The CD4047 chip is a square wave (clock) generator. The variable resistor is used to vary the frequency of the clock. To find out more about this device look for the data sheet in the reference section of your lab handout.

The CD4516 is a binary counter capable of counting up and down, depending on the signal present on pin 10.

This is the Single Pole Single Throw (SPST) switch that will control the direction of rotation.

This schematic shows the circuit you have to assemble in week 1 of your stepper motor controller lab. This schematic does NOT show the decoupling capacitors and it does NOT show the connections that have to be made to each unused input pin on each CMOS device. This is left for you to do. Read your lab handout and wire this circuit.