# DEPARTMENT OF BOTANY SRIPAT SINGH COLLEGE JIAGANJ, MURSHIDABAD

Date: 02.07.2019

# **NOTICE**

### Subject: Enrolement notice for one year certificate course in Plant Tissue Culture.

It is hereby notified to all concerned that the Department of Botany, Sripat Singh College is going to start the one-year certificate course in Plant Tissue Culture for 2019-2020 session from 1<sup>st</sup> August, 2019. U.G. students of this college with Biological Science background are eligible to enroll in the course. Interested students are advised to communicate with the course co-ordinator Dr. Ashim Chakravorty, Department of Botany, for any further information. Last date of enrolment is 20.07.2019.

9-9

(Signature of HOD)

Head, Dept. of Botany Sripet Singh College

# **REPORT ON**

# One-Year Certificate Course in Biotechnology: Plant Tissue Culture (Affiliated to University of Kalyani)

# A Carrier oriented Course for the students of Discipline of Life Science

### Conducted by Department of Botany, Sripat Singh College, Jiaganj, Murshidabad

#### PERSPECTIVE

Sripat Singh College, the first Govt. Sponsored co-educational degree college in West Bengal, started its journey from 1949. Housed in the Cutcheri Bari of great Maharaja Sripat Singh Doogar 200km away from Kolkata, it has been enriching teeming youth catering to the socioeconomic, educational and cultural needs of the region of Murshidabad and its vicinity with utmost sincerity and efficiency. Against this backdrop, the Department of Botany has been pursuing a one-year certificate course in Biotechnology: Plant tissue culture to share the updated knowledge of application of Biotechnology and plant tissue culture. This endeavor not only keeps students confined to the theoretical aspects but makes them familiar with recent research activities along with its practical utility which will support their earnings and ultimately help poor people of local area develop their economic growth.

# COORDINATOR OF THE COURSE:

Dr. Ashim Chakravorty, Assistant Professor &Head Dept. of Botany, Sripat Singh College, Jiaganj, Murshidabad

# WHO CAN APPLY:

Students of both Honours and General category of UG class may apply for this course. Also, students having Honours in Zoology, Chemistry, Microbiology, Molecular Biology and Biotechnology, Environmental Science and Botany or any other discipline of life science may apply.

DURATION OF THE COURSE: One Year (Session July-Jun)

### COURSE FEE:

Registration fees of 700/- for one year.

### SEAT CAPACITY:

Forty (40)

### COURSE CURRICULUM:

i). The theoretical parts are covered by the experts of this college and other Institutions. Light is also thrown on all the applied aspects of plant tissue culture. The course includes all biology, genetics, molecular biology, and Plant Biotechnology. Besides, different applied biometrical and molecular tools and techniques are taught by different experts on invitation.

ii) The practical part includes the tissue culture media preparation, introduction with different laboratory instruments like, laminar air flow, photoperiodic bench, Gel Doc, PCR, Ultracentrifuge, DNA spectrophotometer, HPLC, GCMS along with common laboratory equipments for applied research in the biological field.

Mushroom Training and Workshop: A training programme on mushroom cultivation is pursued by invited experts from the University/College/Institute level and a hands- on practical training is arranged for the students and the mass people of the rural area to promote the mushroom cultivation for the economic growth and earning of the local poor people of the Murshidabad area. The mushroom spawn is supplied to learners. This helps students to learn practically so that this type of thinking may bring success among the mass.

Training on Grafting, Cutting and Layering: A one-day training on grafting is arranged at the local mango grove where local experts of grafting are invited to present a hands- on practical demonstration which is helpful for the economic benefit of our students.

Industry Visit and Exposure visit to Biotechnological Hub: A 2-3 day educational tour for the industry visit is done to any Biotechnological Hub/Institute where the students have the scope for exposure visit to the practical area of tissue culture, mushroom culture, biopesticide, biofertilizer, vermicompost, soil testing units. Laboratory demonstration is done by dignified scientists so that students get aware of the practical utility of the theoretical scientific base.

