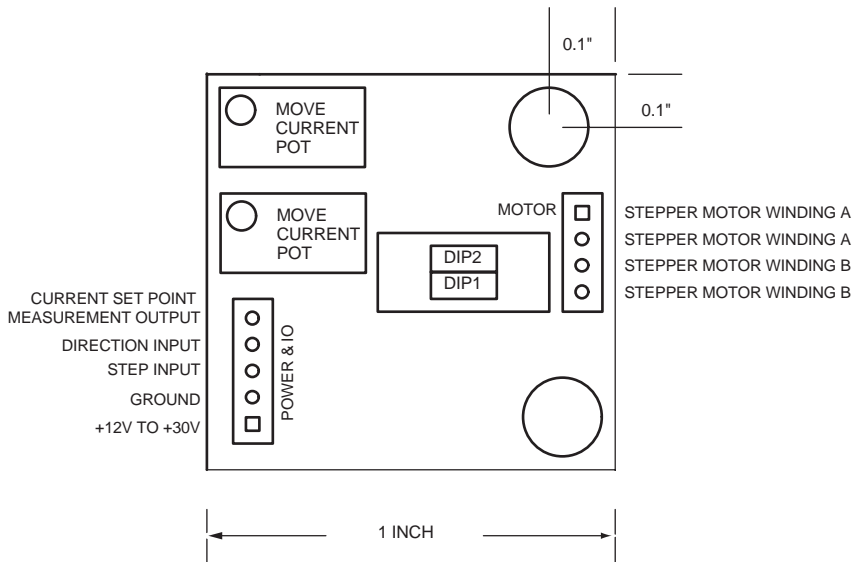


## Electrical Specifications

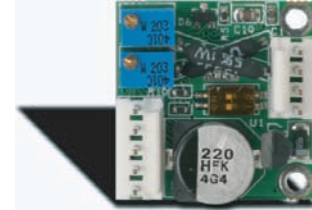
Supply Input .....	12V to 30V 1A <i>Examples:</i> Digikey part 271-1112 or Digikey part Z1158
Dimensions .....	1" X 1" (25.4mm X 25.4mm) square, 0.5" (12.7 mm) thick
Step Resolution .....	1/8, 1/4, 1/2, full step
Step Frequency .....	Up to 25000 pulses per second
Operating Mode .....	Standalone
Motor compatibility.....	Accommodates most size 23 (3") and smaller stepper motors, including bipolar or unipolar-wound motors. Best performance is with motor rated at about ¼ of supply voltage.
Mating Connectors .....	AMP MTA 100 series. Recommended tool: Digikey part A9982, or better Digikey parts A2031 + A1998.
Inputs .....	Step, direction, power, and ground  Step and direction signal Levels: <0.8V Vlow; >2V Vhigh (TTL compatible), 24V tolerant
Operating Temperature .....	0 to 45° C standard, -20 to 50° C upon special request
Relative Humidity .....	10% to 90% non condensing (operating and storage)

## Mechanical Specifications



DIMENSIONS:  
1" X 1" X 0.5" THICK

## Miniature step and direction Stepper Motor Driver



Model EZINCH actual size

### MOTOR CONNECTOR

Mating Connector: AMP MTA 100 series 4 pin, 22 GA, part 3-643813-4  
Digikey part A31108

Pin	Function	Notes
1,2	Stepper winding A	1A bipolar chopper
3,4	Stepper winding B	1A bipolar chopper

### POWER AND I/O CONNECTOR

Mating connector: AMP MTA 100 series 5 pin, 22GA, part 3-643813-5  
Digikey part A31109

Pin	Function
1	V+ (external supply) +12V to 30V
2	Ground
3	Step input
4	Direction input
5	Current set point measurement output Current (amps) = V (volts) * 0.38

## Key Features

- 4 Wire input: STEP, DIRECTION, GROUND, POWER
- 1 A chopper (PWM) stepper driver
- Operates from 12V to 30V
- 1" X 1" X 0.5" thick
- Eighth, quarter, half, or full step; dipswitch-selectable
- Hold and move current settable with potentiometers
- Move current automatically selected when step input is active
- Hold current automatically selected upon move completion
- Up to 25000 pulses per second

## Ordering Information

Name ..... Order Number  
EZINCH Stepper Drive.....EZINCH