**3D Printing Activity 9-12: 3D Printer Basics**

Industrial Engineers use 3D Printing to make their ideas come to life! You can make anything with a 3D printer no matter how detailed. Now, let’s name the parts of the 3D printer using the words from the word bank.

**Step 1 – Name the parts of a 3D Printer:**

1. X Axis
   1. A. X-Axis Motor
2. Y Axis
   1. A. Y-Axis Motor
3. Z Axis
   1. A.Z-Axis Motor
4. Print Bed
5. Controller
6. Extruder
   1. A. Extruder Motor
7. Bowden Tube
8. Hot end
   1. A. Nozzle
   2. B. Heater Block
   3. C. Heater Cartridge
   4. D. Thermistor
   5. E. Heat Break and Heat Sink
   6. F. Cooling Fan
   7. G. Part Cooling Fan
9. End Stop/Limit Switches

