

## CENTRAL SERICULTURAL RESEARCH AND TRAINING INSTITUTE, MYSORE

### MINUTES OF 70<sup>th</sup> RESEARCH COUNCIL MEETING HELD ON 10.03.2023

The 70<sup>th</sup> meeting of Research Council of CSRTI-Mysuru was conducted on **10.03.2023** to review the new concept notes, concluded research projects, progress of on-going projects, Extension Communication Programmes and Capacity Building Programmes of the Institute and progress of nested units. Scientists from main institute and nested units attended the meeting. The list of the participants is appended at **Annexure - I**.

Chairperson of RC Dr. Mary Josepha (Shery) A.V., Director (i/c) CSR&TI, Mysuru welcomed all the Heads of Divisions/sections, Scientists and JRFs, SRFs, PAs of the main Institute and all Scientists from nested units, RSRs, RECs and REC sub units, who attended the meeting.

### CONFIRMATION OF THE MINUTES OF THE 69<sup>th</sup> MEETING HELD ON 16.12.2022

The minutes of the 69<sup>th</sup> meeting of RC were circulated among all the members, since no comments were received from any of the member, minutes were confirmed.

### REVIEW OF FOLLOW UP ACTION TAKEN ON DECISIONS OF PREVIOUS MEETINGS

Dr. S. Balasaraswathi Sci-D, PMCE, Head presented the follow up action taken on the decisions of last RC. The meeting continued as per the agenda.

### CONCEPT NOTES OF RESEARCH PROJECTS FOR APPROVAL

#### *1. Inhibition of Cuticle degrading enzymes of Muscardine causing pathogens*

**Decision:** The committee approved the concept and suggested to develop broad spectrum bed disinfectants to manage all the diseases of silkworm including the emerging new fungal pathogens causing disease in silkworm and document the validation of the products.

(**Action:** Dr. Satish L, Sci-C, Silkworm Pathology)

#### *2. Mapping of Pesticide Residues in Spent Pupae of Mulberry Silkworm, Bombyx mori.*

**Decision:** The committee suggested to modify the concept.

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

*3. Impact of climate change on genetic system of eupyrene and apyrene spermatogenesis and cocoon productivity in Bombyx mori L.*

**Decision:** The committee approved the concept and suggested to revise the budget.

(**Action:** Ranjini M.S.,Sci-C, BBL)

## **REVIEW ON CONCLUDED PROJECTS:**

*1. PIC01007SI: Development of protocol for production of medically fit silk (cocoon, sericin & fibroin) for clinical purposes.*

**Decision:** The committee noted the progress and advised to submit the concluded report.

(**Action:** Ravindra, Sci-C, Soil Science & Chemistry)

*2. PPA 01016SI: Development of an agronomical package for tree mulberry cultivation for wide acceptance among the seri-farmers of Southern India.*

**Decision:** The committee noted the progress and advised to submit the concluded report.

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

## **PROGRESS OF RSRs/P4 HASSAN/SSBS COONOR**

### **RSRS Salem**

Dr. Dhahira Beevi, Scientist D presented the progress.

### **RSRS Kodathi**

Dr. V. Lakshmanan presented the progress. The committee noted the progress.

### **P4 BSF Hassan**

Dr. Dayananda presented the progress and the committee noted the progress.

### **SSBS Coonoor**

Dr. V. Vijay presented the progress and the committee noted the progress

### **REC, Parbhani**

**Decision:** Jadhav Ashok Limbaji, presented the progress to the RAC and the committee noted the progress.

(**Action:** Jadhav Ashok Limbaji, Sci-C, REC, Parbhani)

## **PROGRESS OF ON-GOING PROJECTS**

*1. PIB-3632: Evaluation of superior triploid genotypes for yield and adaptability under varied agro-climatic conditions*

**Decision:** The committee noted the progress

(**Action:** M.K. Raghunath, Sci-D, MBG)

*2. PIE 13001 MI : All India Coordinated Experimental Trials for Mulberry (AICEM) –Phase-IV*

**Decision:** The committee noted the progress.

(**Action:** Manjappa, Sci-C, MBG)

3. *PIE01022SI: Evaluation of promising mulberry genotypes for higher leaf yield and resistance to root rot and root knot diseases in Primary Yield Trial*

**Decision:** The committee noted the progress.

(Action: Manjappa, Sci-C, MBG)

4. *PRP-01015 SI: Identification, evaluation and inclusion of potential antagonistic microbes in Integrated Root Rot Disease Management in Mulberry*

**Decision:** The committee suggested to conduct the field evaluations of the formulations through RSRs for proper documentation.

