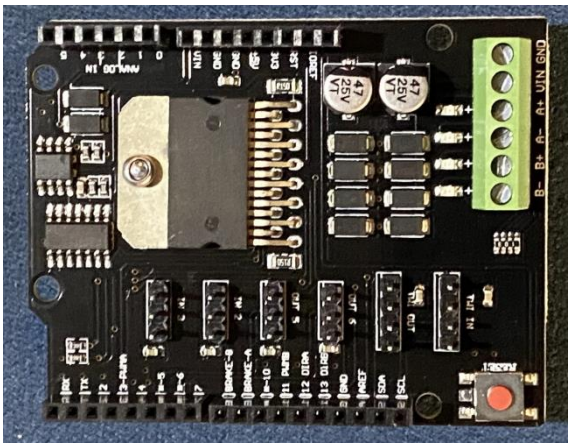
JTElectronics Arduino Motor Shield

Model: JTEMOT1



The JTEMOT1 is a standard “Arduino Motor Shield R3” with the L298HN IC in its horizontal MultiWatt15 package providing far better thermal performance than other shields that use this IC in its PowerSO20 package.

Other sources of these motor shields often provide header pins that are only 0.3mm thick which bend very easily and provide an unreliable connection to the lower microcontroller shield. We ensure the Arduino header pins are thick and strong and correctly specified to provide the most reliable connection when this motor shield is plugged into the lower microcontroller shield.

The motor shield can not only control motors - it can also be used to control lamps, or generate the complex power and data waveform used to control model trains using the DCC protocol.

Sure you might find similar items cheaper from other sources but the items I sell have all relevant configuration and firmware installed, contain the most reliable hardware components and modifications, and are fully tested!

SOFTWARE LINKS

Arduino Website with documentation	https://store-usa.arduino.cc/products/arduino-motor-shield-rev3
DCC-EX Model Railroading	https://dcc-ex.com/

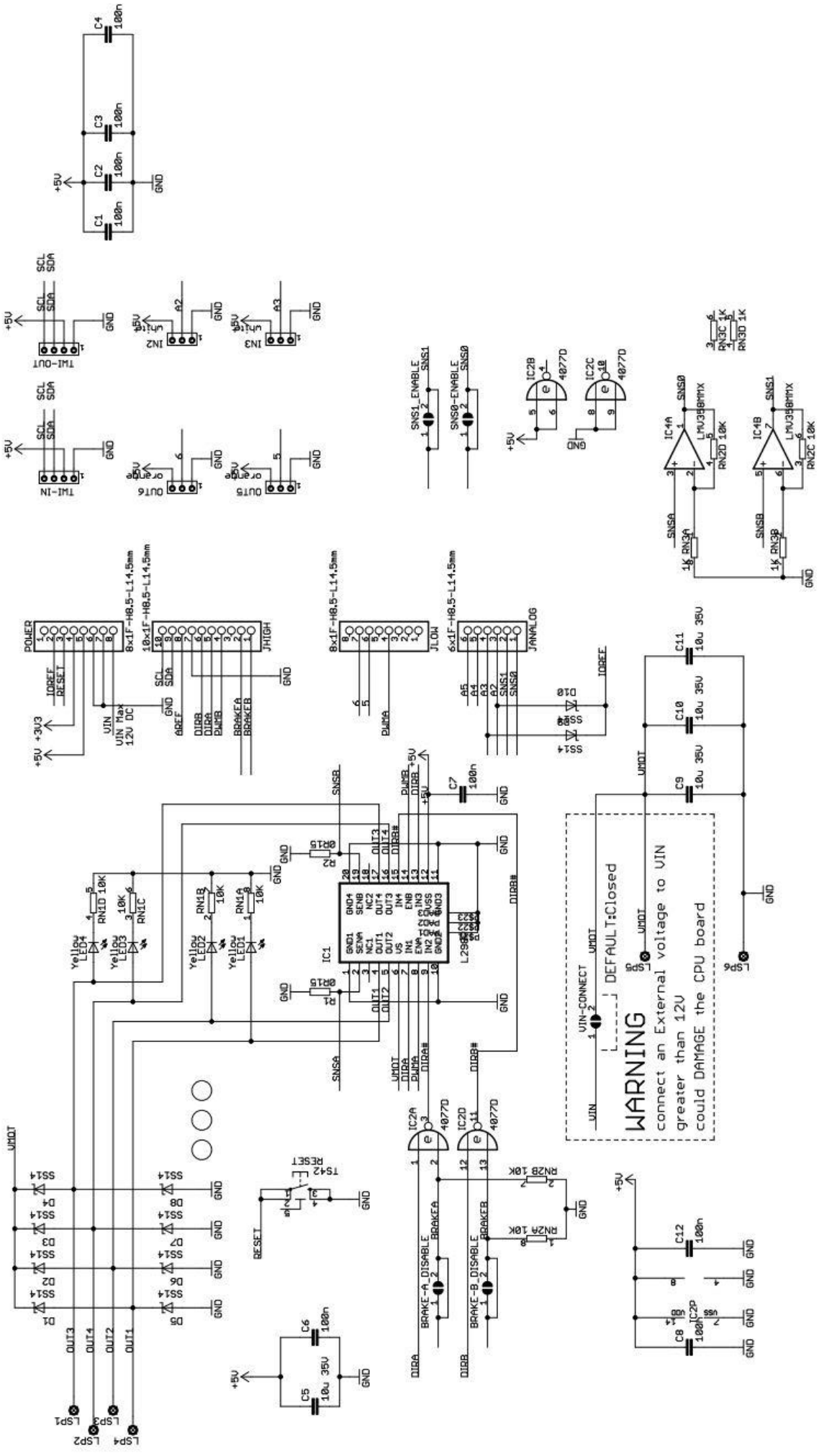
MODULE DIMENSIONS (APPROX)

