Anatomy of a Wave – partner activity (introduce periodic motion of waves (2-D), crest and trough, wavelength – length of one wave)

Materials:

Laminated copy of a simple transverse wave picture Lab notebooks-new page- with page dated pencil

Part I:

- 1. Have students break into groups of 2 or 3.
 - a. One is the "reporter" and will get the laminated sheet (does not look at until told to by teacher and doesn't at anytime show others)
 - b. Partners are the "artists" they will try to draw what the reporter describes
- 2. Tell students that the sheets the "reporter" will get are top secret no peeking!
 - a. Rules while describing the picture to artists:
 - i. Reporters cannot comment on artists work! They can answer questions, but cannot look at a picture and clarify by "showing" them.
- 3. Hand out laminated copies of a basic wave shape (see next sheet)
- 4. Allow reporters to look at their sheet tell other students to close their eyes because they will look at other students' pictures. Remind students this is FUN!!! NO CHEATING!!!
- 5. Give a quick instruction about how the "reporter" will be telling them about the picture they will draw.
- 6. Walk around listening as the students instruct the "artists" on how to draw the picture of the wave.
- 7. I give them 5 minutes but if they start trying to look around and lose focus...I wrap it up.

Part II:

- 1. I collect the laminated copies and ask the students to turn their picture over. (turn the page in their lab notebooks) the reporters find a fresh page, too.
- 2. I go through the activity again giving instructions for all to draw.
- 3. After we all finish- we look at both drawings and I put the picture on the document camera/computer/overhead
- 4. We make touch ups and talk about difficulties with listening and creating images.

The goal is to draw and label a basic wave - in a fun, interactive way

****Be sure to put describe a wavelength and have them add it to the drawing. (I go from crest to crest to give them the easiest view)

