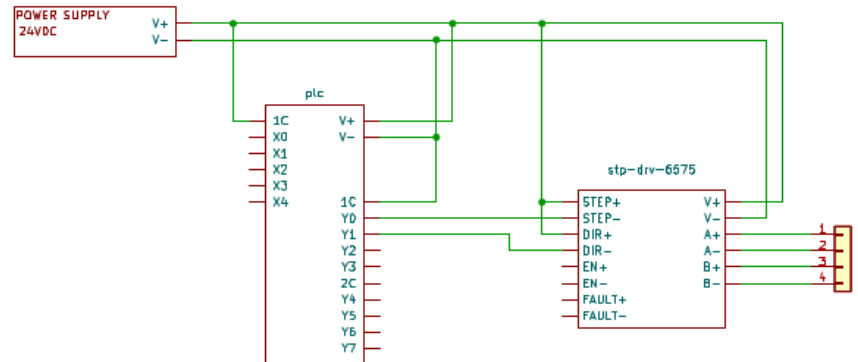Steps:

1. Wire stepper drive:

       VDC+ to +24V
       VDC- to ground
       A+ to motor cable RED
       A- to motor cable WHITE
       B+ to motor cable GREEN
       B- to motor cable BLACK

       STEP+ to +24V
       STEP- to PLC Y0
       DIR+ to +24V
       DIR- to PLC Y1

       PLC output 1C to ground
       PLC V+ to 24V
       PLC V- to ground



2. Set stepper drive to proper motor current (see data sheet)

3. Set stepper drive to 2000 steps/rev resolution (see data sheet)

4. Connect plc to laptop, run Domore Designer, and connect to PLC.

5. Go to PLC -> System Configuration, BRX Local I/O, then click on High Speed I/O.

6. Under Axis/Pulse Outputs, set Axis 1 to pulse output, step/direction, Y0 to STEP, Y1 to DIR

7. Make a ladder diagram with three stages.  In S0, have a rung with $on and AXCONFIG box.

8. Configure AXCONFIG to Axis 1, rotary, rotary range to 1001 steps (0-1000), and jump to S1 on success.

9. In S1, put a rung with $on and AXPOSTRAP box.

10. Configure AXPOSTRAP with Axis 1, rotary, absolute CW, target 1000 pulses, jump to S2 on success.

11. In S2, put a rung with $on and AXPOSSCRV box.

12. Configure AXPOSSCRV with Axis 1, rotary, absolute CCW, target 0 pulses jump to S1 on success.

13. Write PLC and run.  Motor should rotate 1/2 rev each way.  Experiment with changing acceleration and velocity parameters.  What is the highest pulse rate before stalling?