

HC-2 High-Current Control Board

Version 1.0

Document Version: 1.00 • 01 MAR 2013

Copyright © 2013 EFX-TEK

DESCRIPTION

The HC-2 is a member of EFX-TEK's family of "amigo" boards: user-friendly, plug-and-play solutions to common prop and display circuit interfacing challenges. The HC-2 provides two solid-state (MOSFET) control outputs that allow Normally-Open switching and PWM control of DC loads up to 2.5A.

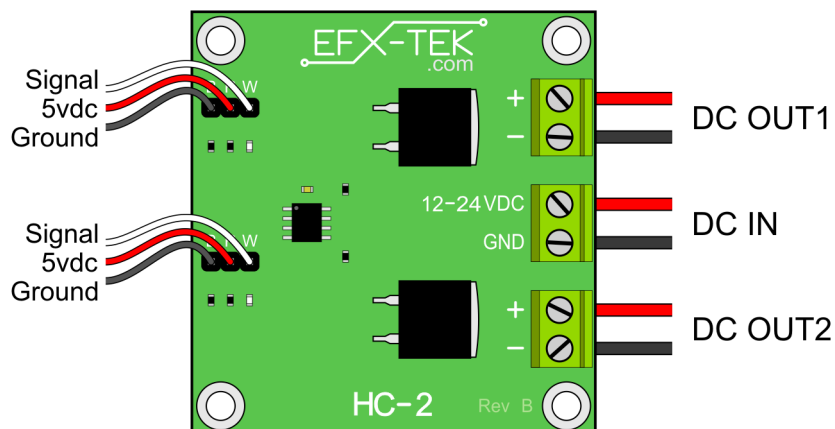
PRODUCT APPLICATIONS

- Museum and educational exhibits
- Holiday props and displays
- Film/TV/Theater effects and prop control

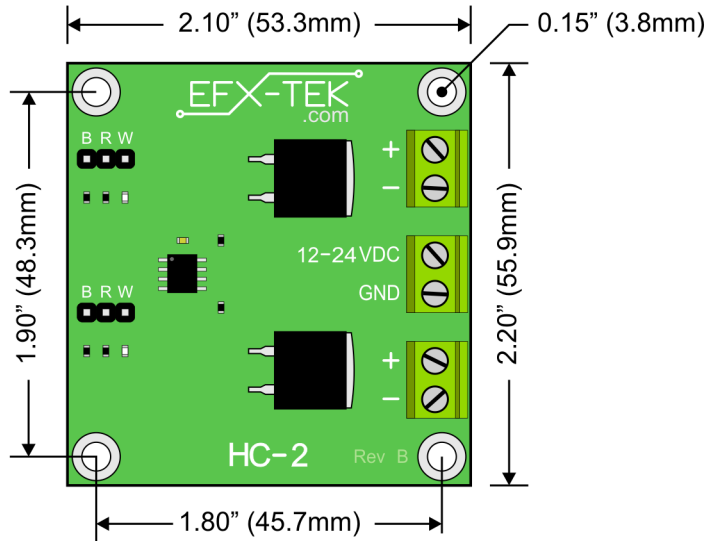
FEATURES & BENEFITS

- Plug-and-Play connection to most EFX-TEK controllers
 - uses standard WRB input header; terminal block control output
 - compatible with 5v (BASIC Stamp, Arduino) and 3.3v (Propeller) processors
- LED for each input indicates presence of 3.3v-5v control signal
- Very low current operation; less than 10mA per control channel 5vdc
- Output control: 12 to 24vdc, 2.5A
- Compact size: 2.1" x 2.2" (53.3mm x 55.9mm); 0.15" (3.8mm) mounting holes

CONNECTIONS



MECHANICAL SPECIFICATIONS



ELECTRICAL SPECIFICATIONS

Parameter	Symbol	Specification			Unit
		Min.	Typical	Max.	
Control Signal Voltage	V_{CTRL}	3	5	5.25	VDC
Control Signal Current	I_{CTRL}			1	mA
Supply Voltage	V_{IN}	4.75	5	5.25	VDC
Supply Current (both MOSFETs active)	I_{IN}			20	mA
Output Voltage (DC Only)	VR_O			24	VDC
Output Current	IR_O			2.5	A

PRODUCT CHANGES

01 MAR 2013 First production release.
PCB marked **Rev B**