

50-21
0

No. BT/PR25296/NER/95/1116/2017
GOVERNMENT OF INDIA
MINISTRY OF SCIENCE & TECHNOLOGY
DEPARTMENT OF BIOTECHNOLOGY
(NER-BPMC)

App. No.: Agri/2017/96

Block 2, 6-8th Floors
CGO Complex, Lodhi Road,
New Delhi- 110 003
Dated: 12/06/2018

ORDER

Sanction of the President is hereby accorded, under Rule 18 of the Delegation of Financial Powers Rules, 1978, for the implementation of the project entitled: "**Whitefly (*Bemisia tabaci*) in North Eastern India: Diversity, factors of virus transmission and natural inhibitor**" for a period of 3 Year 0 Month at a total cost of Rs. **10219984** (Rupees One Crores Two Lakhs Nineteen Thousand Nine Hundred and Eighty Four Only) on the terms and conditions detailed here under:-

2 The Project :

2.1 Title : "**Whitefly (*Bemisia tabaci*) in North Eastern India: Diversity, factors of virus transmission and natural inhibitor**"

2.2 Details of the Investigators:

Project Coordinator

Dr. Bhaben Tanti

Professor

Botany

Gauhati University

Department of Botany, Gauhati University, Guwahati, Assam, 781014

Principal Investigators:

Mold. Ash

Dr. Bhaben Tanti
Professor
Botany
Gauhati University
Department of Botany, Gauhati
University, Guwahati, Assam,
781014

Dr. Amalendu Ghosh
Scientist Sr. Scale (Entomology)
Advanced Centre for Plant Virology
Indian Agricultural Research
Institute, Pusa Campus, New Delhi
Advanced Centre for Plant Virology,
Division of Plant Pathology,
Indian Agricultural Research
Institute (ICAR)
New Delhi, New Delhi, Delhi,
110012

Prof. Sanjib Kumar Panda
Professor
Life Sciences and Bioinformatics
Assam University
Department of Life Sciences and
Bioinformatics, Assam University,
Silchar, Silchar, Assam, 788011

CO-PI:

Dr. Pranjan Barman
Assistant Professor
Biotechnology
Gauhati University
Department of Biotechnology, Gauhati
University, Guwahati - 781014, Assam

Dr. Bikash Mandal
Principal Scientist
Division of Plant Pathology
Indian Agricultural Research Institute
Division of Plant Pathology, IARI, Pusa
Campus, New Delhi - 110012, Delhi

Dr. Anirban Roy
Principal Scientist
Plant Pathology
Indian Agricultural Research Institute
Advanced Centre for Plant Virology, Division of
Plant Pathology, IARI, Pusa, New Delhi, New
Delhi - 110012, Delhi

Nald. Ach

2.3 Objectives:

Overall Objectives:

1. To explore the biodiversity of whitefly (*Bemisia tabaci*) in North Eastern region by linking the genetic information with biological traits
2. Identification of biological factors and genes influencing the transmission of begomovirus (Chili leaf curl virus) by whitefly (*B. tabaci*)
3. Evaluation of natural products indigenous to North Eastern India as deterrent to whitefly (*B. tabaci*).

Institute wise Objectives:

Assam University

1. Objective 2: Identification of biological factors and genes influencing the transmission of begomovirus (Chili leaf curl virus) by whitefly (*B. tabaci*)

Gauhati University

1. Objective 1: To explore the biodiversity of whitefly (*Bemisia tabaci*) in North Eastern region by linking the genetic information with biological traits.
2. Objective 2: Identification of biological factors and genes influencing the transmission of begomovirus (Chili leaf curl virus) by whitefly (*B. tabaci*)
3. Objective 3: Evaluation of natural products indigenous to North Eastern India as deterrent to whitefly (*B. tabaci*).

