Name: _____ Date: _____

Field Lines Worksheet

Observation and Drawing

1. **Sketch a picture showing how the shavings line up around the bar magnet.**

2. **Sketch the pattern made by the iron filings when the nail is placed in them. Remember to draw the nail, wires and battery.**

Questions:

3. **Of the above two drawings, which was a magnet, and which was an electromagnet?**

   #1 was _____ #2 was _____

4. **Name at least one *similarity* between a magnet and an electromagnet:**

5. **Name at least one *difference* between a magnet and an electromagnet:**