

DC MOTOR CONTROLLER

DCM

MODULE

X10335

INTRODUCTION

This pulse width modulated, general purpose, low voltage DC controller can be operated in any of the following modes.

Motor Control: High Frequency (RT/RT1 no link) speed control by $5K\Omega$ potentiometer.

Lighting/Heating Control: Low frequency (RT/RT linked) output level set by $5K\Omega$ potentiometer as above.

Temperature Control: Thermistor connected across RT/RT1, a temperature range of 15-150°C, temperature set by $5K\Omega$ potentiometer.

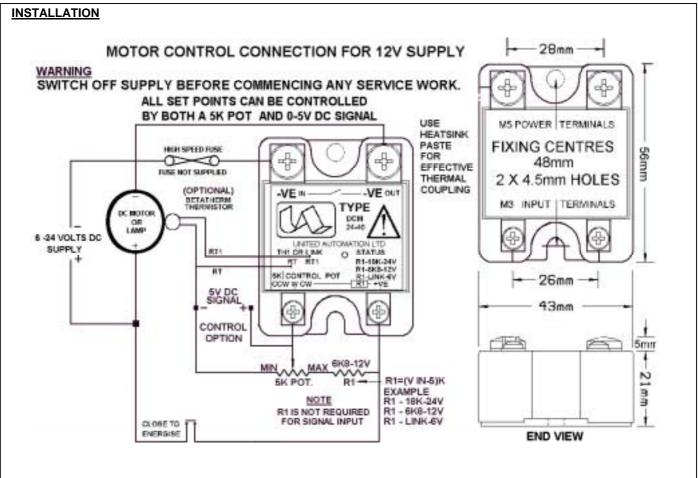
APPLICATIONS

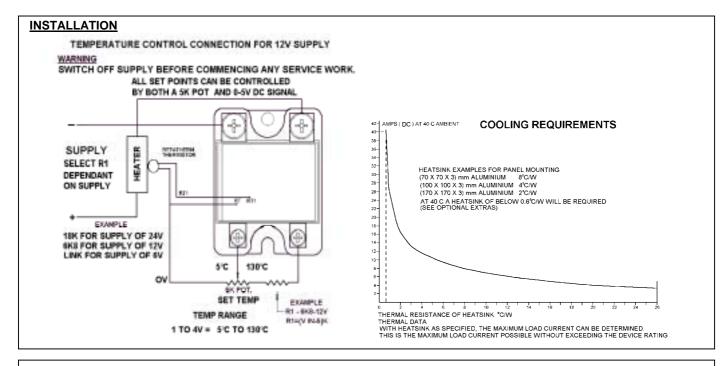
Include low voltage DC motors (high frequency), for speed control, low voltage lighting and heaters (medium frequency).

FEATURES

- Compact and easy to use
- Solid state reliability
- 2 selectable frequency ranges
- Over current protection
- Wide voltage range.







SPECIFICATIONS

Maximum DC system line voltage 24V dc Unit limiting DC current 40A Control input voltage range 0-5V dc Control input current @ 5V typical 1mA dc High frequency range (no link across RT and RT1) 350Hz Medium frequency range (link RT and RT1) 180Hz Thermistor 10K3A1 5 - 130°C Unit operating temperature range 0 to 65°C Unit storage temperature range -20 to 85°C

FUSING

It is recommended to use semiconductor fast acting type fuses or circuit breakers (Semiconductor-MCB) for unit/device protection. On initial 'switch on' some loads may need an increased Factor of Safety (F of S) for unit and/or device protection. (See SRA Datasheet for further information).

CE MARKING

This product family carries a "CE marking". For information see recommendation section and contact our sales desk. (See Declaration of Conformity).

RECOMMENDATION

Other documents available on request, which may be appropriate for your applications.

CODE IDENTITY DESCRIPTION

X10229 RFI Filtering recommendation - addressing EMC directive.
X10213 ITA Interaction, uses for phase angle and for burst fire control.

X10255 SRA Safety requirements - addressing the Low Voltage Directive (LVD) including

- Thermal data/cooling; "Live" parts warning & Earth requirements; Fusing recommendations.

AP02/4 COS UAL Conditions of sale

NOTE It is recommended that installation and maintenance of this equipment should be done with reference to the current edition of the I.E.E. Wiring Regulations (BS7671) by suitably qualified/trained personnel. The regulations contain important requirements regarding safety of electrical equipment. (For International Standards refer to I.E.C. Directive I.E.C. 950).

ORDER CODE: State part number: DCM -24

Optional extras includes: Heatsink assembly, Heatsink paste, potentiometers



UNITED AUTOMATION LIMITED

1Southport Business Park Kew Southport, PR8 4HQ ENGLAND Tel: 0044 (0) 1704 – 516500 Main Tel: 0044 (0) 1704 – 516516 Sales Fax: 0044 (0) 1704 – 516501 Enquiry@united-automation.com www.united-automation.com