Indian Agricultural Research Institute, Pusa Campus, New Delhi

1. To explore the biodiversity of whitefly (*Bemisia tabaci*) in North Eastern region by linking the genetic information with biological traits.
2. Identification of biological factors and genes influencing the transmission of begomovirus (Chili leaf curl virus) by whitefly (*B. tabaci*)
3. Evaluation of natural products indigenous to North Eastern India as deterrent to whitefly (*B. tabaci*).

2.4 Time Schedule:

The duration of the project is 3 Year 0 Month from the date of this sanction order.

2.5 Project Cost:

The total cost of the project is Rs. **10219984/-** (Rupees One Crores Two Lakhs Nineteen Thousand Nine Hundred and Eighty Four Only) as per details given below :

N. P. D. Asha

Institute	Year I	Year II	Year III	Total Cost(Rs.)
1. Assam University	1530000	780000	719996	3029996
2. Gauhati University	2560000	860000	802996	4222996
3. Indian Agricultural Research Institute, Pusa Campus, New Delhi	1140000	990000	836992	2966992
Total (Rs.)	5230000	2630000	2359984	10219984

Institute wise details are:

Budget Head	Year I	Year II	Year III	Total(Rs.)
1. Gauhati University				
Equipment	1000000.00			1000000.00
Manpower	360000.00	360000.00	402996.00	1122996.00
Consumables	1000000.00	300000.00	200000.00	1500000.00
Overhead	100000.00	100000.00	100000.00	300000.00
Contingency	50000.00	50000.00	50000.00	150000.00
Travel	50000.00	50000.00	50000.00	150000.00
Total (Rs.)	2560000.00	860000.00	802996.00	4222996.00
2. Assam University				
Equipment	500000.00			500000.00
Manpower	330000.00	330000.00	369996.00	1029996.00
Overhead	100000.00	50000.00	50000.00	200000.00
Consumables	500000.00	300000.00	200000.00	1000000.00
Contingency	50000.00	50000.00	50000.00	150000.00
Travel	50000.00	50000.00	50000.00	150000.00
Total (Rs.)	1530000.00	780000.00	719996.00	3029996.00
3. Indian Agricultural Research Institute, Pusa Campus, New Delhi				
Equipment	400000.00			400000.00
Manpower	390000.00	390000.00	436992.00	1216992.00
Consumables	250000.00	500000.00	250000.00	1000000.00

Mold. Ash

Contingency	50000.00	50000.00	50000.00	150000.00
Overhead			50000.00	50000.00
Travel	50000.00	50000.00	50000.00	150000.00
Total (Rs.)	1140000.00	990000.00	836992.00	2966992.00

2.6 Equipment:

The details of the equipment sanctioned for the implementation of the project at
Annexure-I

2.7 Manpower:

The details of the manpower sanctioned for the implementation of the project at
Annexure-II

Mold. Adh

3. Head of Account:

The **Non-Recurring** expenditure involved is debitable to:

Demand No. 85	Department of Biotechnology
3425	Other Scientific Research 2018-2019
3425.60	Others (Sub Major Head)
3425.60.200	Assistance to other Scientific Bodies (Minor Head)
3425.60.200.29	Biotechnology Research and Development
3425.60.200.29.17	Assistance for Research and Development
3425.60.200.29.17.35	Grants for creation of capital assets

The **Recurring** expenditure involved is debitable to:

Demand No. 85	Department of Biotechnology
3425	Other Scientific Research 2018-2019
3425.60	Others (Sub Major Head)
3425.60.200	Assistance to other Scientific Bodies (Minor Head)
3425.60.200.29	Biotechnology Research and Development
3425.60.200.29.17	Assistance for Research and Development
3425.60.200.29.17.31	Grants-in-Aid General

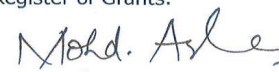
4. Terms & Conditions:

Additional Terms and Conditions specific for Twinning R and D program for NER:

- a. Both NER and Rest of India RoI Institutions scientists should work together for the objectives stated in the sanction of the project and any deviation from this would attract closure of the project at any point of time.
- b. In the project review meetings, both the PIs from NER and RoI Institutions should participate and make presentation.
- c. The outcomes of the project such as research papers, patents, copy rights etc. should be made jointly.
- d. The NER Scientists are to be trained at the collaborating institute appropriately to empower the NER Scientists.
- e. The project personal such as Research Associate, JRF or SRF, Research Assistant are also to be trained at least once in the collaborating national institute.
- f. The collaborating institute scientist should visit NER institutions more frequently to guide NER scientists in design and conduct of experiments.

