BEST PRACTICE 2



VERMICOMPOSTING AND MUSHROOM CULTIVATION



DUDHNOI COLLEGE DUDHNOI, GOALPARA PIN: 783124, ASSAM

1. Title of the Practice: "Vermicomposting and Mushroom cultivation"

2. Objectives of the Practice:

- > To produce organic manure of exceptional quality for the organically starved soil
- ➤ To make students understand the basic principles of vermicomposting& mushroom, its types and classification.
- > To know the process how vermicomposting take place.
- > To know how can vermicompost and mushroom production be used as a source of self-employment and to know the benefits of vermicompost.
- ➤ To know the importance and soil nutritional value of vermicomposting.
- To train up the skill of entrepreneurship development.

3. The Context:

Dudhnoi College is a premier educational institution of Assam catering to the academic needs of thousands of students every year. It is also shouldering responsibilities for opening avenues for its students through which they can make a respectful living after graduation. Keeping this view in mind Dudhnoi College has been practising cultivation of Vermicomposting and Mushroom since January 2021.

As a part of this practice, the department of Botany in collaboration with ICAR-KVK, Goalpara organized a certificate course in "Vermicomposting and mushroom cultivation" for the students of the college and common public of the locality. Moreover, different training programmes were organised for neighbouring villages to guide and encourage them for Vermicomposting and Mushroom cultivation.

4. The practice:

Considering the importance of significance of Mushroom (a healthy and nutritious food) and Vermicompost (an organic manure) in the present-day context, the department of Botany, Dudhnoi College organised the certificate course in 'Vermicomposting and Mushroom cultivation' from 27th June to 9th July, 2022 which benefitted 62 participants including students and local people.

In order to compliment this effort, Department of Botany has been maintaining one unit of vermicomposting since January 2021consisting of three tanks (1.5 quintal capacity of each). Later, in 2022 another vermicomposting unit of two polybags(5 quintal capacity of each) added. Students practically use these facilities for growing vermicompost.



For, Mushroom cultivation, the college has opened a unitsince January 2021. After completion of the certificate course, the department has been practising mushroom cultivation in regular basis.

The honours as well as regular students of the department are actively involved in the process of production of Mushroom starting from preparing straw up to harvesting of Mushroom.



5. Evidence of Success:

This practice became an instant success since it produced 678 kg vermicompost and 24.5 kg Mushroom. This production earned Rs. 20340 and Rs. 4900 respectively. From the total earned money, Rs 5000/- to the College fund through the honourable and the rest amount has been utilised for department of Botany.



6. Problems Encountered and Resources Required:

There are some limitations of Vermicompost such as

- It is a time-consuming process i.e. it requires almost 4 months for decomposing the organic waste.
- It requires higher maintenance in comparison to traditional composting methods.
- Vermicomposting tanks have to be cool enough to support earthworm life.

The process of Mushroom cultivation has also some limitations such as

- It requires a favorable cultivation house.
- Unavailability of good spawn.
- At the time of vacation due to lack of manpower watering problem to mushrooms arises.

Photographs of both the Practices





Photo Plate-1: Inauguration of Vermicomposting and Mushroom cultivation Unit by Honourable Principal of Dudhnoi College on 8th January, 2021





Photo Plate-2: Theory classes of Certificate course in "Vermicomposting and Mushroom cultivation"







Photo Plate-3: Practical classes of Certificate course in "Vermicomposting and Mushroom cultivation"









Photo Plate 4: Harvesting and packaging of Vermicompost (processing for sale)



Photo Plate 5: Students cultivating Mushroom at the department





Photo Plate 6: Departmental faculties and employees harvesting Mushroom (processing for sale)



Photo Plate 7: Packets of spawns gifted to villagers during training programme



Photo Plate 8: Rupees five thousand (Rs. 5,000) in cash contributed to the college fund through honourable principal of the college.





Photo Plate 9: Villagers cultivating Mushroom at their home
