K’NEX SIMPLE MACHINES SET

LAB

INTRODUCTION

The K’NEX Simple Machines Series offers opportunities to present the curriculum through teacher-directed, whole class instruction or through independent/small group study at learning stations. These units, used individually or combined as an entire simple machines curriculum, provide an abundance of information and activities to teach about Levers, Pulleys, Wheels and Axles, Gears and Inclined Planes. The breadth of material enables you to select the best lessons to present to your students based on your time and curriculum requirements. The kit includes: 9 K’NEX Simple Machine Piece Buckets, Educator Guide, Student Activity Sheets and Blueprints.

ASSESSMENT ANCHORS Addressed

S4.A.1.1 Identify and explain the pros and cons to applying scientific, environmental, or technological knowledge to possible solutions to problems.

S4.A.2.1 Apply skills necessary to conduct an experiment or design a solution to solve a problem.

S4.A.2.2 Identify appropriate instruments for a specific task and describe the information the instrument can provide.

S4.C.3.1 Identify and describe different types of force and motion, or the effect of the interaction between force and motion.

PURPOSE

Students will investigate how simple machines make work easier, by creating a series of simple machines according to activity card blueprints. Activity cards include instructions for making the following:

- Wheels and Axles: The Spinning Top
- Levers: The Catapult
- Screws: The Hand Drill
- Pulleys: The Sailboat
- Gears: The Eggbeater

MATERIALS

For the Class

- Activity Cards and Blue Prints
- 9 Buckets of K’NEX Simple Machines Pieces

For the Teacher:

- Educator Guide Book

Teacher provides items marked with *