N. K. Ad...

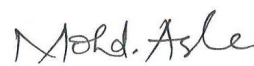
- 4.1 The other terms and conditions governing this sanction are attached at Annexure- III.
- 4.2A Memorandum of Agreement (MoA) will be signed between the Department of Biotechnology and the grantee institution on Non-Judicial stamp paper Rs. 100/- in the enclosed format and the second release/installment will be made only after signing of MoA by the grantee institutions and its acceptance by DBT. In case of NGO or Private Institution, MOA signed is mandatory first release. A format of the MoA is enclosed in Annexure-IV
- 4.3 The Institute/Agency will keep the whole of the grant in a Bank Account earning interest, and the interest so earned should be reported to DBT in the Utilisation Certificate and Statement of Expenditure. The Interest so earned will be treated as created to the institute/Agency and shall be adjusted towards further installment of the grant and or at the time of Final Settlement of Accounts.
- 5.No International Travel will be undertaken from the sanctioned project grant unless specified otherwise.
- 6.The Director, Indian Agricultural Research Institute, Pusa Campus, New Delhi, New Delhi, Delhi and The Registrar, Assam University , Silchar, Assam and The Registrar, Gauhati University, Guwahati, Assam would be responsible for submission of Statements of Expenditure (SoE), utilization certificates (UC), Assets Certificates, Manpower staffing & expenditure details in prescribed DBT formats to DBT in respect of grants released in this project from time to time.
- 7.PI's of DBT sponsored projects can consider appointment of JRF from Category-II merit list of DBT-BET exam so that candidates can be paid fellowships at par with NET/GATE/BET qualified candidates as per DST OM No. A.SR/S9/Z-09/2012 dated on 21 Oct 2014. However, there is no compulsion on PI's to select candidates for JRF in their projects from Category-II of DBT-BET.
- 8.As per Rule 236 (1) of GFR 2017, the accounts of all Grantee Institutions or Organisations shall be open to inspection by the sanctioning authority and audit, both by the Comptroller and Auditor General of India under the provision of CAG(DPC) Act 1971 and internal audit by the Principal Accounts Office of the Ministry or Department, whenever the Institution or Organisation is called upon to do so.
- 9.If the Research Project involves biological resource, the obligations under the Biological Diversity Act 2002 as applicable shall be complied with by the Project Investigator, the details of such obligations can be accessed at www.nbaindia.org
- 10.This issues under the power delegated to this Department and with the concurrence of IFD vide their SAN No. **102/IFD/SAN/590/2018-2019** dated **May, 29 2018**.
- 11.This sanction order has been noted at serial no. 56-57 in the Register of Grants.


(Dr. Mohd Aslam)
Adviser/Scientist 'G'

To,
The Pay & Accounts Officer,
Department of Biotechnology,
New Delhi – 110 003.

Copy to:

