Application Note Room Alert



The Relay Switch is a device that connects to a Room Alert 32W, 32E and/ or 4E unit and provides four (4) relay outputs that can turn on/off (i.e. open or close) when an alarm is detected. It includes three (3) relays that can each be individually controlled via the Room Alert web interface or automatically in response to an alarm condition. The fourth relay is used as a general alarm output and will be turned on or activated whenever any of the first three relays are activated.



To configure Room Alert to use the Relay, access the 'Alarm Options' tab of the Settings screen and be sure to select 'Relay' from the 'Connected Signal Tower / Relay' configuration box. Next, connect the Relay box to the black output connector on the Room Alert unit using the cable provided. The sensor wire included with the relay can be used to connect each of the relay outputs to the desired external device. A common application is to connect one of the relay outputs to an input on a building alarm or security panel.

When the Relay is connected, a light on the bottom left corner of the Relay box will indicate that is has power. Each of the relay outputs can be tested by simply clicking the associated relay graphic on the web interface for the Room Alert monitor you are using. Relay outputs should be tested on a regular basis to be sure they are functioning as expected in the event of an alarm condition.

Each Relay can also optionally be turned on/off automatically in the event that an alarm is triggered or when an alarm clears. These options are available on the 'Alarm Options' tab of the Settings screen on the Room Alert. Device ManageR can also communicate with any Room Alert 32W, 32E and/or 4E on the network and automatically toggle the relay outputs based on current alarm conditions.

Sensor cable used to connect the relay outputs to other devices can be any low voltage cable such as bell wire, speaker cable, data cable or telephone cable. Minimum voltage insulation 50V, minimum current carrying capacity of at least 1A. Sensor cable must exceed the minimum electrical requirements of the device being connected. Maximum recommended length is approximately 100' although shorter lengths will yield more reliable performance. Distances up to 900' are possible although the specific setup should be tested to ensure proper operation.

IMPORTANT SAFETY NOTICE

The Screw Connectors On The Sensor ID Boxes Are Volt-Free Contacts Only. Do Not Connect These Terminals To Any Live Circuit. A Qualified Electrician Should Be Consulted To Test Any Wires You Connect To The Room Alert ID Box For The Presence Of Electrical Voltages And If Any Are Detected, They Must Not Be Wired To The ID Box. The ID Box May Become Dangerous If You Connect It To A Live Circuit. Never Connect Main Power To Any Of The Room Alert Sensors Unless Specifically Instructed To Do So Using The AVTECH Software 5V Power Adapter. If Required, An AVTECH Software 5V Power Adapter Will Be Included With That Sensor. DO NOT Use Switch Sensors In 'Explosive' Environments Unless Approved For Those Environments.

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