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(20517) Roll No. ....

B.Sc. (Bio-Tech.)-III Yr.

**NS-3474**

**B.Sc. Bio-Technology Examination, May 2017**

**Animal Bio-Technology**

**(B-302)**

**(New)**

*Time : Three Hours ] [Maximum Marks : 75*

**Note :** Attempt any **five** questions.

- 1/ Describe the history and scope of cell and tissue culture in animals. Discuss the advantages and disadvantages of animal tissue culture. 15

P.T.O.

2. Write short notes on any **two** of the following : 7.5×2=15

(i) Micro Injection

(ii) Xenotransplantation

(iii) Retroviruses

3. What are the main steps in transgenesis? Describe various ways of gene delivery in the target organism. 15
4. Describe the various methods of cloning and maintaining of cell lines. 15
5. Discuss the recent developments in the use of tissue engineering in therapeutics. 15
6. Describe various types of gene therapy. Elaborate the vectors involved in gene therapy. 15

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7. Discuss the role of biotechnology in treating the infertility in humans. 15
8. Describe the technique of embryo transfer in cattle step by step. 15
9. Discuss the various steps involved in the DNA finger printing. 15
10. Write a brief note on organ transplantation and tissue typing. 15