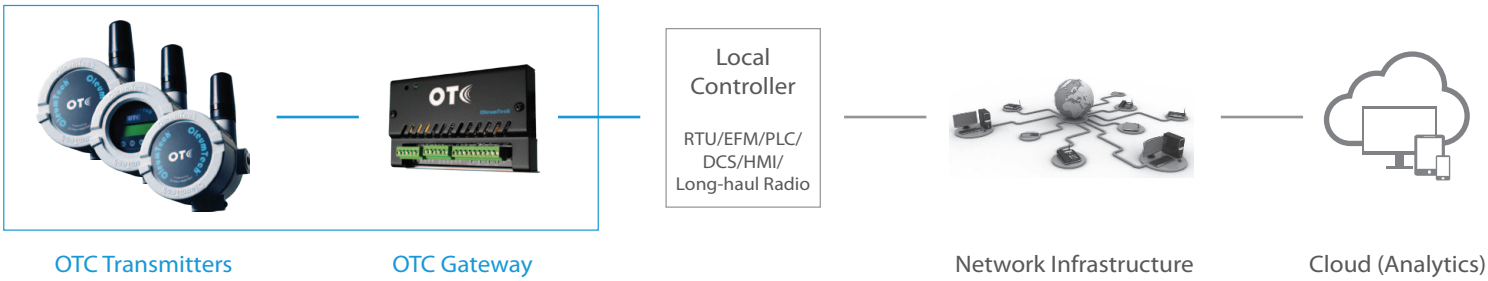
DATASHEET

Highlights

- 8x programmable digital channels
- Designed for use w/ DH1 Wireless Gateway
- Supports any mix of inputs and outputs
- Normally open/close, counts, pulsed modes
- 10 ms to 2000 ms debounce filter
- 1 Amp sink current for open-drain outputs
- RS485 serial / multi-droppable
- -40 ˚C to 80 ˚C
- Class I, Division 2 (Zone 2) certified

US Patent #6967589



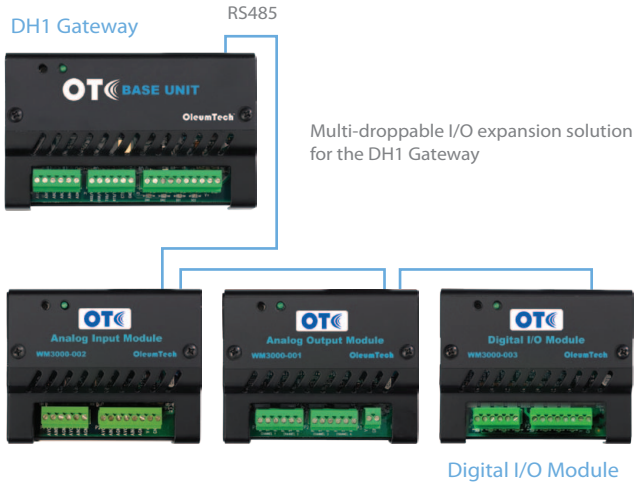
Add Additional Digital I/O to a DH1 Gateway

8x Programmable Digital I/O Channels

The OleumTech® Digital I/O Module is designed for easily adding discrete inputs and outputs to the DH1 Base Unit Wireless Gateway. Each channel can be independently software-configured as input, counter, output, or pulsed output. This Module supports any mix of inputs and outputs.

Low-Power, Small Footprint

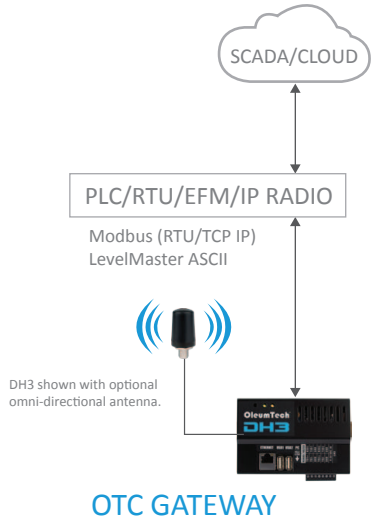
The Digital I/O Module is certified for use in Class I, Division 2 (Zone 2) hazardous locations and accepts 9-24 Vdc external power. Its compact, small footprint form factor easily fits inside a NEMA enclosure. This Module is equipped with two RS485 Serial ports (RJ-45) for allowing multiple I/O Modules to be daisy-chained to the DH1.

