* **Weather and Air Pressure**
* Name:
* Date:
* Hour:
* 1. Air pressure is measured using a device called a
* 2. Pressure is measured in units called
* 3. Explain why a hot air balloon rises using air pressure .
* 4. Why does wind happen?
* 5. What does a hygrometer measure?
* **Video: What is Wind?**
* 1. Name two extreme forms that wind can become.
* 2. Wind is caused by air flowing from a \_\_\_\_\_\_\_\_\_ pressure to a \_\_\_\_\_\_\_\_ pressure.
* 3. The atmosphere is about
  + % nitrogen
  + % oxygen
  + vapor
* 4. Explain what happens to masses of air when they warm and when the
* cool.
* 5. How does the earths rotation affect global winds?
* 6. Where did the highest wind speed on Earth occur in 1934?
  + What was the wind speed?
* One question you are left wondering after watching this video:
* EPLORE: Slides 1 – 6
* Slide 1: According to the slide, what is air pressure?
* Slide 2: What happens to the ballo0n when you let the air pressure out of it? The balloon containing air? Explain.
* Slide 3: What happens with the air pressure with objects on Earth? Explain, is it pressing on them or releasing pressure on them at all times.
* Slide 4: What is the pressure of the atmospheric air called?
* Slide 5: Go to weatherunderground.com and search the barometric pressure for our area today (zip code 52314). What is the barometric pressure? Is it above or below normal? Is this a high pressure (above the average) or a low pressure (below the average)?
* Slide 6: When pressure falls the weather is –
  + When the pressure rises the weather is –
* QUIZ: What were the results of your quiz?
* **Comprehension Questions**
* 1. When you drive down a mountain, what makes your ears experience those interesting and sometimes uncomfortable sensations?
* 2. Why doesn’t air pressure crush and empty pop can sitting on a table?
* 3. If a meteorologist says that the air pressure is getting lower what would you expect to see happen to Torricelli’s mercury barometer?
* 4. If Torricelli had drilled a little hole at the top of the glass tube holding his mercury column, what would have happened to his baromemeter?