Name:

Global Winds Review

Earth Science Mini Unit

1. What is the Coriolis Effect?   
     
   1. What does it do to wind in the Northern hemisphere?
   2. What does it do it wind in the Southern hemisphere?
2. Fill in the globe below with the winds. Make sure to include:   
    a. convection cells

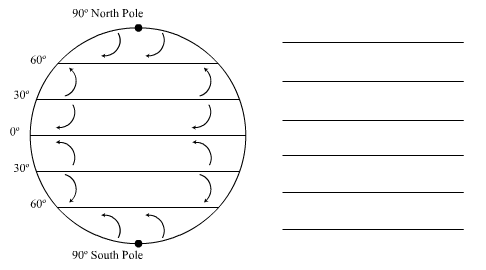
b. clouds (where they are present)

c. location of high & low pressure on the ground

d. location of high & low pressure aloft

d. names of the wind systems

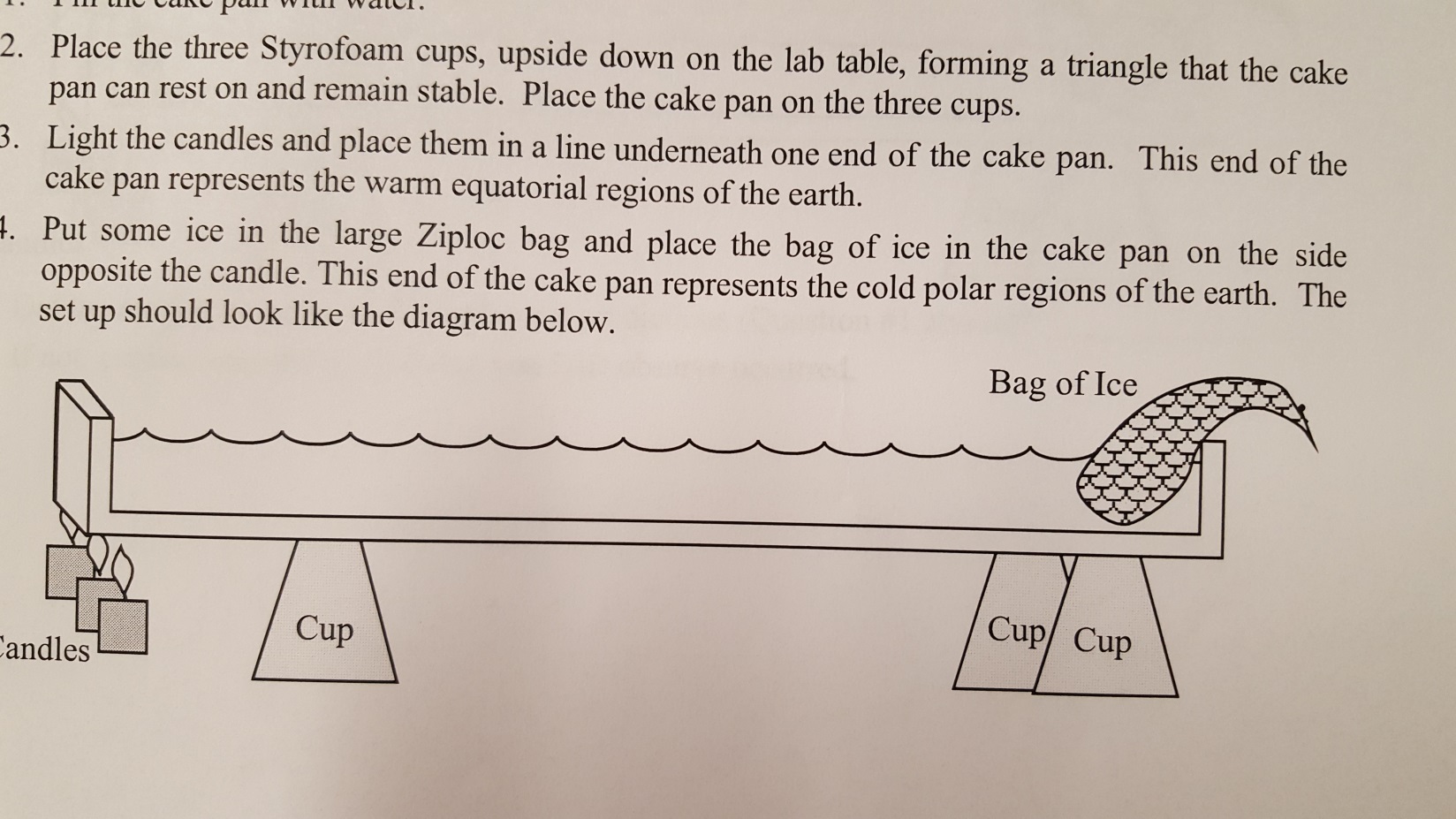
e. arrows to show specific direction of wind movement   
REMEMBER: You may need to rotate your paper to take into account which way the wind is coming from!!



1. Fill in the table below.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Type of Wind** | **Latitude it Starts (Blows From)** | **Latitude it Ends (Blows Towards)** | ***Direction* it blows from** | ***Regions/Events* Affected** |
| Trade Winds |  |  |  |  |
| Prevailing Westerlies |  |  |  |  |
| Polar Easterlies |  |  |  |  |
| Jet Stream |  |  |  |  |

1. In the diagram below, draw arrows to show the convection process that is occurring:



1. Complete the following chart regarding the wind patterns at the POLE and the EQUATOR:  
   (Hint: Use your arrows from question #4 to help you answer these questions.)

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Location** | **Pressure at Surface** | **Pressure Aloft** | **Wind felt at Surface** | **Wind felt Aloft** |
| Poles | Explain why: | Explain why: | Explain why: | Explain why: |
| Equator | Explain why: | Explain why: | Explain why: | Explain why: |