- 1 The Principal Director of Audit (Scientific Departments), DACR Building, New Delhi- 110 002.
- 2 Prof. Bhaben Tanti(Project Co-ordinator), Department of Botany, Gauhati University Guwahati 781014, Assam
- 3 The Director, Indian Agricultural Research Institute, Pusa Campus, New Delhi, Indian Agricultural Research Institute, Pusa Campus, New Office, New Delhi - 110012, Delhi
- 4 The Registrar, Assam University , Silchar - 788011, Assam
- 5 The Registrar, Gauhati University, Gopinath Bordoloi nagar, Guwahati University, Guwahati - 781014, Assam
- 6 Dr. Amalendu Ghosh, Scientist Sr. Scale (Entomology), Advanced Centre for Plant Virology, Indian Agricultural Research Institute, Pusa Campus, New Delhi, Advanced Centre for Plant Virology, Division of Plant Pathology, Indian Agricultural Research Institute (ICAR) New Delhi, New Delhi - 110012, Delhi
- 7 Dr. Anirban Roy, Principal Scientist, Plant Pathology, Indian Agricultural Research Institute, Advanced Centre for Plant Virology, Division of Plant Pathology, IARI, Pusa, New Delhi, New Delhi - 110012, Delhi
- 8 Dr. Bhaben Tanti, Professor, Botany, Gauhati University, Department of Botany, Gauhati University, Guwahati - 781014, Assam
- 9 Dr. Bikash Mandal, Principal Scientist, Division of Plant Pathology, Indian Agricultural Research Institute, Division of Plant Pathology, IARI, Pusa Cqampus, New Delhi - 110012, Delhi
- 10 Dr. Pranjan Barman, Assistant Professor, Biotechnology, Gauhati University, Department of Biotechnology, Gauhati University, Guwahati - 781014, Assam
- 11 Prof. Sanjib Kumar Panda, Professor, Life Sciences and Bioinformatics, Assam University , Department of Life Sciences and Bioinformatics, Assam University, Silchar, Silchar - 788011, Assam
- 12 Cash Section, DBT (2 copies).
- 13 Sanction Folder.
- 14 File Copy.


(Dr. Mohd Aslam)
Adviser/Scientist 'G'

Annexure -I

Details of the Equipment sanctioned for the implementation of the project titled "**Whitefly (Bemisia fabaci) in North Eastern India: Diversity, factors of virus transmission and natural inhibitor**":

Gauhati University			
SNo.	Name of Equipment	No.	Cost(Rs.)
1.	Refrigerated incubator	1	200000.00
2.	Stereo Microscope	1	300000.00
3.	Growth chamber	1	500000.00
Total			1000000.00
Assam University			
SNo.	Name of Equipment	No.	Cost(Rs.)
1.	Minor Equipment (PC Workstations with UPS)	1	500000.00
Total			500000.00
Indian Agricultural Research Institute, Pusa Campus, New Delhi			
SNo.	Name of Equipment	No.	Cost(Rs.)
1.	One refrigerated incubator	1	400000.00
Total			400000.00


Mohd. Aslam
(Dr. Mohd Aslam)
Adviser/Scientist 'G'

Annexure -II

Details of the manpower sanctioned for the implementation of the project titled "Whitefly (Bemisia tabaci) in North Eastern India: Diversity, factors of virus transmission and natural inhibitor":

Head	No. of Position	Year I	Year II	Year III	Total (Rs.)
1. Assam University					
Junior Research Fellow Manpower + 10% HRA	1	330000.00	330000.00		660000.00
Senior Research Fellow Manpower + 10% HRA	1			369996.00	369996.00
Total(Rs.)		330000.00	330000.00	369996.00	1029996.00
2. Gauhati University					
Junior Research Fellow 25,000 +20% HRA (first two year)	1	360000.00	360000.00		720000.00
Senior Research Fellow 28,000+20% HRA (3rd year)	1			402996.00	402996.00
Total(Rs.)		360000.00	360000.00	402996.00	1122996.00
3. Indian Agricultural Research Institute, Pusa Campus, New Delhi					
Junior Research Fellow Manpower + 30% HRA	1	390000.00	390000.00		780000.00
Senior Research Fellow Manpower + 30% HRA	1			436992.00	436992.00
Total(Rs.)		390000.00	390000.00	436992.00	1216992.00

Emoluments detail of research personal(s) mentioned in table(s) of Annexure-II shall be applicable only if candidate(s) met educational qualification and eligibility criteria as per DST OM No.SR/S9/Z-09/2012 dated 21.10.2014.


(Dr. Mohd Aslam)
Adviser/Scientist 'G'