

## CENTRAL SERICULTURAL RESEARCH AND TRAINING INSTITUTE, MYSORE

### MINUTES OF SPECIAL RESEARCH COUNCIL MEETING HELD ON 30.10.2023 CSRTI-MYSURU

The special meeting of Research Council of CSRTI-Mysuru was conducted on **30.10.2023** to review the new concept notes exclusively to achieve the set target as per annual action 2023-24 and also to address field problem of non-spinning of silkworm. Scientists of main institute who attended the meeting is appended at **Annexure - I**.

Dr. Balasarawathi, Scientist-D and Head, PMCE welcomed the all the scientists from main institute for the meeting. Chairperson of RC Dr. S. Gandhi Doss., Director CSR&TI, Mysuru also welcomed all the scientists from main institute for the special RC meeting. In his introductory remarks he informed that, during the meeting held on 11.10.2023 at CSRTI, Mysore conducted by Director (Tech), it was suggested to come out with a mega project in collaboration with related institutions to solve the field problem of non-spinning issue of silkworm. In addition to this, this special RC meeting is being organized to review the new concept notes exclusively to achieve the set target as per annual action 2023-24.

#### CONCEPT NOTES OF RESEARCH PROJECTS FOR APPROVAL

**1. *Development of sensor-based irrigation system for real-time irrigation scheduling in mulberry***

**Decision:** Dr. Sobhana V., Sci-C presented the concept note. Methodology and experimental details need to be modified and should be written clearly, review of literature and references need to be updated, visit to nearby research Institute where sensor-based irrigation system is available and a ready reckoner based on soil moisture content and PAN evaporation data for scheduling irrigation need to be incorporated and budget can be revised accordingly.

**(Action:** Dhaneshwar Padhan, Sci-C, Agronomy)

**2. *Evaluation and validation of nutritive and feeding value of silkworm (*Bombyx mori*) pupa meal in broiler and layer chicken***

**Decision:** Dr. Yeruva Thirupathaiah Sci-C presented the concept note. Committee approved the concept note.

**(Action:** Yeruva Thirupathaiah Sci-C, Silkworm Physiology)

**3. *Identification of potential parasitoids of *Maconellicoccus hirsutus* (Green, 1908) (Hemiptera: Pseudococcidae) and augmentation for Biological control in mulberry***

**Decision:** Dr. S. Mahiba Helen, Sci-D presented the concept note. The project can be collaborated with RSRS Salem and REC, Udumalpet.

**(Action:** S. Mahiba Helen, PML)

#### **4. *Studies on the factors responsible for non-spinning in mulberry silkworm***

**Decision:** K.B. Chandrasekhar, Sci-D presented the overall objectives and the importance of each component of the studies, as well as the work allocation between the scientists involved in the megaproject and the sub projects were presented by the respective Co-PIs. It was further conveyed that the respective Co-PIs of each component will revise the project with appropriate methodology and it was advised to concise the objectives and submit the concept note.

**(Action:** K.B. Chandrashekar, MBL, K.N. Madhusudhan, BBL, G. Mallikarjuna, SW Pathology, Bhuvanewari E., Silkworm Physiology, Mahiba Helen, PML)

##### ***Component-1: Identification of root cause of non-spinning***

**Decision:** G. Mallikarjuna, Sci-C presented the concept note. The committee approved the concept but made the following suggestions :

Revise the title as “**Survey on the occurrence of non-spinning condition in the affected area**”. Further, objectives and methodology of the concept note needs to be modified. Include analysis of pesticides from the samples of soil, leaf, and silkworm collected from the pesticide affected. Rewrite the expected outcome. It was emphasized that the revised concept should be written with clarity.

**(Action:** G. Mallikarjuna, Sci-C SW Pathology)

***Component-2: A study on the physiological changes and disease incidence leading to non spinning syndrome in mulberry silkworm Bombyx mori” proposed under the mega project entitled "Studies on factors inducing non-spinning in mulberry silkworm.***

**Decision:** Dr. Bhuvanewari E., Sci-C presented the concept note. The concept note is already approved by RCS, CO, Bangalore. RCS suggested to include the concept note under the mega project.

**(Action:** Bhuvanewari E., Silkworm Physiology)

***Component-3: Comparative cytological and cytotoxicity variations in healthy and non-spinning silkworms.***

**Decision:** Dr. K.N. Madhusudhan, Sci-D presented the concept note on cytological and cytotoxicity variations induced in the non-spinning silkworms (samples collected from field) is approved.

**(Action:** K.N. Madhusudhan, BBL)

***Component-4: A Comparative transcriptome studies in spinning and non-spinning silkworm larvae***

**Decision:** Dr. Ranjini M.S. presented the concept note. As per the discussions held, transcriptomic studies need to be taken as a separate component. The sampling procedures and methodology was discussed in the RC committee and accordingly it was advised to include in the concept

(Action: Ranjini M S, BBL)

**Component-5: Development of integrated packages for dissipating soil pesticides residue in mulberry garden for successful silkworm rearing.**

**Decision:** Dr. L. Sathish, Sci-C presented the concept note. The concept note is already approved by RCS, CO, Bangalore. RCS suggested to include the concept note under the mega project.

(Action: L. Sathish, SW Pathology)


**Component-6: Study on the impact of pesticides utilized for the control of thrips and mites on the occurrence of non-spinning condition.**

**Decision:** Dr. S. Mahiha Helen, Sci-D presented the concept note and the committee advised to involve the study on the pesticides utilized for control of thrips and mites problem and its impact on non-spinning occurrence in subsequent crops at farmers level.

(Action: S. Mahiha Helen, PML)

**The committee advised all the PIs to submit the revised concept notes after incorporating the suggestions of RC on or before 8.11.2023.**

The meeting was ended with vote of thanks to chair.

  
Director (I/C)

Annexure-I

**List of participants attended Special Research Council meeting held on 30.10.2023 at CSRTI Mysore**

#	Name & Designation
1	Dr. S. Gandhi Doss Director and Chairperson RC
2	K.B. Chandrashekar Scientist - D, CSRTI Mysore
3	Balasaraswathi.S Scientist - D, CSRTI Mysore
4	Raghunath M.K. Scientist-D CSRTI, Mysore
5	Manjappa Scientist - C CSRTI, Mysore
6	Mahesh, R. Sci - C CSRTI, Mysore
7	K.N. Madhusudhan Sci - D CSRTI, Mysore
8	Mallikarjuna .G, Sci - C CSRTI Mysore
9	Arun kumar Scientist - C CSRTI, Mysore
10	Satish L Scientist - C CSRTI, Mysore
11	Amit Kumar, Scientist - D, CSRTI, Mysore
12	Chandakanth N Scientist - C CSRTI, Mysore
13	Thirupathaiah Y. Scientist - C, CSRTI, Mysore
14	Bhuvanewari, E. Scientist - C CSRTI, Mysore
15	Divya Singh Scientist - B CSRTI, Mysore
16	Kusuma L. Scientist - C CSRTI, Mysore
17	Joycy Rani L. Scientist - C CSRTI, Mysore
18	S. Mahiba Helen Scientist - D CSRTI, Mysore
19	Ranjini M.S Sci - C CSRTI Mysore
20	Gayatri .T, Sci - C CSRTI Mysore
21	M. Muthulakshmi Scientist - D CSRTI, Mysore
22	Sobhana V Scientist - C CSRTI, Mysore
23	Tanmoy Sarkar. Scientist - C CSRTI, Mysore
24	Babu CM Sci - D CSRTI, Mysore