**Connecting to the Big Picture Handout Answer Key**

***Topic*: Your Local Air Quality**

Answer the questions below.

1. Describe your town or community: Is it rural or urban? Do you live in the mountains or in a valley or on the plains? What sorts of activities define where you live? (For example, ranching, agriculture, large industrial areas with factories, etc.)

Answers will vary and be specific to each student.

1. List two things that might worsen your local air quality (such as a large highway). List two things that might improve your local air quality (such as greenspaces).

*Worsening AQ examples*: Highways, traffic congestion, industry (such as refineries), ditch or crop burning, dust storms, oil and gas activity, trees (if you live in an area with an ozone problem, the trees can release VOCs that contribute to ozone formation), forest fires, ranching and some agricultural activity, etc.

*Improving AQ examples*: Greenspaces, trees (trees can “filter” out some pollutants, for example trees along a roadway can lower the particulate matter in surrounding neighborhoods), bike lanes and accessible public transit (these both can reduce the number of cars on the road), personal action (for example, filling up your gas tank or mowing at night so the VOCs have less opportunity to contribute to ozone formation), reducing overall energy use or increasing energy efficiency (so less fuel is used on a large scale), etc.

1. Describe one concern you have regarding your local air quality. Explain why you are concerned (for example for health reasons or visibility, etc.). Then in one or two sentences, describe how you might collect data to learn more about the problem.

Answers will vary and be specific to each student.