

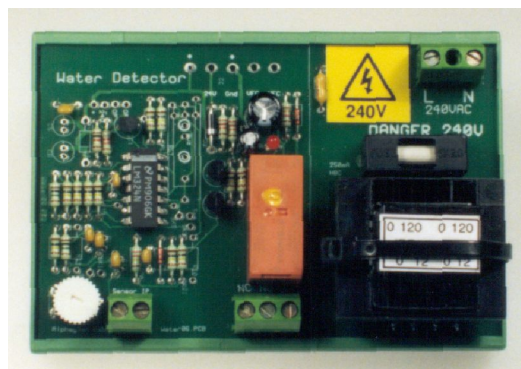
WD Water Detector Modules

Overview

A range of single zone water leak detection modules in DIN mounting carriers. One or more detector tapes or cables to remote water sensors totalling up to 200m in length can be connected and receive an AC excitation signal to minimise corrosion. A relay output is provided with an LED indicating the alarmed condition. An optional sounder may be fitted.

Typical applications include:-

- Detecting leaks under floors



Specifications

Operating characteristics

Input signals	0-10V
Operating conditions (PCB)	-10 to +50°C 0-90% RH (non-condensing)
Output	Relay output with LED indicating alarmed state
LED status	On when alarm
Response time	<1 sec
Maximum sensor tape length	200m (including leader cable)
Audible output	85dB at 10cm (where fitted)

Electrical specifications

Supply voltage(24V)	21-40 VDC or 15-30 VAC
Max operating current(24V)	50mA DC
Supply voltage(230V)	230V±15%
Terminal type	Rising cage connectors for 0.5-2.5mm ² cable
Excitation signal	2VAC at 200Hz (approx)
Installation category	IEC 664 Category II
Pollution degree	IEC 664 Degree 1

Mechanical details

Dimensions (24V)	82 mm x 67mm x 45mm
Weight (24V)	82g
Dimensions (230V)	82 mm x 112mm x 62mm
Weight (230V)	248g

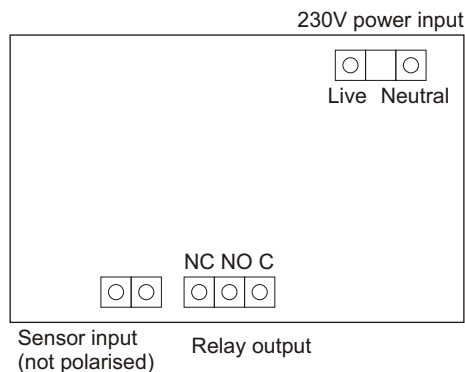
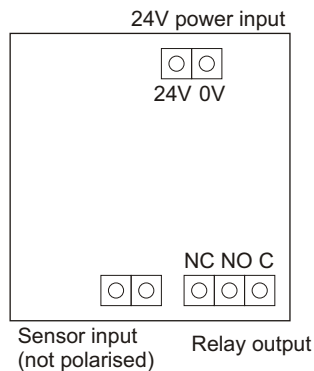
Product codes

WD-24	Water detector 24V
WD-24-BUZ	Water detector 24V with sounder
WD-230	Water detector 230V
WD-230-BUZ	Water detector 230V with sounder

Features

- Can be used with tape or with cable to remote sensors
- 12A Relay output
- LED status indication
- 24V and 230V versions available
- Adjustable sensitivity
- Audible alarm available
- Rising cage terminals
- DIN rail mounting

Connection diagrams



Alphaglen Laboratories Limited

Unit 12a, Millbrook Business Park, Jarvis Brook, Crowborough, East Sussex TN6 3JZ, United Kingdom
 Tel: 01892 664224 Email: info@alphaglen.co.uk Web: www.alphaglen.co.uk

Application notes

Hazardous voltages

Where a water detector has a 230V supply or is used to switch hazardous voltages:

- A water detector should only be installed by a competent electrician trained in installations with hazardous voltages
- A water detector may not be safe if installed in a fashion contrary to these installation instructions
- A water detector should only be installed for use with hazardous voltages if these hazardous voltages incorporate a switch or circuit breaker
- All terminals must be disconnected before screwing or unscrewing the terminals
- A water detector should be mounted in an enclosure such that it is not possible to touch any live parts with a tool through any hole in the enclosure

Sensitivity and setup

- The sensitivity adjustment is to allow for capacitance in the detection cable. It does NOT allow practical adjustment to the amount of water needed to cause an alarm
- With short sensing cables (less than 5 or 10 metres) the sensitivity pot can be left fully clockwise
- With a long sensing cable, apply power and observe that the LED comes on. Then turn the pot anticlockwise slowly until the LED goes off
- Test the operation after setting up. If the LED will not go off this might indicate that the sensor is still wet or it might indicate that the hysteresis of the unit is keeping it in alarm in which case turn the pot very slightly anticlockwise until the LED goes off
- The large majority of difficulties in setting up arise with a detection tape which is not completely dry. If in doubt, disconnect the tape (or other remote sensor) and use a multimeter to check that it is an open circuit

Other notes

- The sensor input is isolated
- Water or solvents should not be used for cleaning
- If a sounder is fitted, the sounder can be silenced by removing the jump-link

Alphaglen Laboratories Limited

Unit 12a, Millbrook Business Park, Jarvis Brook, Crowborough, East Sussex TN6 3JZ, United Kingdom
Tel: 01892 664224 Email: info@alphaglen.co.uk Web: www.alphaglen.co.uk