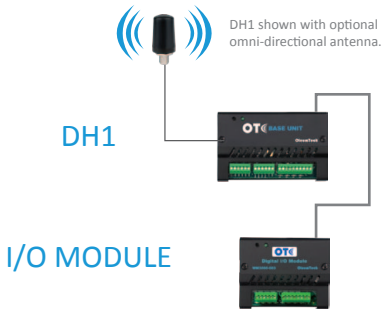


Technical Specifications

HARDWARE FEATURES	
Device Functionality	· Digital Input/Output Expansion Module for DH1 Wireless Gateway
I/O Interfaces	· 8x Programmable Channels for Digital Inputs and Outputs · Dry Contact - Internal 20 K Pull-Up Resistor on Each Port · DC Voltage Range: 3 to 24 Vdc (Max); ViL = 1.0 V, ViH = 2.4 V · Current: 1 mA < (3 or 5 V), 2.7 mA (12V), 7.2 mA (24 V) · Debounce: Software Configurable 10 to 2000 ms
Outputs	· Open-Drain with 1 A Sink Current
Interface	· Terminal Block for I/O & External Power Input · RS485 (RJ-45 2-Wire), Modbus / RTU Protocol
Multi-Dropped Units	· 247 (Max)
Self-Diagnostics	· Contains Comprehensive Self-Checking Software and Hardware for Continuous Monitoring of Operation
CERTIFICATIONS & COMPLIANCE	
Over Voltage Rating	· Transient Voltage Suppressor on Each Port
Safety	· Class I, Division 2, Groups A, B, C, D T4; Ex nA IIC T4 · Class I, Zone 2 AEx nA IIC T4 / 9-30 Vdc, Ta = -40 to 176 °F (-40 °C to +80 °C) · ATEX: Sira 14ATEX4143X; Ex nA IIC T4 Gc · IECEx: SIR 13.0055X; Ex nA IIC T4 Gc / 9-30 Vdc, Ta = -40 to 176 °F (-40 °C to +80 °C)
MECHANICAL SPECIFICATIONS	
Dimensions	· 3.8" (W) x 3" (H) x 1.4" (D) / 96.5 mm (W) x 76.2 mm (H) x 35.6 mm (D)
Package Dimensions	· 8" (W) x 6" (H) x 2.5" (D) / 203 mm (W) x 152 mm (H) x 63 mm (D)
Weight	· Net: 0.75 lbs / 0.3 kg; Packaging: 1 lbs / 0.4 kg
Mounting	· DIN Rail Mountable with Height Adjustability
ELECTRICAL SPECIFICATIONS	
DC Power Input	· 9-24 Vdc
Power Consumption	· 360 mW @ 12 V (Max) (All LEDs On); 60 mW @ 12 V (Max) (All LEDs Off)
LED Indicators	· 8 LEDs Indicating On / Off State of Open-Drain Outputs or Low / High State of Input Signals
Wiring	· 18- 24 AWG
GENERAL SPECIFICATIONS	
Operating Conditions	· Temperature: Class I, Div 2: -40 °F to 176 °F (-40 °C to 80 °C) ATEX/IECEx: -40 °F to 176 °F (-40 °C to 80 °C) · Humidity: 0 to 99 %, Non-Condensing
Warranty	· 2-Year Parts and Labor
Country of Origin	· USA
ORDERING INFORMATION	
Model Number	· WM3000-003
Connects To	· DH1 Base Unit Wireless Gateway and Expansion Modules
Configuration Cable	· SX1000-CC2, 20-ft All-in-One Configuration Cable

Networking Diagram





Typical installation of OleumTech expansion modules are mounted adjacent to the DH1 Base Unit on DIN rail in a NEMA 4 enclosure and connected with supplied inter-module connector cable. Expansion modules compatible for use only with DH1 Gateway.

MADE IN USA