Veterinary Bacteriology Notesheet

Name:

1. Define Virus:
2. Why are viruses not considered to be alive?
3. How do viruses reproduce?
4. What are bacteria?
5. What is the difference between prokaryotic and eukaryotic cells?
6. How does the DNA of a bacterium differ from a eukaryotic cell?
7. What is a plasmid?
8. The of a bacterial cell to antibiotics is mostly determined by its
9. Two kinds of stain are used for bacteria; one and one
10. Bacterial cells that absorb the violet stain appear ; those that do not appear
11. Gram-positive bacteria stain ; Gram-negative stain
12. Both gram-positive and gram-negative bacterial cells have multiple
to them from their microscopic
13. However, gram-negative cells have an . Gram-negative bacteria have a
“shield” – an outer that serves as a ‘ ’ layer
14. How does this third layer in gram negative bacteria affect the treatment of their diseases?
15. Draw the differences between gram-negative and gram-positive bacteria below:
16. Which bacteria are easier to treat, gram negative or gram positive? Why?
17. Besides affecting antibiotic susceptibility, in what second way does the third membrane of gram-negative bacteria affect its host?
The outer layer is composed of
 \_\_\_\_\_\_
18. The main concern of bacterial infections are , or a substance that
19. List and describe the two kinds of toxins:
20. Exotoxins refer to the fact that they have to the bacterial cell to be effective.
21. Endotoxins refer to the fact that the toxins can be the structure of the bacterial cell and still be effective.
22. What problems to exotoins create?
23. What problems do endotoxins create?
24. What is the leading cause of death in ICUs in US hospitals?
25. Define Bacteremia:
26. Define Sepsis:
27. How does the body change during sepsis?
28. What is septic shock?
29. Usually septic shock causes
30. The most affected organs are the
31. Why does the circulatory system fail during septic shock?
32. Why does the respiratory system fail during septic shock?
33. Damaged tissue causes an where blood vessels

increase there , become , and
34. Why is this good?
35. What is the histamine response?
36. Systemic response means that
37. What are the four conditions necessary for septic shock to occur?