

Video: Biotechnology **Name :**

1. What does biotechnology allow us to do?
2. Is manipulating genes a new idea? Why or why not?
3. What are the disadvantages of breeding for gene manipulation?
4. How is biotechnology different from selective breeding?
5. What do all organisms have in common?
6. What is the genome?
7. What do chromosomes contain?
8. How are genes and proteins related?
9. What are some ways that scientists are trying to improve food crops?
10. What is the goal of the Human Genome Project?
11. What would information encoded in the Human Genome allow us to understand?
12. How many genes does each human have? Base pairs?

13. What two questions must we ask when we manipulate genes?

14. What bacteria is commonly used in recombinant DNA?

15. Define :

a. plasmid

b. restriction enzymes

c. transgenes

d. gene vectors

e. PCR

16. What are some potential uses of recombinant DNA?

17. What are some ethical issues?

18. What is somatic cell therapy? How can it be used?

19. What are some questions raised by biotechnology?

20. Why is it so important to consider our use of biotechnology?