TOTAL PAGE : 1 14ZOU22

PSG COLLEGE OF ARTS & SCIENCE

(AUTONOMOUS)

BSc DEGREE EXAMINATION DECEMBER 2018

(Sixth Semester)

Branch - **ZOOLOGY**

BIOTECHNOLOGY - II

Time: Three Hours Maximum: 75 Marks

SECTION-A (20 Marks)

Answer ALL questions

ALL questions carry **EQUAL** marks $(10 \times 2 = 20)$

Explain / Define:

- 1 Collagenase.
- Hela cell line.
- 3 Hardening.
- 4 Gifted Tilapia.
- 5 Callus.
- 6 Cybrids.
- 7 Fed-batch culture.
- 8 Erythromycin.
- 9 Ribozyme.
- 10 Pit method.

SECTION - B (25 Marks)

Answer ALL Questions

ALL Questions Carry **EQUAL** Marks $(5 \times 5 = 25)$

11 a Explain the isolation of explants.

OR

- b Enumerate the steps in embryonic stem cell culture.
- 12 a Write an account on Erythroprotein.

OR

- b State the uses of VNTRs.
- 13 a State applications of Tissue culture.

OR

- b Explain the ways for selection of Hybrid protoplasts.
- 14 a Give an account on the stages of Downstream process in fermentation.

OR

- b Write a short note on Cryoprotective agents.
- 15 a State the impact of Biofertilizers to soil.

 $\bigcap \mathbb{R}$

b Give an account on analytical applications of the enzymes.

SECTION - C (30 Marks)

Answer any **THREE** Questions

ALL Questions Carry EQUAL Marks $(3 \times 10 = 30)$

- 1-6 What is cell line? Enumerate, the salient features of it?
- 17 Describe the stages and applications of RFLP.
- Explain how do transgenic plants-resistance to fungi and bacteria.
- Discuss the stages of cryopreservation performed in the animal cell culture in the laboratory