Exam Date & Time: 26-Sep-2020 (10:00 AM - 01:30 PM)

PSG COLLEGE OF ARTS AND SCIENCE

Note: Writing 3hrs: Checking & Inserting Image : 30mins

BSc DEGREE EXAMINATION MAY 2020
(Sixth Semester)

Branch - ZOOLOGY

BIOTECHNOLOGY - II [14ZOU22]

Marks: 75 **Duration: 210 mins.**

SECTION A

Answer all the questions.

1) Synthetic media. (2)

2) Cell lines. (2)

3) Erythropoietin. (2)

4) Plasminogen. (2)

5) Explant. (2)

6) Micropropagation. (2)

7) Fermenter. (2)

8) Citric acid. (2)

9) Biofertilizers. (2)

10) Encapsulation. (2)

SECTION B

Answer all the questions.

11) a) Differentiate between primary and secondary cell culture. (5)

[OR] b) Analyze the composition of animal cell culture media. (5)

12) Briefly, explain the cell culture products. (5)

a)

[OR] Summarize the molecular markers and their applications.

b) (5)

13) How will you produce haploid cells by anther culture method?

(5)

a)

[OR] Discuss in detail about the plant tissue culture and their applications.

b) (5)

14) Discuss in detail about commercial production of antibiotics with one example.

(5)

a)

[OR] Briefly, analyze the commercial production of ethanol.

b) (5)

15) Summarize the nutritional values of single cell protein.

(5)

a)

[OR] Describe the applications of microbial enzymes.

b) (5)

SECTION C

Answer 3 out of 5 questions.

16) Give a brief account on the cultivation of animal cells in bioreactor.

(10)

17) Elaborate the production of transgenic animals with suitable examples.

(10)

18) Write a brief account on plant tissue culture techniques and its applications.

(10)

19) Analyze the downstream processing with suitable example.

(10)

20) Describe the mass cultivation of Spirulina.

(10)

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