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Scientist C / वैज्ञानिक सी

Seribiotech Research Laboratory (SBRL)

रेशम जैव-प्रौद्योगिकी प्रयोगशाला

Central Silk Board, Government of India

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[Academic Record]

June 2013 to August 2017: PhD in Biotechnology (Microbial ecology), North East Institute of Science and Technology (CSIR-NEIST, Jorhat); Awarded by Gauhati University Guwahati, Assam

June 2007 to July 2009: Master of Science in Biotechnology, Bangalore University - Bengaluru, Karnataka

June 2004 to July 2007: Bachelor of Science in Biotechnology, Bangalore University - Bengaluru, Karnataka

[Professional Carrier]

August 2021 – Present: Scientist C, Biotechnology division, Seribiotech research Laboartory (Bengaluru), Central Silk Board, Govt of India

July 2019 – July 2021: Scientist C, Biotechnology section, Central Muga Eri research & Training Institute (Jorhat), Central Silk Board, Govt of India

Nov. 2015 – June 2019: Scientist B, Biotechnology section, Central Muga Eri research & Training Institute (Jorhat), Central Silk Board, Govt of India

April 2012 – March 2013: Senior Project Fellow, Biotechnology group, Biological Sciences and Technology division, CSIR-North East Institute of Science & Technology, Jorhat, Assam India

March 2010 – March 2012: Junior Project Fellow, Biotechnology group, Biological Sciences and Technology division, CSIR-North East Institute of Science & Technology, Jorhat, Assam India

[Awards / Achievements / Fellowships]

June 2013: CSIR Senior research fellowship Award (Period June 2013-2016); National fellowship award by the Council of Scientific & Industrial Research, Ministry of Science & Technology, Govt. of India

December 2011 National Eligibility Test (NET) NET awarded by University Grants Commission (UGC) & Council of Scientific and Industrial Research (CSIR)

June 2011 National Eligibility Test (NET) NET awarded by University Grants Commission (UGC) & Council of Scientific and Industrial Research (CSIR)

February 2011 Graduate aptitude test in Engineering (GATE 2011); Awarded by Department of Higher Education, Ministry of Human Resources Development (MHRD), Government of India.

[Academic Society Membership]

1. Heliyon Microbiology – Advisory Board Member, Cell Press
2. Society for Applied Microbiology (Sfam)
3. American Society for Microbiology (ASM)

[Projects: Ongoing / Concluded as PI/CI]

AIT05011EF Molecular investigation into the lingo-cellulolytic system of a few wild silkmoths of North East India; PI; Sep 2019 –Sep 2022 [46 lakhs]

APS 0589 Biodiversity assessment of wild silkmoth and rearing potentialities of Muga (*Antheraea assamensis* Helfer) and Eri silkworm (*Samia ricini* Donovan) for sustainable development in Nagaland, Funded by DBT; PI; Feb 2017- July 2020 [15 lakhs]

AIT05016MI Integrating genomic and transcriptomics resources for functional insight into the biology of muga silkmoth *Antheraea assamensis*; Funded by CSB; Co-I; Jan 2021 –Dec 2023 [64.16 lakhs]

ARP-5878 Next generation sequencing studies and bioinformatics analysis of microbiome of flacherie infected *Antheraea assamensis* Helfer for developing effective disease control measures, Funded by CSB; Co-I, 2016-2019 [18 lakhs]

[Publication]

Phylogenetic affiliation and antimicrobial effects of endophytic actinobacteria associated with medicinal plants: prevalence of polyketide synthase type II in antimicrobial strains (2019) *Folia Microbiologica* 64 (4), 481-496 **IF 1.73**

Aeromonas caviae CSB04, a causal organism of bacterial flacherie in muga silkworm (*Antheraea assamensis* Helfer) (2017) *Current Science*, 112 (1): 32 **IF 1.1**

Rhizospheric Bacterial Community of Endemic *Rhododendron arboreum* Sm. Ssp. *delavayi* along Eastern Himalayan Slope in Tawang. (2016) *Frontiers in Plant science* 7: 1345. fpls.2016.01345 [PMID:27642287] **IF: 4.41**

Antimicrobial biosynthetic potential and genetic diversity of endophytic actinomycetes associated with medicinal plants. (2015) *FEMS Microbiology Letters*, 362, 2015, fnv158 [PMID:26347302] **IF 2.74**

Psychrotolerant antifungal *Streptomyces* isolated from Tawang, India and the shift in chitinase gene family. (2013) *Extremophiles* 17(6):1045-59 [PMID:24085523] **IF: 2.46**

Community Profiling of Culturable Fluorescent *Pseudomonads* in the Rhizosphere of Green Gram (*Vigna radiata* L.) (2014) *Plos One* 9(10): e108378 [PMID:25279790] **IF: 3.24**

Metagenomics: A Hunting Expedition in Microbial Diversity (Book chapter) (2013) In: Molecular Biology of Bacteria, Nova Science Publishers, Inc., New York (ISBN: 978-1-62618-189-2)

Bioprospecting *Micromonospora* from Kaziranga National Park of India and their anti-infective potential. (2012) *World Journal of Microbiology and Biotechnology* 28(8):2703-12 [PMID:22806196] **IF: 2.48**

Phylogenetic analysis of alkaline proteinase producing fluorescent *pseudomonads* associated with green gram (*Vigna radiata* L.) rhizosphere. (2012) *Folia Microbiologica* 57(2):129-37 [PMID:22374358] **IF: 1.73**

Effect of CTAB in biosynthesis of Au-nanoparticles using *Gymnocladus assamicus* and its biological evaluation (2013) *Materials Letter* 113(15):103-106 **IF: 3.02**

Rhizosphere Engineering of Crop Plants by Bacterial ACC-deaminase (Book Chapter) (2014) In: Trends in Soil Microbial ecology, Studium press LLC, Houston, U.S.A (ISBN: 1-626990-36-0)

[Other]

1. Invited talk and conducting hands on workshop on “Bioinformatics and R based biostatistical approaches to Microbiome data analysis and inferences”
 - Microbiology department, Assam Central University, Silchar, Assam [2019]
 - Bioinformatics infrastructure facility, Nagaland Central University, Lumami, Nagaland [2018]
 - Biotechnology group, BSTD division; CSIR NEIST [2017]
 - Biological data analysis using R statistical language, CMERTI, CSB, Jorhat [2021]
2. External Expert of the Assessment/Selection Committee for Ph.D.; Research fellow, Project fellow in various projects, CSIR NEIST, 2020, 2021