#### **APPROVED SYLLABUS:**



#### EMINENT RESOURCE PERSONNEL INVITED FOR TAKING THE CLASS:

- 1. Dr. S.K. Mandal, Ex-Asso. Professor, Sripat Singh College
- 2. Prof. P.D. Ghosh, Ex Professor in Emeritus, University of Kalyani
- 3. Prof. P.K.Sahu, BCKV, Kalyani
- 4. Dr. Narottam Dey, Dept. of Biotechnology, Visva-Bharati
- 5. Dr. Rajib Roy Chaudhury, Dept. of Botany, University of Burdwan
- 6. Dr. Abhijit Dey, Dept. of Life Science, Presidency University
- 7. Dr. Laxmi Bhavani, Dept. of Botany, Osmania University, Hyderabad
- 8. Dr. Shamshuzzaman Ahmed, principal, Sripat singh College
- 9. Dr. D. Jana, Ex-Associate Professor, Sripat Singh College
- 10. Sri. Roushan Islam, Dept. of Botany, Sripat Singh College
- 11. Dr. Suchetana Mukherjee, Dept. of Botany, Sripat Singh College
- 12. Dr. Ashim Chakravorty, Dept. of Botany, Sripat Singh College
- 13. Sri. Krishnendu Singha Roy, Dept. of Botany, Sripat Singh College
- 14. Dr. Abhisekh Basu, Dept. of Molecular Biology & Biotechnology, Sripat Singh College
- 15. Smt. Debjani Mondal, Dept. of Molecular Biology & Biotechnology, Sripat Singh College
- 16. Smt. Sayantani Basu, Dept. of Molecular Biology & Biotechnology, Sripat Singh College
- 17. Sri Bibhash Bhattacharya, Dept. of Molecular Biology &Biotechnology, Sripat Singh College

# BENEFIT AND FUTURE SCOPE OF THIS COURSE:

1 Helpful to those students who want to go to higher studies and research.

2. Introduction with the updated research tools and techniques related to the Biotechnological studies.

3. Exposure visit to industrial laboratory and interaction with the eminent scientists of that place in practical mode

4. Scope in any Govt. project work

5. Mushroom cultivation may be useful for earning for the poor and interested people.

6. Development of skill in handling the updated equipments would be helpful to have Job in any biotechnological laboratory

7. Commercial application of plant tissue culture and its correlation to earning at mass level for different crop, fruits and vegetable.

8. Helpful to urban poor people to earn at their home keeping connection with the laboratory

SL.NO	NAME	DEPARTMENT
1	MD. AMINUR ISLAM	BOTANY
2	KHAIRUNESSA KHATUN	BOTANY
3	RASHEL SHAH	BOTANY
4	DILDAR ALI	ENVS
5	ARIF HASANAT	BOTANY
6	RITTIK MONDAL	BOTANY
7	JAKIYA MOMTAJ	BOTANY
8	PRITAM MONDAL	BOTANY
9	TOUFIK MONDAL	BOTANY
10	SUROJIT MONDAL	BOTANY
11	<b>BODHISATTWA CHAKRABORTY</b>	BOTANY
12	NAMRATA HALDER	BOTANY
13	NAMRATA SARKAR	BOTANY
14	SAYED AFRIDI	ZOOLOGY
15	ABDULLA AL MAMUN	BIO (GEN)
16	AMIT KR PRAMANIK	BOTANY
17	ASIS MONDAL	BIO (GEN)
18	TANMOY SAHA	BIO (GEN)
19	AMLAYAN KUMAR DAS	BOTANY

# LIST OF PARTICIPATING STUDENTS: (2019-2020 session)

# PHOTOGRAPHS



Figure 1 Mushroom Culture Unit : Demonstration by Eminent Scientists



Figure 2 Biofertilizer Unit Demonstration at Nimpith



Figure 3 Tissue Culture Labbratory demonstration by Assistant Director, VIB, Nimpith

Figure 4 Exposure Visit to Vivekanada Institue of Biotechnology Nimpith, for the enrolled students of session 2015-16 and 2016-17





Figure 5 Soil testing Laboratory visit



Figure 6 Algal Biofertilizer Unit Visit



Figure 7 Biogas production and Vermicompost Unit Visit & demonstration by the Respected Scientists



Figure 8Green House and Glass house visit for Hardening in tissue culture unit



Figure 9 Director, Nimpith VISRAN



Figure 10 Biopesticide Unit Exhibition and Demonstration



Figure 11Krishi Vigyan Kendra Exhibition and Demonstration by the eminent Scientists



Training on Grafting at the Mango Groove at the viscinity of Jiaganj area



Training on Mushroom Cultivation at the Dept. of Botany, Sripat Singh College, Jiaganj









Figure 12Pink Edible mushroom

**CERTIFICATE (FORMAT):** 

