ScienceNews

Student Worksheet: Grappling With Graphs and Other Data Visualizations

Directions:

Read the *Science News* article assigned to you by your teacher and answer the following questions with a partner.

Why use data visualizations?

Discuss and answer the following questions with a partner.

- How would you define a data visualization? Give examples of different types of data visualizations.
 What is the purpose of a data visualization? Why are they helpful?
- 3. In what fields and careers are visualizations important? Give a couple examples.
- 4. Aside from the type of data visualization, what features of a visualization influence how the data is interpreted?

Data at a glance

Answer the following set of questions for each data visualization in the Science News article.

- 1. What information is being portrayed by the data visualization? Define the type of visualization, the measured variables shown within it and the axes where applicable.
- 2. Pick out two data points from the visualization and state them along with their units. How does the visualization help you to compare the data points? Explain.
- 3. State the general trend or takeaway from the visualization. How certain are you of this summarizing message? Explain your reasoning based on the number of outliers or error bars given, the fit of a trendline, the consensus of all the other data presented, etc.

5. What other questions do you have about the visualization? In your opinion, did the visualization present data in a clear, effective way?	1

4. Where do the data in the visualization come from? Does the source look credible? How can you tell?

