X10817 **Temperature Controllers**

ZVT2-50-IF

50A, 230V, Temperature range-0-40°C **Burst Fired Flicker Inhibited**



KEY FEATURES:

- Microprocessor-controlled \checkmark for precision.
- Flicker-inhibited operation ✓ for minimal RFI.
- ✓ Built-in high-speed fuses for added safety.
- Enclosed design with panel mounting.
- Supplied with a control \checkmark knob and scaled dial for 0-40°C temperature range.

The **ZVT2-50-IF** is a microprocessor-based linear precision temperature controller designed for high-power, closed-loop temperature control. With a 50A current capability and burst-fired flicker inhibition, this advanced unit ensures smooth operation without RFI issues. The controller is enclosed in a durable panel-mountable design, complete with an integral heatsink for efficient thermal management and extended reliability in high-ambient temperatures.

TECHNICAL SPECIFICATIONS

Thyristor limiting RMS on-state current	60A
Peak single cycle surge current	1300A
Integral high speed (semiconductor) 80A ferrule fuse	18.5mm Ø x 53.4mm long
Supply voltage for ZVT2	230Vac +/- 10% @ 50/60Hz
Temperature control range	0 to +40°C
Calibration accuracy of full scale	3%
Isolation voltage (typical)	2500V rms
Proportional band (internal screw adjust 'typical')	5-15%
Front panel Dial - Scale (54 x 46 mm linear & adhesive backed)	0 to +40°C
Operation temperature range	0 to +65°C
Storage temperature range	0 to 65°C
Control stability (typical)	1%
Weight	≈ 1.3Kg
Overall dimensions	(see Installation section)

APPLICATIONS:

Ideal for single-phase resistive heaters, ovens, dryers, hot plates, and flexible heater mats, ensuring precise and stable temperature management.

YOU MUST READ THIS BEFORE INSTALLATION

A ELECTRICAL SAFETY

WARNING: RISK OF ELECTRIC SHOCK Always consult the Installation & Maintenance Instructions before connecting this product to the power supply. WARNING: Disconnect Power Before Servicing

Ensure the electrical supply is safely disconnected before connecting to any supply, load, or control terminals united automation



Personnel Only This product must only be installed or fitted by a competent, qualified installer familiar with the relevant electrical standards and installation practices.

USER RESTRICTIONS

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WARNING: Not for Use by Vulnerable Individuals This product is not intended for use by persons (including children) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they are supervised or instructed by a person responsible for their safety.



USAGE ENVIRONMENT

HOT SURFACE WARNING <u>/ss</u>

WARNING: Hot Surfaces On certain models, surfaces marked with this symbol become hot during use. Avoid direct contact and follow all thermal safety precautions

More Info: https://united-automation.com/general-product-safety-regulation-gpsr/ 1 July 2025 | Issue: 5 | Page 1 of 2

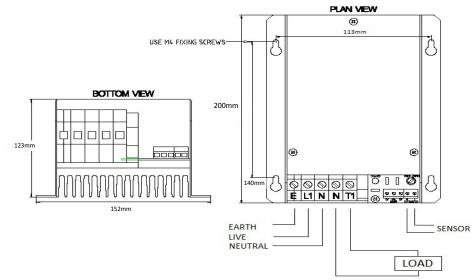


ZVT2-50-IF

50A, 230V, Up to 40°C Burst Fired Flicker Inhibited

INSTALLATION INSTRUCTIONS

Fixing/Mounting/Dimensions



RECOMMENDATIONS

FUSING

A semiconductor, fast acting type fuse, is supplied as standard for unit protection. On initial operation, some loads may need an increased Factor of Safety (F of S) for unit and/or device protection. For spares or replacements contact our sales desk.

DOCUMENTS

Other documents available on request, which may be appropriate for your application:

Code	Identity	Description
X10229	RFI	Filter recommendations: Addressing the 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, Earthing Requirements and Fusing Recommendations
X10612	ZVT-E-IF-10K3A1	ZVT enclosed flicker inhibited NTC sensor installation sheet
P01.1	COS	UAL Conditions of Sale

It is recommended that installation and maintenance of this equipment should be done with reference to the current edition of the I.E.T. regulations (BS7671) by suitably qualified/trained personnel. The regulations contain important requirements regarding the safety of electrical equipment. For International standards refer STANDARDS on D of C.

OPTIONAL EXTRAS

Product Code	Product Description
A26036	ZVT-E-IF-10K3A1 Enclosed, inhibited flicker sensor

PRODUCT CODE AND RELATED PRODUCT CODE

Product Code	Product Description
A26269	ZVT2-50-IF, 0-40°C, 50A, 230V Burst Fired Flicker Inhibited



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