Science

through an

Inquiry Lens

After School Pro-D

These after school Pro-D sessions will provide a look into the Elementary Science Curricular threads, how student understanding is built up, and what types of activities you can do to facilitate structured, controlled, guided and free inquiry. We will look at ways to incorporate Indigenous perspectives into science lessons, related books and stories, and how to get outside.

Hand-outs with links and suggestions for resources will be given out. A light supper will be served. Sign up for as many as you like! They will take place in the SuperLab at Burnaby Central Secondary. Book your spot on the staff development calendar. https://learn.sd41.bc.ca/events-calendar

**Energy- Monday, January 29, 3:45-6:30**

This session will look at light and sound (Gr 1); thermal energy (Gr 3); energy transformations (Gr 4) and electricity and magnetism (Gr 7). There will be a demonstration of the materials in the thermal energy kit, and lots of ideas for demonstrating these important energy concepts.

**Organisms, Interactions and Evolution- Thursday, Feb 22, 3:45-6:30**

This session explores the features, life cycles and grouping of living things (K-Gr 3). We will connect the curriculum to getting outdoors. We will also investigate how evolution by natural selection occurs (Gr 7), and examine some resources for exploration of this important topic.

**Force and Machines-Thursday, Mar 15, 3:45-6:30**

We will examine how motion depends on the properties of materials (K), how forces affect the motion of an object (Gr 2), how machines transfer force (Gr 5), Newton’s laws of motion (Gr 6) and the electromagnetic force (Gr 7).

**Matter-Thursday, April 19, 3:45-6:30**

What is matter? This session will look at properties of matter (K-1), physical and chemical changes (gr 2), the particle model of matter (Gr 3), phases of matter (Gr 4), mixtures and solutions (Gr 5-6) and the atomic theory of chemical change(Gr 7). What are some good demonstrations of matter? How can we get students to inquire about chemistry?

**Earth and Water-Thursday, May 24, 3:45-6:30**

How does water move through the ecosystem? (Gr 2) How is land changed by wind, water and ice? (Gr 3) What cycles do earth materials go through? (Gr 5) What is causing climate change over geological time and over industrial time?(Gr 7) This session will focus on using the outdoor environment to investigate some of these questions.