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# Simple Machines Diagram

## Activity 7

### Objectives

Each student will utilize a word processing program to create a diagram that shows the following seven simple machines: wedge, lever, inclined plane, gear, wheel and axle, screw, and pulley.

### Benchmarks for Technology Standards

Students will know the characteristics, uses, and basic features of computer software programs including:

- opening a file
- using basic menu commands and toolbar functions
- formatting text by centering lines
- using a word processor to apply formatting to text

### Learning Objectives

At the end of this lesson, students will be able to:

1. Center, bold, and underline the heading of a word processing document.
2. Draw seven basic simple machines using the Shapes tool.
3. Change the fill and line color of a shape.
4. Use the Text Box tool to label each figure.
5. Use the Rotate tool.
6. Apply the 3-D tool to a geometric shape.
7. Change the font size and alignment within a text box.

### Before the Computer

This activity can be completed using most versions of Microsoft Word, Open Office, and iWorks.

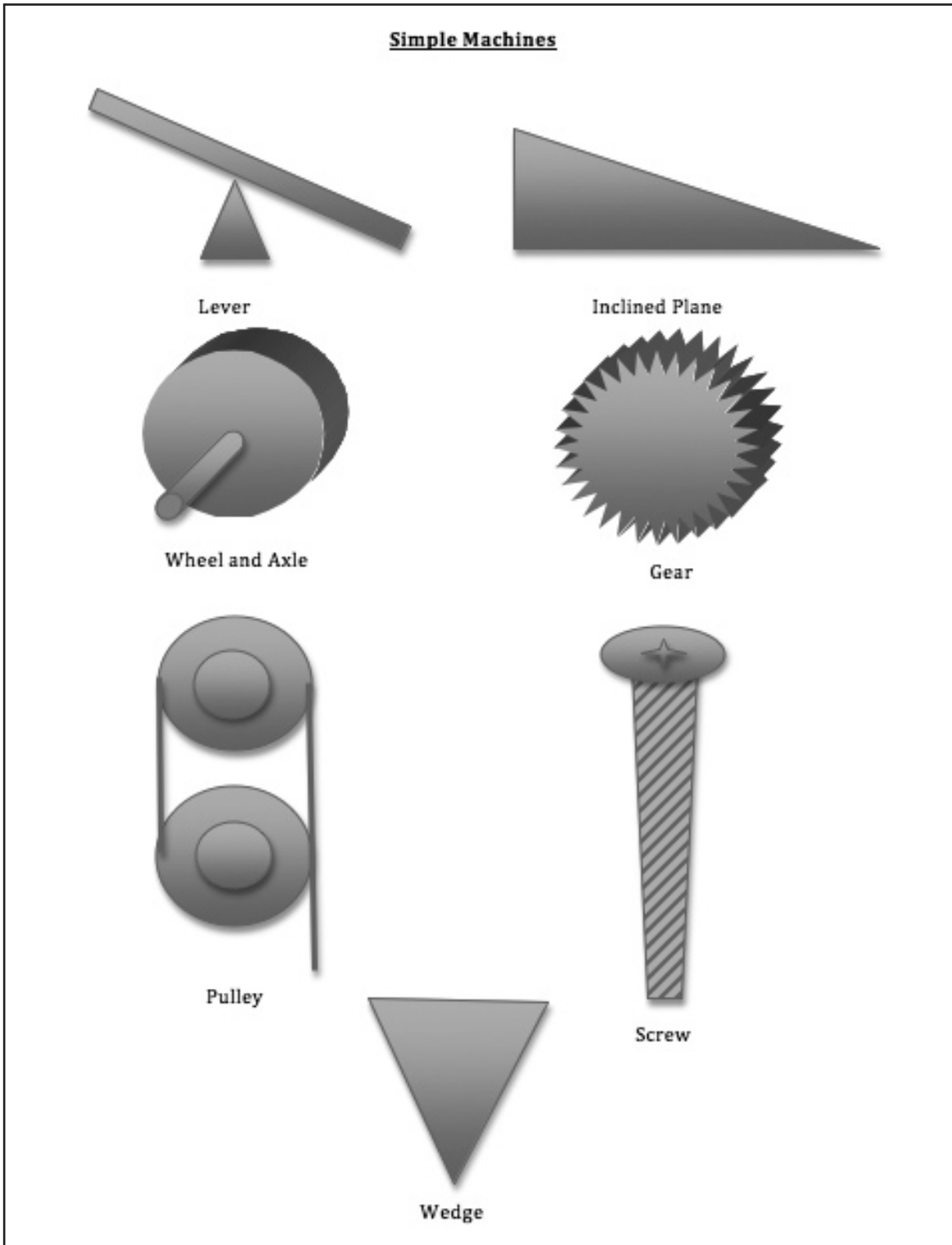
### Variations

Depending on the grade level and time allotted for this activity, you may choose to have your students add a short description of each simple machine or an example of a tool that utilizes a simple machine. An example of a completed project is shown in Figure 7-1.



# Simple Machines Diagram *(cont.)*

## Activity 7



**Figure 7-1**



# Simple Machines Diagram (cont.)

## Activity 7

### Procedure

1. Open a new word processing document.
2. Type the following heading at the top of the page: “Simple Machines.”
3. Highlight your heading by clicking and dragging over it.
4. Click on the **Align Center** button from the formatting toolbar. This should center your heading (see Figure 7-2).



Figure 7-2

5. Now click the **Bold** button (B) and **Underline** button (U) on the formatting toolbar. This will make your headline bold and underline it.
6. Next, display the **Drawing** toolbar by selecting the **View** menu, **Toolbars**, and **Drawing**. On the **Drawing** toolbar, select the **Autoshapes**, **Shapes**, or **Basic Shapes** button (Figure 7-3).

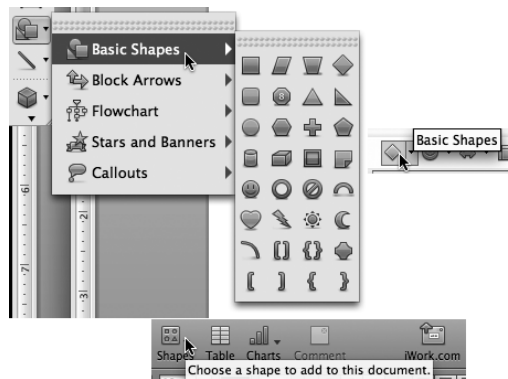


Figure 7-3

7. The first simple machine you are going to draw is a lever. A simple lever looks like a seesaw, so you are going to use the rectangle and triangle shapes tools to draw one. First, click the **square** icon, drag your cursor to the top-left portion of your document, and click and drag to draw a long, narrow rectangle about three inches long (Figure 7-4).



Figure 7-4