LENGTH	70mm
WIDTH	54mm
HEIGHT	24mm

SPECIFICATIONS

Supply Power (Motor Section)	7 to 20 volts DC
Supply Voltage (Logic Section)	5 Volts DC
Motor Current	Up to 2 Amps per channel
Motor Channels	2

This document is updated from time to time as new information becomes available – usually due to people asking relevant questions regarding usage or configuration. The "Document Updated" date in the bottom-right corner of each page shows what document date you have. The latest version of this datasheet document can be downloaded from http://www.jtelectronics.co.nz/products/documents/ or Google "JTEMOT1 PDF"…


WARNING
connect an External voltage to VIN
greater than 12V
could DAMAGE the CPU board
DEFAULT:Closed
VIN-CONNECT
VIN
VMOT
L298
IC1
IC2A
IC2B
IC2C
IC2D
4077D
IC4A
IC4B
LMV358MMX
POWER
JHIGH
JLOW
JANALOG
TWI-OUT
TWI-IN
OUT5
OUT6
IN2
IN3
SNS1_ENABLE
SNS0_ENABLE
BRAKE-A_DISABLE
BRAKE-B_DISABLE
RESET
TS42 RESET
LED1
LED2
LED3
LED4
SS14
+5V
+3V3
GND
SCL
SDA
SNSA
SNSB
DIRA
DIRB
PWMA
PWMB
BRAKEA
BRAKEB
IOREF
VIN Max 12V DC
C1 100n
C2 100n
C3 100n
C4 100n
C5 10u 35V
C6 100n
C7 100n
C8 100p
C9 10u 35V
C10 10u 35V
C11 10u 35V
C12 100n
R1 0R15
R2 0R15
RN1A 10K
RN1B 10K
RN1C 10K
RN1D 10K
RN2A 10K
RN2B 10K
RN2C 1K
RN2D 10K
RN3A 1K
RN3B 1K
RN3C 1K
RN3D 1K
LSP1
LSP2
LSP3
LSP4
LSP5
LSP6