

Chief Patron



Dr. Himanshu Pathak
Director General, ICAR, New Delhi
and Secretary, DARE Govt. of India

Patron



Dr. J. K. Jena
DDG of ICAR
(Fisheries Science)

Conveners



Dr. B. K. Das
Director, ICAR-CIFRI,
Barrackpore



Dr. K. Sathyanarayana
Director, CTRTI
Ranchi



Dr. M. A. Hassan
Principal Scientist and HoD,
FEM Division, ICAR-CIFRI,
Barrackpore

Organizing Secretaries

Dr. K. Jena
Scientist-D

CTRTI, Ranchi

Dr. D. K. Meena

Senior Scientist

ICAR-CIFRI, Barrackpore

Mr. Ganesh Chandra

Scientist (SS)

ICAR-CIFRI, Barrackpore

Dr. R. Das

Scientist (SS)

ICAR-CIFRI, Barrackpore

Assistance

Mr. Rabiul S. K. STA

Mr. B. Naskar STA

Ms. R. Sadhukhan (YP-II)

Dr. K. S. Siddiqua (YP-II)



INSTITUTE INDUSTRY

INTERFACE MEET

on

WASTE TO WEALTH

“SILKWORM PUPAE AS RESHMEEN”

Date

15-03-2023

Venue

ICAR-CIFRI Auditorium

भा.कृ.अनु.प.-केन्द्रीय अंतर्स्थलीय मात्स्यकी अनुसंधान संस्थान, बैरकपुर, कोलकाता
ICAR - Central Inland Fisheries Research Institute, Barrackpore, Kolkata

Background

- Fish production from Inland waters experiencing galloping growth (10%) in the recent past.
- The increasing trend in fish production has generated a great demand for protein ingredients. Fish meal availability showing decline trend leading to price hike.
- Increasing pressure on other protein sources especially on oil cakes (soybean, ground nut, mustard) has led to their scarcity and climbing price.
- Quest for exploring novel, non-conventional, agro-industrial by products/wastes, insect based meal etc. as protein source has increased.
- The ICAR-CIFRI has been researching since decades following Sustainability Mantra of Waste to wealth approach to develop fish feeds from non-conventional, agro-industrial wastes, and insect based meal.
- The institute has the credit of developing and commercialising a floating feed, CIFRI CAGEGROW, utilising waste form brewery industry. In the series, another feed based on Black Soldier fly (BSF) meal has also been developed.
- In recent past the insect meal such as silk worm pupae, cricket, mealworm etc. has drawn attention of nutritionists/feed industries as a potential protein source for fish feed.
- Nationally, the by-product from silk industry has remained untapped till date. The easy availability of pupae meals in several Indian states especially in or adjacent to areas with significant aquaculture activities offers scope for their utilization in the fish feed sector.
- With this backdrop, the ICAR-CIFRI took up a project to utilize the silkworm pupae meal for development of fish feed focusing the common freshwater cultivable species in cages and ponds.

- In the process, the institute has developed feeds for all life stages viz.fry, fingerling, juvenile and grow-out stages with variable feed sizes (1, 2, 3 and 4 mm pellet size) utilizing pupae meal.
- The pupae meal incorporated feeds have shown good stability and floatability with good growth, survival and feed conversion efficiencies.

Objective

- ☛ To spread awareness, understanding and popularization of product generated from sericulture waste.
- ☛ To benefit the farmers, entrepreneurs and industries of this public funded research for a greater outcome.

Programme

Time	Agenda	
9:30	Registration	Sh. B. K. Naskar, Ms. Rani Sadhukhan, Dr. K. S. Siddiqua
11:00	Welcome address	Dr. B. K. Das, Director, ICAR -CIFRI, Barrackpore
	Opening Remarks	Dr. K. Sathyanarayana, Director, CTRTI, Ranchi, Dr. M. A. Hassan, HoD, FEM Division, ICAR-CIFRI, Barrackpore
11:15	Slide show on Technology details	Dr. B. K. Das, PI of the Project
11:30	Technical/ Interactive Session	Project team from ICAR-CIFRI and CSB-CTRTI, Feed Industry Partners and entrepreneurs
12:50	Vote of thanks	Dr. M. A. Hassan, HoD, FEM Division, ICAR-CIFRI, Barrackpore