

Monitoring Devices

Introduction

Overview

Devices	Application	Standards	Usage		
			Non-res. buildings	Res. buildings	Industry
	Fault signaling units • 5TT3 460 centralized fault signaling units • 5TT3 461 expansion fault signaling units	Evaluation and display of fault alarms and alarm signals for monitoring industrial plants and control systems	IEC 60255, DIN VDE 0435-303	✓ ✓	-- ✓
	Dusk switches 7LQ2 1, 5TT3 3	For demand-oriented switching of lighting installations for shop windows or paths in order to cut costs	EN 60730	✓	✓ --
	Temperature controllers 7LQ2 0	Controlling and limiting of temperatures	EN 60730	✓	✓ ✓
	Fuse monitors 5TT3 170	Monitoring of all types of melting fuses	IEC 60255, DIN VDE 0435	✓	-- ✓
	Main isolating relays 5TT3 171	Shutdown of unused lines	IEC 60255, DIN VDE 0435	--	✓ --
	Phase/phase sequence monitors 5TT3 421/5TT3 423	Monitoring of the phase sequence of a system and the power supply	IEC 60255, DIN VDE 0435	--	-- ✓

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 Voltage relays • Undervoltage relays 5TT3 400 to 5TT3 403 • Undervoltage relays 5TT3 404 to 5TT3 406 • Short-time voltage relays 5TT3 407 • Under/overvoltage relays 5TT3 408 • Under/overvoltage relays 5TT3 410 • Overvoltage relays 5TT3 19	Monitoring of the power supply of emergency lighting in public buildings	IEC 60255, DIN VDE 0435-303, DIN VDE 0108	✓	--	--
	Monitoring of the power supply for short-time failures of 20 ms	--	--	--	✓
	Monitoring of the power supply for ensuring operational parameters for devices or system components	IEC 60255, DIN VDE 0435	--	--	✓
	Monitoring of the neutral conductor for breaks	DIN VDE 0633	✓	--	✓
	Monitoring of the power supply for ensuring operational parameters for devices or system components	IEC 60255, DIN VDE 0435	--	--	✓
 Current relays 5TT 6 1	Monitoring of emergency and signal lighting and motors	IEC 60255, DIN VDE 0435-303	✓	--	✓
Priority switches 5TT 6 10	Switching of system loads in residential buildings	IEC 60669 (VDE 0632), BTO § 6 Clause 4	--	✓	--
Insulation monitors for industrial applications 5TT 3 4	Monitoring of the insulation resistance in non-grounded systems	IEC 60255, IEC 61557	--	--	✓
 Insulation monitors for medical premises 7LQ3 350	For monitoring the insulation resistance in non-grounded systems on medical premises	EN 61557-8 (VDE 0413 Part 8) IEC 61557-8:1997-02 EN 61557-8:1997-03 DIN VDE 0100-710 (VDE 0100, Part 710):2002-11 ÖVE-EN 7-1991 ASTM F1207:1996-00 IEC 60364-7-710:2002-11	✓	--	--
 Signaling and test combinations 7LQ3 351	For displaying operation and fault signals of the insulation monitor	IEC 60364-7-710:2002-11 DIN VDE 0100-710 (VDE 0100, Part 710):2002-11	✓	--	--
 Power supply units 7LQ3 352	For powering a max. of 3x 7LQ3 351 signaling and test combinations	IEC 60742:1983 + A1:1992, modified, EN 60742:1995-09 EN 61558-1:1997-07 IEC 61558-1:1997, modified	✓	--	--
 Measuring current transformers 7LQ3 353	7LQ3 353 measuring current transformers for monitoring power supplies on medical premises. They record the load current and convert it into a usable signal for evaluation devices	EN 60044-1:2001-11 Measuring transformers – Part 1: Current transformers (IEC 60044-1:1999 + A1:2000), German version EN 60044-1:2001-11	✓	--	--
 P.f. monitors 5TT 3 472	For monitoring of the underload of motors up to approx. 5 A AC by making p.f. measurements	IEC 60255 IEC 61557	--	--	✓

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	Level relays 5TT3 430/5TT3 435	Control of liquid levels in containers	IEC 60255, DIN VDE 0435	✓	--
	Thermistor motor protection relays 5TT3 43	Thermal protection of motor windings	IEC 60255, DIN VDE 0435	--	--
	GSM alarm modules	Mobile monitoring and switching of system components		✓	✓

Definitions

- I_e = Rated operational current
- U_e = Rated operational voltage
- I_c = Rated control current
- U_c = Rated control voltage
- P_s = Rated operational power
- 1 MW = 18 mm modular width

Transparent caps



Adding a transparent cap extends the 55 mm mounting depth of a device to 70 mm. This is a useful option for improving the appearance of a distribution board.