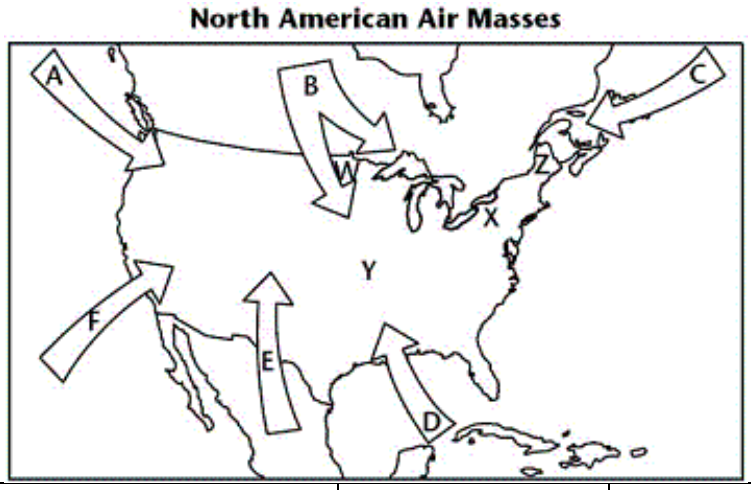
Name: _____ Period: _____

Air Masses- Map

1. Label the air masses shown on the map provided on page 3 (use page 460 from the book).
2. Use the map below and fill in the table that follows:



Air mass	Name	Abbreviation	Description
A			
B			
C			
D			
E			
F			

3) The temperature, humidity and direction of these air masses are true for North America. What would the air masses be like in South America?

4) Air masses converge at a boundary called a front. Using this information, can you describe the what the weather would be like at Point Y if …

a) Air Mass D had more strength?

b) Air Mass B had more strength?

5) Find Point X.

a) Describe the two air masses that move toward Point X (provide the letter of these air masses).

b) What is one factor that is the same for the weather at Point X, regardless of which air mass is stronger?

6) Point X is Buffalo, New York, which is near Lakes Erie and Ontario. On average, Buffalo receives 95+ inches of snowfall each year, mainly due to lake-effect snow. What do the lakes provide Air Mass B that could cause an increased amount of precipitation?

_____

5) Which conditions would MOST LIKELY lead to the formation of lake-effect snow
a. A cold, dry air mass moves over a body of water.
b. An oceanic air mass clashes with a cool, continental air mass.
c. A low-pressure system forms over a tropical ocean.
d. High-altitude winds cause the rising air in a thunderstorm to rotate.

7) Find Illinois on the map.

a) What air masses are moving towards Illinois?

b) How do they each affect weather in our state?