



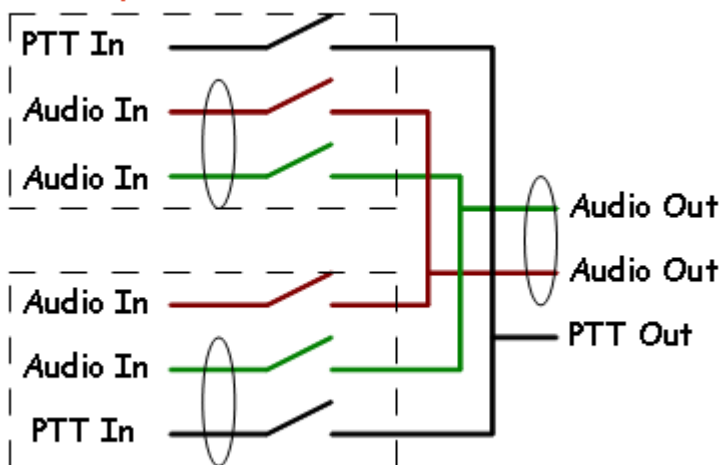
## PAS - Priority Audio Switch 2 in, 1 out (2 instances)



### FEATURES

- Industrial rated -40 to +75 C
- Two audio ports in with a secondary and primary E&M port
- Two instances of 2 in by 1 out
- 48 VDC relay controlled
- Can be rack mounted

#### Priority



#### Secondary

### DESCRIPTION

The Priority Audio Switch takes in 2 4-wire E&M or audio lines with the M-lead for switch control. The ports are paired as Primary and Secondary. The "Priority" will seize control of the audio channel when the E-lead into the PAS turns on. The E-lead input is the M-lead output of a channel bank set to A-Side wiring. The E-lead input can also be a Push to Talk (PTT) lead directly from a radio.

If the Secondary port is talking through the E&M transmit pair and the Primary port asserts the M-lead, Primary seizes the transmit pair. The PAS has 2 pairs of Priority/Secondary ports. Therefore there are 2 independent input port pairs.

Received audio is broadcast back out ports both the Primary and Secondary ports.

The M-lead input is a closure to chassis ground on the channel bank. The power input to the Priority Audio Switch is 48 volts DC supplied externally from the channel bank power supply. When the M-lead from the channel bank closes for port 1, 48 volts is applied to the switch, which cuts off the transmit audio of port 2 and switches the audio path to port 1.

The Priority Audio Switch has 2 completely isolated instances of the priority switching function.

There is an internal jumper for each audio pair to provide either an internal ground connection or ground connection from the attached input device. For example, if a radio attached to the output side of the PAS has voltage on the PTT lead when it is activated, the internal ground connection is used to insure the radio PTT voltage does not continuously hold the relay in the priority position.

## PAS - Priority Audio Switch

### SPECIFICATIONS

#### General

Four audio input ports, 2 sets of 2 in by 1 out pairs with priority

- RJ45 connectors
- E&M M-lead control input on pin 2
- Audio priority control via M-lead
- Receive audio is broadcast back to both input ports
- 2 pairs of controlled Priority/Secondary ports
- 

#### Physical/Electrical

Power requirements: 48VDC

5 ¼" x 5 ½" x 1 ¾"

One pound

#### Environmental

- Operational Temperature: -40 to +75 C
- Storage Temperature: -50 to +75 C
- Humidity: <95% Non-condensing

### Application:

The application below shows the Priority Audio Switch used with AM3440 channel banks. Push to talk at the controller positions on the left is passed across the link using E&M signaling. One of the 2 positions is secondary, the other priority. If the priority position keys the radio transmitter while secondary is talking, relays switch the radio transmit audio to the priority connection. The receive audio is always passed back from the radio to both controllers.

Rear View



Above picture shows 48 VDC connector



Data Comm for Business, Inc.

2949 CR 1000 E

Dewey, IL 61840

Voice 8004DCBNET

(800.432.2638)

Fax 217.897.1331

Email [www.dcbnet.com/contact.html](http://www.dcbnet.com/contact.html)

Web <http://www.dcbnet.com>



Primary Dispatcher

Two dispatch positions share one radio with the DCB Priority Audio Switch



Audio Links



PAS



Transceiver



Secondary Dispatcher