(Action: G. S. Arunakumar, Sci-C, Mol.Bio.I)

5. *PIE-01014SI- Development of Distinctiveness, Uniformity and Stability (DUS) Descriptors for Mulberry (Morus spp.) and their Validation - Phase III*

**Decision:** The committee noted the progress.

(Action: Bhavya M. R., Sci-C, Mol. Bio. I)

6. *PIB-3633- Development of highly productive and widely adapted mulberry using exotics and wild germplasm*

**Decision:** The committee suggested to present the seed germination data in the next RC.

(Action : G. S. Arunakumar, Sci-C, Mol. Bio. I)

7. *BPS 01013 CN: Utilization and diversification of silkworm pupae products for human & animal consumption and composting.*

**Decision:** The committee noted the progress.

(Action: Y. Thirupathaiah, Sci-C, S.W.Physiology)

8. *MOE 01021 SI: Evaluation and popularization of improved technologies developed in the field of mulberry sector for South India*

8.1. *Evaluation of Chawki Feed Supplement Formulation in Commercial chawki rearing centers*

**Decision:** The committee noted the progress and advised to conclude the project as per milestones.

(Action : Bhuvaneswari, Sci-C, S.W.Physiology)

8.2. *Popularization of G11x G19 double hybrid in Kolar region of Karnataka*

**Decision:** The committee noted the progress and advised to conclude the project as per milestones.

(Action : Madhusudhan, Sci-D, BBL)

8.3. *Evaluation of productive double hybrid, DHP5 at farmers' level*

**Decision:** The committee noted the progress and advised to conclude the project as per milestones.

(Action :Meenal, Sci-D, BBL)

#### 8.4. Evaluation of newly developed multiviral diseases tolerant bivoltine hybrid RDIN1

**Decision:** The committee noted the progress and advised to conclude the project as per milestones.

(Action : Satish L., Sci-D, BBL)

#### 8.5. Evaluation of Cauvery Gold (MV1 × S8): An improved crossbreed for cocoon productivity and silk quality

**Decision:** The committee noted the progress and advised to conclude the project as per milestones.

(Action : K.B.Chanrashekar, Sci-D, BBL)

#### 8.7. Evaluation of robust bivoltine silkworm hybrids suitable for different regions of high temperature and high humidity conditions

**Decision:** The committee noted the progress and advised to collect the comments on the crop performance from RSRSs to drop the study due to poor performance and non acceptance by the farmers which needs to be reported to CO for further action.

(Action :R.Meenal,,Sci-D, BBL)

#### 8.9. Impact of drip fertigation technology on mulberry productivity

**Decision:** The committee noted the progress.

(Action : Mahesh,,Sci-C, Agronomy)

#### 9. AIB 01009 MI: Evaluation of new bivoltine silkworm double hybrid TT21xTT56 at farmers level for authorization and commercial exploitation

**Decision:** The committee noted the progress.

(Action :K.N.Madusudhan, Sci-D, BBL)

#### 10. AIB 01011 SI - Development of multivoltine foundation crosses for productivity and high silk percentage

**Decision:** The committee noted the progress.

(Action : K.B.Chanrashekar, Sci-D, BBL)

#### 11. PPF01017SI: Economics of mulberry sericulture in South India

**Decision:** The committee noted the progress and advised to verify the data of average cocoon yield/100 dfls.

(Action : Raveendra M Mattigatti, Sci-D, SEEM)

12. AIT-01019-SI: Screening of drugs/Inhibitors to inhibit the PI3K-Akt pathway in *Bombyx mori* for controlling Nuclear Polyhedrosis virus infection.

**Decision:** The committee noted the progress.

(Action : G. Mallikarjuna, Sci-C, S.W.Pathology)

13. AIC01023SI: Development of Spectroscopic Tests for Insecticide Resistant Biomarkers in silkworm, *Bombyx mori*.

**Decision:** The committee noted the progress.

(Action : L. Sathish, Sci-C, S.W.Pathology)

14. AIB 01024 MI: Development of productive, autosexing silkworm breeds/ hybrids of *Bombyx mori* L. in egg stage and separation of male silkworm population by optical sorting.

**Decision:** The committee noted the progress. It was suggested to visit the companies for finalising the manufacturing of the optical colour sorting machine.

(Action: Kusuma L., Sci-C, BBL)

15. MTL01025MI -Life cycle assessment of mulberry silk: A National Assessment

**Decision:** The committee noted the progress.

(Action : Amit Kumar, Sci-C, SSC)

16. AIE 01026 MI: Evaluation of new bivoltine double hybrid, BFC1xBFC10 at farmers level for authorization for commercial exploitation.

