| Name:   |                          |                          |  |
|---|--------------------------|--------------------------|--|
| Date:   |                          |                          |  |
| Title: Air Masses, Fronts, and Pressure Systems   |                          |                          |  |
| What is an air mass?  |                          |                          |  |
|   |                          |                          |  |
|   |                          |                          |  |
| What is the key characteristic of a continental (c) air mass?                           |                          |                          |  |
|   |                          |                          |  |
|   |                          |                          |  |
| What is the key characteristic of a maritime (m) air mass?                              |                          |                          |  |
|   |                          |                          |  |
|   |                          |                          |  |
| What is the key characteristic of a Polar (P) air mass?                                 |                          |                          |  |
|   |                          |                          |  |
|   |                          |                          |  |
| What is the key characteristic of a Tropical (T) air mass?                              |                          |                          |  |
|   |                          |                          |  |
|   |                          |                          |  |
| In the chart below, give the symbol and describe the typical weather for each air mass. |                          |                          |  |
|   | Tropical (T)             | Polar (P)                |  |
| continental (c)   |                          |                          |  |
|   | symbol<br>usual weather: | symbolusual weather:     |  |
| maritime (m)  | symbol<br>usual weather: | symbol<br>usual weather: |  |

| What is a weather front?                           |   |
|--|---|
|  |   |
|  |   |
|  |   |
|  |   |
| What happens at a cold front?                      |   |
|  |   |
|  |   |
|  |   |
| How do we represent a cold                         |   |
| front on a weather map?                            | - |
|  | - |
|  |   |
| What happens at a warm                             |   |
| front?   |   |
|  |   |
|  |   |
|  |   |
|  |   |
| How do we represent a warm                         |   |
| front on a weather map?                            | - |
|  | - |
|  | - |
|  |   |
| What happens at an <b>occluded</b>                 |   |
| front?   |   |
|  |   |
|  |   |
|  |   |
| How do we represent an occluded front on a weather |   |
| map?   |   |
|  |   |
|  |   |
|  |   |

| What happens at a <b>stationary front</b> ?                     |   |
|---|---|
|   |   |
|   |   |
|   |   |
|   |   |
| How do we represent a stationary front on a weather map?        | - |
|   |   |
| What is an anticyclone?   |   |
|   |   |
|   |   |
|   |   |
| What kind of weather is usually associated with an anticyclone? |   |
|   |   |
|   |   |
|   |   |
|   |   |
| What is a <b>cyclone</b> ?                                      |   |
|   |   |
|   |   |
|   |   |
|   |   |
| What kind of weather is usually associated with a cyclone?      |   |
|   |   |
|   |   |
|   |   |
|   |   |
|   |   |
|   |   |
|   |   |

| Describe the isobar pattern   |  |
|-------------------------------|--|
| that shows where an           |  |
| anticyclone exists.           |  |
|                               |  |
|                               |  |
|                               |  |
|                               |  |
| Describe the isobar pattern   |  |
| that shows where a cyclone    |  |
| exists.                       |  |
|                               |  |
|                               |  |
|                               |  |
|                               |  |
|                               |  |
| In which direction across the |  |
| northeastern US do cyclones   |  |
| usually move                  |  |
|                               |  |
|                               |  |
|                               |  |
|                               |  |
| Extra credit: What is a "nor- |  |
| easter"?                      |  |
|                               |  |
|                               |  |
|                               |  |
|                               |  |
| Extra credit: What is the     |  |
| "Bermuda High"? How does it   |  |
| affect our region's weather?  |  |
|                               |  |
|                               |  |
|                               |  |
|                               |  |
|                               |  |