

## Appendix One

### Implementing Common Core and Essential Standards

#### ***Substandard 6.P.3.1***

*Students will illustrate the transfer of heat energy from warmer objects to cooler ones using examples of conduction, radiation, and convection. Students will recognize the effects of energy transfer.*

Students will investigate and model convection in Earth's mantle and explore how it drives plate movement.

#### ***Overall Essential Standard 6.E.2***

*Students will understand the structure of the Earth and how interactions of constructive and destructive forces have resulted in changes in the surface of the Earth over time and the effects of the lithosphere on humans.*

Students will use text and web based resources to investigate plate boundaries and plate movement. Students will explore digital and print diagrams, animations, and illustrations of plate tectonic concepts. Students will model plate movement using candy bars and kinesthetic movements.

#### ***Technology Substandard 6.TT.1.1 and Substandard 6.TT.1.3***

*Students will select appropriate technology tools to gather and present data and information.*

Students will access a variety of web based research sites and online animations to research information about plate tectonics. Additionally students will use interactive technology to design and produce a class presentation as part of a culminating project.

#### ***Common Core Standard CCSS.ELA-Literacy.RST.6-8.7***

*Integrate quantitative or technical information expressed in words in a text with a version of that information expressed visually (e.g., flowchart, diagram, model, graph, or table).*

#### ***Common Core Standard CCSS.ELA-Literacy.RST.6-8.9***

*Compare and contrast the information gained from experiments, simulations, video or multimedia sources with that gained from reading a text on the same topic.*

Students will synthesize information gathered from print and web based resources to identify, illustrate and explain movement at plate boundaries. Students will create a physical model and technology based presentation explaining a topic related to plate tectonics or geothermal energy.