

## VINSTROM

### Annual Report 2022-2023

#### Papers published

1. Suryanarayanan, T.S., Azevedo, J.L., 2023. From forest to plantation: a brief history of the rubber tree. *Indian Journal of History of Science*, 58, 74-78. <https://doi.org/10.1007/s43539-023-00071-7>
2. Govinda Rajulu, M.B., Rajamani, T., Murali, T.S., Suryanarayanan, T.S., Dairick Minj 2022. The fungal endobiome of seaweeds of the Andaman Islands. *Current Science* 123:1508-1514. <https://doi.org/10.18520/cs/v123/i12/1508-1514> (**Impact Factor:1.169**)
3. Paranetharan, M.S., Thirunavukkarasu, N., Rajamani, T., Suryanarayanan, T.S. 2022. Biomass destructuring enzymes of fungal endophytes of mangrove roots. *Current Research in Environmental & Applied Mycology* (Journal of Fungal Biology) 12, 259–267. <https://doi.org/10.5943/cream/12/1/16>(**Impact Factor: 0.47**).
4. Suryanarayanan, T.S, Ayesha, M.S., and Uma Shaanker, R. 2022. Leaf photosynthesis: do endophytes have a say? *Trends in Plant Science* 27, 968–970. <https://doi.org/10.1016/j.tplants.2022.07.009> (**Impact Factor: 22.012**).
5. Yadav, R., Vasundhara, M., Rajamani, T., Suryanarayanan, T.S. and Reddy, M.S. 2022. Isolation and characterization of thermostable and alkali tolerant cellulase from litter endophytic fungus *Bartalinia pondoensis*. *Folia Microbiologica* 67, 955–964. <https://doi.org/10.1007/s12223-022-00991-4> (**Impact Factor: 2.629**).
6. Shweta, P., Murali, T.S., Suryanarayanan, T.S. and Sanyal, K. 2022. Hypersaline fungi as a source of potentially active metabolites against pathogenic *Candida* species. *Czech Mycology* 74, 93–101. <https://doi.org/10.33585/cmy.74107> (**Impact Factor: 0.273**).

#### Cultures deposited in National Culture collection centres

- 28 fungal cultures were deposited at Microbial Type Culture Collection and Gene Bank (MTCC), CSIR-Institute of Microbial Technology, Chandigarh

#### DST-SERB Workshop & Research Training conducted by VINSTROM

- One-day research training in “*Some methods in the study of microfungi*” on 16.06.2022 for research scholars. (2 lectures given by Dr. T.S. Suryanarayanan and one lecture by Dr. M. B. Govindarajulu)
- Two-day workshop on “*Some methods to strengthen research efforts in Biology*” on 13.09.2022 & 14.09.2022 for faculty. (One lead talk by Dr. Anantanarayanan Raman, CSIRO, Underwood Avenue, Floreat Park, Western Australia, Charles Sturt University, Orange, New South Wales, Australia; 3 lectures given by Dr. T.S.Suryanarayanan and one lecture by Dr. M. B. Govindarajulu)

M. B. Govindarajulu attended the workshop on “Fundamentals of Project Management” conducted by EMBO-India at IITM Chennai on 1st March 2023

**T.S. Suryanarayanan delivered the following invited lectures:**

“Resistance to antibiotics: A global health crisis” - Institute of Bio EcoSciences, Virginia, USA on 12.03.2022 (online)

“Fungal endophytes and their technological potential - Sastra University, Tirumalaisamudram, Thanjavur on 08.06.2022.

“Can Fungal endophytes improve plant’s reliance to climate change?” - 3rd Microbiome Congress, Kuala Lumpur, Malaysia on 15.11.2022(online)

**Hands on Training for research scholar from Arunachal Pradesh**

Mr. Ujjal Dutta, Department of Botany, Rajiv Gandhi University, Arunachal Pradesh trained in the study of fungal endophytes in VINSTROM for a period from 05.09.2022 to 14.09.2022.

**Hands on Training**

Dr. Dhanprakash, CSIR-IMTECH. Chandigarh visited VINSTROM and trained for isolation of pure culture, slide culture etc. from 13.03.23 to 15.03.23

**Projects sanctioned**

T.S. Suryanarayanan (Principal Investigator) and M.B. Govindarajulu (Co-Principal Investigator) in the research project entitled “Diversity of fungal endophytes of mangroves of western and eastern India” funded by Ministry of Environment Forests & Climate Change (MoEFCC) for three years from February 2022 to March 2025 (Rs.25.98 lakhs).

M.B. Govindarajulu (Principal Investigator) and T.S. Suryanarayanan (Co-Principal Investigator) in the research project entitled “Exploration of fungal endosymbionts of marine sponges of Lakshadweep Archipelago for diversity and technological applications” funded by Science and Engineering Research Board (SERB), Department of Science and Technology (DST) for three years from December 2021 to December 2024 (Rs.31.38 lakhs).