

Board – CBSE

Class – 12

Topic – Biotechnology and Its Applications

1. Name the technique based on the principle of antigen-antibody interaction used in detection of a virus (HIV).
2. Development of a transgenic food crop may help in solving the problem of night blindness in the developing countries, name this crop plant.
3. Which nematode infects the roots of tobacco plants and causes a great reduction in yield?
4. The first transgenic cow produced human protein - enriched milk. Name the cow and the protein found in milk.
5. The insulin produced using recombinant DNA technology is more advantageous than the insulin extracted from pancreas of slaughtered cattle and pigs. How?
6. Name two pest resistant plants produced by using recombinant DNA technology
7. Name the genetically engineered human Insulin?
8. Write the Scientific name of a nematode that attacks the root of a tobacco plant?
9. Define a patent?
10. Expand GEAC.
11. Name the first transgenic cow?
12. Which vaccine was being tested on mice?
13. Name the bacterium which is used to produce insect-resistant plants by genetic engineering.
14. Name any disease against which vaccine is developed by Recombinant DNA technology.
15. Name the technique which is used to detect HIV in Suspected AIDS patients?
16. Name any two diseases for which transgenic mice are used as model organisms.
17. What is the difference between 'Cry' & 'CRY'.
18. Name any one disease for which gene therapy has been proved effective?
19. What are the two methods for correcting ADA deficiency in a child?
20. Some crop plants are modified genetically by manipulating their genes. How are they made beneficial?
21. GEAC is one of the organisations set up by the Indian Government. Write its full form. Give its two objectives.
22. "Industrialised nations are exploiting the bioresources of under-industrialised nations. Justify the statement with a suitable example.
23. What is Golden rice? What is its advantage?
24. What are the three critical research areas in the field of Biotechnology?
25. What are the advantages of molecular diagnostics over conventional methods?