Name \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**CTA: Atmospheric Layers**

Directions:

Part I: As your partner reads the article, jot down information to fill in the table below. THis information includes:

* Location of Layer: Above or below [*insert layer*]
* Purpose/Special Information: Write 1 or 2 facts from the article about the specific layer

Part II: Answer the questions on the back using your information from the table.

|  |  |  |
| --- | --- | --- |
| **Atmospheric Layer** | **Location of Layer** | **Purpose/****Special Information** |
| Troposphere |  |  |
| Stratosphere |  |  |
| Mesosphere |  |  |
| Thermosphere |  |  |

**COMPREHENSION QUESTIONS:**

1. If the atmosphere is so big, why do planes primarily operate in the Troposphere?

2. Describe the types of vehicles that could be found in each layer of the atmosphere.

3. Where do you think Earth-observing satellites orbit? What determines their orbital altitude?

4. Why do you think the Hubble Space Telescope orbits in the Exosphere?

5. Explain what happens to the atmospheric pressure and temperature as altitude increases.

6. Identify the different forms that water takes as altitude increases. (surface to the upper troposphere)

7. Explain why pilots must wear special suits when flying in the upper atmosphere.

8. What pollutant from the surface manages to reach the stratosphere? Predict where this material comes from.