

**B.Tech I Year(R05) Supplementary Examinations, May 2010**  
**FUNDAMENTALS OF BIOLOGY**  
**(Bio-Technology)**

**Time: 3 hours**

**Max Marks: 80**

**Answer any FIVE Questions**  
**All Questions carry equal marks**  
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1. Write short notes on:

- (a) Importance of cell size
- (b) Biodiversity.

[2 × 8 = 16]

2. Write short notes on:

- (a) Auxins
- (b) Gibberellins.

[2 × 8 = 16]

3. Define species. What is meant by speciation?

[16]

4. Write short notes on:

- (a) Triplet codon
- (b) tRNA in translation.

[2 × 8 = 16]

5. Explain the human body fluid compartments and describe the intracellular and extra cellular body fluids and their functions.

[16]

6. Write short notes on:

- (a) Photo chemistry of vision
- (b) Taste buds
- (c) Deafness
- (d) Olfaction.

[4 × 4 = 16]

7. Define biotechnology? How biotechnological development contribute to benefit humanity.

[16]

8. What is a monoclonal antibody? Explain how monoclonal antibodies are used for detection of viruses in plants, animals and human beings.

[16]

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