www.NGSSLifeScience.com

Topic: Bacteria, Virus, Multicellular Organisms Worksheet

Summary: Students answer introductory questions about bacteria and viruses.

Goals & Objectives: Students will be able to determine the difference between bacteria, viruses, and animal/plant cells. Students will be able to remember important facts about viruses and bacteria.

NGSS Standards: *MS-LS1-2.* Develop and use a model to describe the function of a cell as a whole and ways parts of cells contribute to the function.

Time Length: 30 minutes

Materials:
Class notes or textbook or online textbook

- https://flexbooks.ck12.org/cbook/ck-12-biology-flexbook-2.0/section/2.2/primary/lesson/prokaryotic-and-eukaryotic-cells-bio/
- https://flexbooks.ck12.org/cbook/ck-12-biology-flexbook-2.0/section/7.3/primary/lesson/prokaryote-structure-bio/
- https://flexbooks.ck12.org/cbook/ck-12-biology-flexbook-2.0/section/7.9/primary/lesson/virus-characteristics-bio/

Procedures:
1. Tell the students which section they are to use in the textbook. Students are then going to read the section and answer the questions on the worksheet.

Accommodations: Students with an IEP can take the handout home if they need extra time or only answer questions 1-16.

Editable DOCX File and Answer Key:
Available at www.ngsslifescience.com

Name: _____ Row: _____

Date:_____ Period:_____

Bacteria, Viruses, & Multicellular Organisms WS

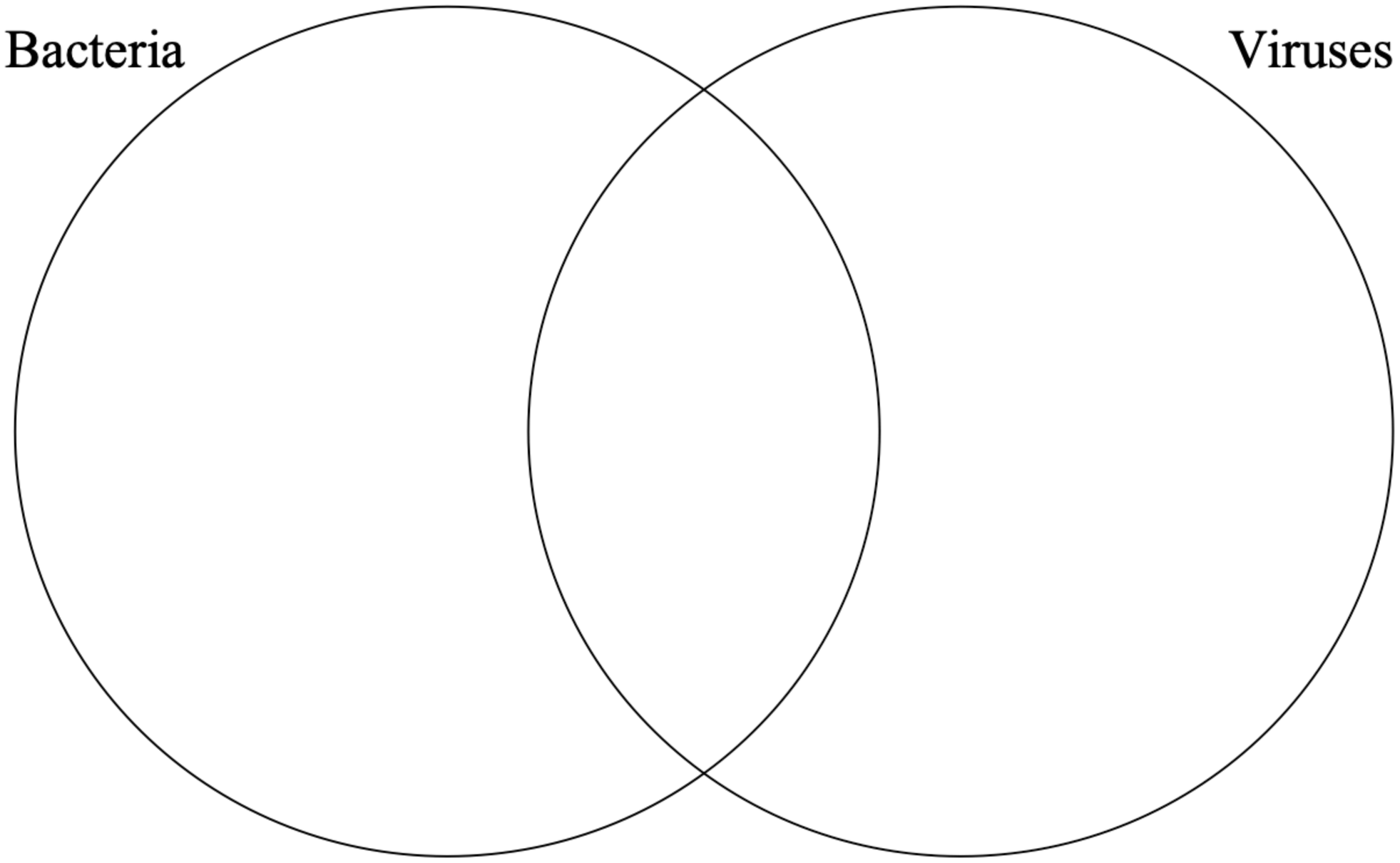
1. What is the official name of the smallest and simplest cells? _____
2. What is the modern version of these cells called? _____
3. Bacteria are single-cell or multi-cellular organisms? _____

4-16. Fill in the following table with **Yes** or **No** answers.

Questions	**Eukaryote**	**Prokaryote**	**Virus**
Is made out of a cell or cells?			
Has a nucleus?			
Is considered living?			
Can move on its own?			
Can reproduce or replicate?			
Has DNA or RNA?			
Has specialized structures or internal compartments?			
May have a cell wall?			
Has membrane-bound organelles?			
Has ribosomes?			
Has a cytoplasm?			
Has chloroplasts?			
Has mitochondria?			

17. How do bacteria reproduce? _____
18. What do the chromosomes look like in bacteria? _____
19. Viruses are *general* or *highly specific* to the cell that they can infect? _____
20. What two types of nucleic acids can viruses have? _____ or _____

21. Compare and contrast bacteria and viruses by filling in the Venn diagram below.
Use three items for each section (total of 9)



22. Compare and contrast bacteria and multicellular by filling in the Venn diagram below.
Use two items for each section (total of 6)