**Decision:** The committee noted the progress.

(Action : K.B. Chandrashekar, Sci-D, BBL)

17. BPS 01027 CN:Immunomodulatory and adjuvant effects of Chitosan Nanoparticles extracted from *Bombyx mori*

**Decision:** The committee noted the progress.

(Action: Madhusudhan K.N, Sci-D, BBL)

18. BPS 01028 CN: Value Addition of Cellulose and Chitin Isolated from Sericulture Waste for Advanced Packaging Applications

**Decision:** The committee noted the progress.

(Action: Madhusudhan K.N, Sci-D, BBL)

19.ARE01029MI: Recommendations of novel fungicidal and insecticidal applications for mulberry

**Decision:** The committee noted the progress and advised to check the safety testing data and crop performance.

(Action S. Mahiba Helen, Sc-D, PML)

20. PRE01030CN : Development of an integrated management package for the broad mite, *Polyphagotarsonemus latus* (Acari: Tarsonemidae), in mulberry

**Decision:** The committee noted the progress.

(Action S. Mahiba Helen, Sc-D, PML)

21. MOE01031CN Technology Demonstration and Evaluation of Rearing Performance of Bivoltine Mulberry Sericulture In Navasari District (Gujarat)

**Decision:** The committee noted the progress

(Action: Jadhav Ashok Limbaji, Sci-C, REC, Parbhani)

22. AIB 01032 SI: Validation of silk regulators - ubiquitin and mannosidase among silkworm breeds

**Decision:** The committee noted the progress.

(Action: Kusuma L, Sci-C, BBL)

23. ARP-01033CN: Mulberry Silkworm Disease Monitoring and Management in Southern States of India.

**Decision:** The committee noted the progress.

(Action Mallikarjuna G, Sci-C, SW Pathology)

#### **General decisions**

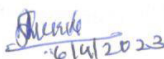
All RSRSs and RECs are advised to report the silkworm crop failures with the reasons.

(Action: All RSRSs/RECs)

Study on Integrated farming in mulberry should be taken up in Farmers participatory mode

(Action : Agronomy section: CSRTI, Mysuru)

Dr.Balasaraswathi, Head PMCE proposed the vote of thanks.

  
RC, Chairman  
[Dr. Mary Josepha (Shery) A.V.]  
DIRECTOR (I/C)

**Annexure-I****List of participants attended Research Council meeting held on 10.03.2023**

#	Name & Designation		Name & Designation
1	Mary Josepha A.V, Director (i/c) and Chairperson RC	25	Mahesh, R. Sci-C CSRTI, Mysore
2	V. Lakshmanan, Sci-D, RSRS Kodathi	26	Kusuma L. Sci-C CSRTI, Mysore
3	Kulkarni,S.B. Sci-D RSRS Kodathi	27	Bhuvaneshwari , E. Sci-C CSRTI, Mysore
4	N. Dhahira Beevi Sci-D RSRS Salem	28	Ranjini M.S Sci-C CSRTI Mysore
5	R. Shayana, STA, RSRS Chamarajanagara	29	Bhavya M. R. Sci-C CSRTI, Mysore
6	Dayananada, Sci-D, P4 Hasan	30	Shivakumar, Sci-C, CSRTI, Mysore
7	V. Vijay, Sci-C, SSBS Coonoor	31	Manjappa Sci-C CSRTI, Mysore
8	Jadhav A.L., Sci-C, REC Parbhani	32	Arun kumar Sci-C CSRTI, Mysore
9	S. Balasaraswathi Sci-D CSRTI, Mysore	33	Tanmoy Sarkar. Sci-C CSRTI, Mysore
10	K.B. Chandrashekar Sci - D, CSRTI Mysore	34	Satish L Sci-C CSRTI, Mysore
11	R.Bhagya Sci-D CSRTI, Mysore	35	Ravindra Sci-C CSRTI, Mysore
12	Raghunath M.K. Sci-D CSRTI, Mysore	36	Thirupathaiah Y. Sci-C, CSRTI, Mysore
13	Babu C.M. Sci-D	37	Mallikarjuna G, Sci-C, CSRTI Mysuru
14	R. Meenal Sci-D CSRTI, Mysore	38	Amit Kumar, Sci-C, CSRTI, Mysore
15	M. Muthulakshmi Sci-D CSRTI, Mysore	39	Rekha M DD(Stats) CSRTI Mysore
16	Sanath Kumar Sci-D CSRTI, Mysore	40	H.M.Munikrishnappa, AD, CSRTI Mysuru
17	Ravindra Mattigatti, Sci-D	41	Nayashree, PA
18	S.M. Hukkeri, Sci-D	42	Rashmitha R, PA
19	M.N. Chandrashekar Sci - D, CSRTI Mysore	43	Chandini S, PA
20	S. Mahiba Helen Sci-D CSRTI, Mysore	44	Chaithra S, PA
21	K.N. Madhusudhan Sci -D CSRTI, Mysore	45	P. Sowbhagya, SRF
22	Gayatri .T, Sci-C CSRTI Mysore	46	Keerthana Varshini, PA
23	Divya Singh Sci- C CSRTI, Mysore	47	Nisarga N.R, JRF
24	Dhaneswar pradhan Sci-C CSRTI, Mysore		