



Use the first column of this KWL chart to organize your observations about ray shielding. Brainstorm with your group what you want to know about radiation shielding, then list in the second column of this KWL chart.

KNOW	WANT TO KNOW	LEARNED

### Hypothesis

Based on your observations, answer the “problem question” with your best guess. (Which of the materials provided will block the most simulated space radiation, and be the best material to build a spacecraft?) Your hypothesis should be written as a statement.

My hypothesis: \_\_\_\_\_

### Materials

Per group

- 1 flashlight
- 1 metric ruler
- materials to test (all the materials should be the same color and about the same size)
  - unlined copy paper
  - tissue paper
  - construction paper
  - card stock paper

Per student

- 1 pair of safety glasses

### Safety

Review your classroom and lab safety rules. You should not look directly into the beam of the flashlight. Put on safety glasses when instructed.

### Test Procedure

PART 1:

1. Each group member will have a designated job:
  - One student will hold the flashlight.
  - Another student will hold and stack the paper on top of the flashlight.
  - A third student will measure and weigh the material and record the data.











