R09

Code No: D0302
JAWAHARLAL NEHRU TECHNOLOGICAL UNIVERSITY HYDERABAD
M.Tech II - Semester Examinations, March/April 2011
GENETIC ENGINEERING
(BIOTECHNOLOGY)

Time: 3hours   **Max. Marks: 60**

Answer any five questions
All questions carry equal marks
- - -

1. Describe the construction of cDNA libraries and mention the advantages of cDNA libraries. [12]

2. What are Co-integration and Binary Vectors? Explain. [12]

3. Give an illustrated account of different approaches made for detection of nucleic acids. [12]

4. How do you identify a PCR product? In a particular PCR amplification experiment, the product obtained was shorter than the expected length. Give your comments on the possible reasons. [12]

5. Write a short note on the following:
   a) Chromosome walking.
   b) Chromosome jumping. [6+6]

6. Comment briefly on different promoters used for expression in plants. [12]

7. What are Transposons? Explain Transposon tagging with examples. [12]

8. What are Restriction enzymes? Write about their Nomenclature and about the different classes of Restriction enzymes. [12]

*****