **peeling (351 %)** and **laborers activity (150 %)** highly increased.
- Regarding the active population, In Tamil Nadu, the male increased in curing/ processing activity the female population increased in peeling & laborers activity. While in Maharashtra, the male population increased in **peeling (150 %)** and the female increased in **making/repairing net (450 %)**, peeling and laborers

Concluding Remarks

- Increasing growth of active population engaging in fishing allied activities than the active fishing indicates **deskilling and feminization of laborers** (more work & less wage).
- In Tamil Nadu, the number of mechanised boats increased from 2005 by 38 %. Both Tamil Nadu and Maharashtra showed a reduction in the number of non-mechanized crafts, possibly due to the **mechanization and modernization of fishing crafts**.
- Families with only women involved in fishing allied activities increased in India by 17 %, and among the two states **Maharashtra had the highest growth (54 %)** .
- Tamil Nadu had the highest economic dependency of fishers, with an increase of 19 % and a ratio of **1: 1.72 (2010)**.
- The increase noted in the active participation of fishing could be attributed to the increase in fishers involved in fishing without own craft, gear nor neither as well as the increase in fishers having own crafts and gears going for fishing.
- Difficulties in comparing 2005 & 2010 Marine Fisheries Census were in some parts due to the unequal availability (data compilation/ categorization) of common variables, changes in definition and inconsistency of data (eg., Population growth and educational level)

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8. Pugazhendi, D., 2013. Comparative study of Marine Fisher-folk census 2005 and 2010 of Tamil Nadu. *Marine Fisheries Information Service; Technical & Extension Series*, (218), pp.37-40.



THANK YOU

A photograph of a rectangular, light brown cardboard tag with the words "Thank you!" written in a black, cursive font. The tag is placed on a light-colored wooden surface with a visible grain. To the left of the tag, a small black insect is visible. The background is filled with bright green, serrated leaves, likely from a young plant, which are slightly out of focus. The entire image is framed by a thin black border.

Thank
you!