MINI WIRELESS I/O MODULE
DIN Mounted Module for Wireless Network

- INPUTS / OUTPUTS MODULE WITH BUILT-IN 900MHZ RADIO
- WIRE REPLACEMENT FOR ANALOG AND DISCRETE SIGNALS
- PERFECT FOR CONTROL & SHUTDOWN APPLICATIONS
- 3-MILE RANGE WITH BUILT-IN WIRELESS MESH

DESCRIPTION

The MINI edition of the SignalFire Wireless I/O System is a cost effective module that reads, controls and transmits an analog 0-5V input and has programmable relay outputs. There are two modes of operation, the first utilizes two modules and acts as a wire replacement that replicates the digital signals over a wireless link between the pair of MINI Wireless I/O Modules. The second mode of operation is as a standard node that sends the I/O data (via the SignalFire wireless mesh network) to a SignalFire Gateway where the data is available via a Modbus-RTU or Modbus-TCP interface. The modules are DIN rail mounted and designed to be easy to use.

Point to Point I/O Mirroring Configuration: The digital inputs from one module are replicated on the other module (and vice versa).

Standard SignalFire Configuration: Operates as a remote node with a standard SignalFire Gateway. All I/O data is available at the Gateway as Modbus registers. Supports Modbus writes to control the relay outputs. SignalFire node in a SignalFire network, providing longer-range as well as more sophisticated monitoring and control.

FEATURES

- One Analog Input (0-5VDC)
- Two Digital Inputs (dry contacts)
- Two Relay Outputs (2 SPDT)
- Acts as a repeater for other SignalFire wireless devices
- Wide Range DC Power Input (6-36VDC)
- Low Power Consumption
- DIN Rail Mount with pluggable screw terminal blocks
- Status LEDs
TECHNICAL SPECIFICATIONS

**Operating Temp**
-40°C to 65°C, -40°F to 149°F

**Power**
6-36VDC (25mA average @12V no relays energized, additional 15mA max for each energized relay plus any analog output)

**Inputs / Outputs**
2 DI: Dry contact or 30VDC max (push-pull)
1 AI: 0-5VDC
2 DO: 2A@30VDC, 0.5A@125VAC

**Radio Frequency**
902-928 MHz ISM band, FHSS radio

**Antenna Connection**
RP-SMA

**Enclosure**
Industrial ABS DIN Mount

**Approvals**
Class I Div 2 Certified, Groups A, B, C, D, T5. Certified to CSA C22.2 No. 213, Conforms to UL 121201:2017 ISM Band: FCC & Industry Canada (IC)

**Wired Termination**
18 AWG

**Radio Power**
500 mW

**Range**
Up to 3 miles line of sight (depending on antenna)

**Weight**
0.22 kg, 0.5 lb

STANDARD CONFIGURATION ORDER CODES

<table>
<thead>
<tr>
<th>DESCRIPTION</th>
<th>ORDER CODE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wireless MINI I/O, Whip Antenna</td>
<td>WIOM-MINI-IOMIX1-WHIP</td>
</tr>
<tr>
<td>Wireless MINI I/O, External Panel Mounted Antenna</td>
<td>WIOM-MINI-IOMIX1-EXT</td>
</tr>
<tr>
<td>Wireless MINI I/O, Remote mount antenna, 20ft RG58 cable, RP-SMA connector</td>
<td>WIOM-MINI-IOMIX1-ANT-WP-RPSMA-20</td>
</tr>
<tr>
<td>Wireless MINI I/O, Remote mount antenna, 20ft RG58 cable, N-Male connector</td>
<td>WIOM-MINI-IOMIX1-ANT-ANT-N-20</td>
</tr>
<tr>
<td>Wireless MINI I/O, Remote mount antenna, 30ft RG58 cable, RP-SMA connector</td>
<td>WIOM-MINI-IOMIX1-ANT-WP-RPSMA-30</td>
</tr>
<tr>
<td>Wireless MINI I/O, Remote mount antenna, 30ft RG58 cable, N-Male connector</td>
<td>WIOM-MINI-IOMIX1-ANT-WP-N-30</td>
</tr>
</tbody>
</table>

<image>