

Handout Answers

1. Which material was the best insulator?

This will vary.

2. Try and find out what insulation is used in your house. Do you think it works as good as the material you tested?

This will vary. Answers can include: styrofoam, spray foam, pink fiberglass, blown cellulose, and “I don’t know. I can’t see through walls.”

3. Energy cannot be created or destroyed, just converted from one type to another. What type of energy does your house convert into thermal energy?

This will vary. The most common will be chemical potential energy (if you heat with propane, natural gas, or wood) and electrical energy. You may also see solar energy or geothermal energy.

4. Keeping thermal energy from escaping your house in the winter saves energy on heating. How can insulation help us conserve energy in the summer?

By keeping thermal energy out of the house, you don’t need to use as much electrical energy to run an air conditioner, if you have one. Your refrigerator and freezer also use insulation to keep heat out so it needs less energy to keep food cold.