

Appendix 1

Implementing District Standards – Each of the following standards will be addressed through self-selected learning stations. This unit contains examples to get started but learning stations should be selected with your students in mind.

Third Grade Essential Standard: Energy: Conservation and Transfer

3. P.3 Recognize how energy can be transferred from one object to another.

3. P.3.1 Recognize that energy can be transferred from one object to another by rubbing them against each other.

3. P.3.2 Recognize that energy can be transferred from a warmer object to a cooler one by contact or at a distance and the cooler object gets warmer.

Fourth Grade Essential Standard: Energy Conservation and Transfer

4. P.3 Recognize that energy takes various forms that may be grouped based on their interaction with matter.

4. P.3.1 Recognize the basic forms of energy (light, sound, heat, electrical and magnetic) as the ability to cause motion or create charge.

4.P.3.2 Light Recognize that light travels in a straight line until it strikes an object or travels from one medium to another, and that light can be reflected, refracted and absorbed.

What students need to know: Light travels in a straight line. Light can be refracted, reflected and/or absorbed.

Fifth Grade Essential Standard: Energy: Conservation and Transfer

5. P.3 Explain how the properties of some materials change as a result of heating and cooling.

5. P.3.1 Explain the effects of the transfer of heat (either by direct contact or at a distance) that occurs between objects at different temperatures. (Conduction, convection or radiation).

5. P.3.2

Explain how heating and cooling affect some materials and how this relates to their purpose and practical applications.