

Seaweed Cultivation

An alternate Livelihood and source of Income for Coastal Fisher Populations

Significance:

- Seaweeds are macroscopic algae that inhabit marine, shallow coastal and brackish waters.
- Seaweeds are wonder plants of the seas having multiple uses as a source of food, various industrial products and chemicals (e.g. Agar, Agarose and Carrageenan) which are used in pharmaceuticals, cosmetics, processed foods, bacterial culture media, fuel, etc.



NFDB Project on Seaweed Cultivation: 3 projects are being implemented

SI No	Name & Location of Project	Components of the Project	Progress of Project
1	<p>“Mass production of spores: An approach to vigorous seed development for commercial farming of <i>Gracilaria edulis</i>”</p> <p>Technology Partner/ Implementing Agency CSIR-CSMCRI MARS, Mandapam, Tamil Nadu</p> <p>Location of Project: Mandapam, Ramanathapuram dist. Tamil Nadu</p>	<ul style="list-style-type: none"> • Establishment of facility for mass production of spores and culture. • Collection of sporophytic plants of <i>Gracilaria edulis</i> at regular interval from natural sources. • Mass production of spores from sporophytic plant in FRP tanks for plantlet production. Harvest and field transfer of seed material • Supply of <i>Gracilaria edulis</i> seed material for cultivation, to 10,000 rafts by 250 SHG groups and seaweed growers identified by Dept. of Fisheries, Tamil Nadu. 	<ul style="list-style-type: none"> • First of its kind in the country to produce Seaweed seed material from spores on commercial scale • After four cycles, from April 2018 to March 2019, CSMCRI-MARS, Mandapam, produced and supplied 900 kg of <i>Gracilaria edulis</i> seed to the seaweed cultivators in the State of Tamil Nadu.

2	<p>“Large-scale cultivation of seaweeds in the coastal areas of Ramanathapuram district, Tamil Nadu”</p> <p>Implementing Agency Dept. of Fisheries, Tamil Nadu</p> <p>Location of Project: Coastal waters of Ramanathapuram dist. Tamil Nadu</p>	<ul style="list-style-type: none"> • To install 20,000 rafts by 500 SHG groups (3 members in each group), in Ramanathapuram district, Tamil Nadu • Identification, capacity building and hand holding support to 1500 beneficiaries • <i>Gracilaria edulis</i> in 10000 rafts and the seed material will be supplied by CSMCRI-MARS centre, Mandapam. • <i>Kappaphycus alvarezii</i> will be farmed in another 10,000 rafts • Creating livelihood to 1500 beneficiaries in 2 years. 	<ul style="list-style-type: none"> • Identified and trained 750 beneficiaries. • Cultivation of <i>Gracilaria edulis</i> has been taken up by 5 beneficiaries in 50 rafts initially. • Procurement of raft material and fabrication of 6000 rafts are under process.
3	<p>“Farming of red seaweed <i>Gracilaria dura</i> on Gujarat Coast for promoting inclusive economic growth in coastal rural settings”</p>	<ul style="list-style-type: none"> ➤ Installation of tube nets/long lines. ➤ Phase-1: Inducting & training 2 beneficiaries. ➤ Phase-2: Inducting & training 7 beneficiaries. ➤ Phase-3: Inducting & training 9 beneficiaries. ➤ Harvesting ➤ Marketing ➤ Preservation of Germplasm for Monsoon Season. ➤ Phase-4: Inducting & training 36 beneficiaries. ➤ Phase-5: Inducting & training 108 beneficiaries. ➤ Preparation of manuals. 	<ul style="list-style-type: none"> ➤ 54 beneficiaries were trained in seaweed cultivation and 79.37 MT of <i>G. dura</i> harvested and 23.78 MT of <i>K. alvarezii</i> harvested in 4 cycles. ➤ 5th cycle of the project is in progress with 108 beneficiaries from 3 villages (Okha, Simar and Hatab) and will be completed by May, 2019.



Distribution of Seaweed Seed Material by Hon'ble Union Minister for Agriculture, Govt. of India