Name _____ Date _____ Period _____

Atmosphere Scavenger Hunt Worksheet

You will use the following websites to answer questions (This is an individual activity)

Part I -

"The Atmosphere"

http://www.pbs.org/wgbh/nova/balloon/science/atmosphere.html#troposphere

Use this interactive website to find answers to the following questions. Click on the layers for more information.

1. What is the atmosphere?

2. How high does the atmosphere extend from the earth?

3. What are the five layers of the atmosphere?
   1.
   2.
   3.
   4.
   5.

4. What are the three main gases that make up the atmosphere? Be sure to list the percentages for each gas.
   1.
   2.
   3.

5. What layer of the atmosphere does weather occur?

6. Does the temperature rise or drop in the troposphere?

   stratosphere?

   mesosphere?

   thermosphere?

Part 2 -

"The Ozone Layer"

http://www.ducksters.com/science/environment/ozone_layer.php

Scroll down to the section titled "Atmospheric Processes" and answer this question.

7. What is ultraviolet radiation?

8. Where is the ozone layer located?

Part 3 -

"Layers of the Atmosphere"

http://www.srh.noaa.gov/jetstream/atmos/layers.htm

This should be the National Weather Service website. Answer the following questions.

10. In what layer do space shuttles fly?

11. Which layer of the atmosphere is the coldest?

The hottest?

12. Click on the ionosphere link. Where is the ionosphere located?

13. What important quality does the ionosphere have?

14. What is the exosphere?

15. What is the boundary between the troposphere and stratosphere called?

stratosphere and mesosphere?

mesosphere and thermosphere?

16. To what layer do weather balloons fly?

17. Where do planes and jets fly?

18. Why do meteors burn up in the mesosphere?

19. Where do the auroras occur?

20. Where do space shuttles fly?

Part 4 -

"Global Warming"

http://climatekids.nasa.gov/greenhouse-effect/

This should take you to a page titled "What is the Greenhouse Effect?" - Answer the following questions.

21. What is the greenhouse effect?

22. Is the greenhouse effect always a bad thing? What could make it a bad thing?

23. Are humans causing the increase in greenhouse gases? How?

24. What can we do to stop this?

Part 5 –

"Introduction to the Atmosphere".

http://www.ucar.edu/learn/1_1_1.htm

Scroll down to the section titled "Atmospheric Processes" and answer this question.

25. There are several factors that help heat energy from the equator move around the earth. Name them.

Next, scroll down to the section titled "Energy Heat Transfer" and answer these questions.

26. Where does the earth get its energy?

27. What is conduction?

28. What is convection?

29. What is radiation?

30. This website gives you a picture of these three types of energy transfer. Identify an example of conduction, convection, and radiation.

Additional Resources:

http://www.enchantedlearning.com/subjects/astronomy/planets/earth/Atmosphere.shtml

http://earthguide.ucsd.edu/earthguide/diagrams/atmosphere/index.html