# Description

These instructions are designed to help you install a Tellabs 242 Open Window Bridge in a central station. The Tellabs 242 interfaces between the DMP SCS-1 Receiver and existing Direct Wire or McCullough accounts. Incoming lines can have a maximum 2-wire line loss of 26 dB.

## **Equipment Needed:**

ltem	Qty	Tellabs Number	Description
1)	1	24XA	19" rack mount card cage with 12 card slots
2)	1	4251A w/9952H	Combiner amplifier w/ 2025, 2225 Hz filter
3)	1	4252A w/9952J	Splitter amplifier w/ 1070, 1270 Hz filter
4)	1	8002A or 8007	2 Amp 48 VDC power supply 10 Amp 48 VDC power supply
5)	*	4255S	Quad termination module with sealing current

\*Each 4255S provides a 2-wire hookup port for up to four DMP command processor panels. Up to ten 4255S modules can be mounted in the Tellabs 24XA rack. This gives a total capacity of up to 40 monitoring ports for each 24XA rack.

This equipment is manufactured by:

Tellabs, Inc. 4951 Indiana Ave. Lisle, Illinois 60532 (708) 969-8800

#### **Measuring dB levels**

A small decibel meter capable of measurements to -60dBm is required to accurately adjust power levels on the 2-wire lines. Use the DMP Model 550 dB Meter for taking measurements when installing the Tellabs 242 Open Window Bridge.

Direct Wire accounts connected to the bridge must have a DMP 1812, 1912, 1912XR, or XR200 Command Processor panel installed at the end user's site.

McCullough accounts with two users on one loop must be divided into separate 2-wire runs to the central station. Each McCullough account connected to the bridge must have a DMP 1812, 1912, 1912XR, or XR200 Command Processor panel installed at the end user's site. An example of a proper McCullough circuit is illustrated in Figure 2.









# Figure 2: McCullough loop with direct wiring

### **Open Window Bridge Installation**

The physical installation of the bridge shall be in accordance with the practices and installation procedures provided by Tellabs, Inc. This information shall be supplied by Tellabs when the bridge is purchased. DMP provides a Multiplex Training and Troubleshooting guide (LT-0140) that explains the various aspects of installation, setup, and operation.

When the DMP 1812, 1912, 1912XR, or XR200 Command Processor panel is installed at a site, the 2-wire line from the old Direct Wire, McCullough, or other 2-wire multiplex system is attached to its multiplex jack. Each 2-wire line from a site can have a maximum line loss of 26 dB.

Each account is balanced by the bridge to provide continuous operation. The bridge attaches to the SCS-1 receiver line card through a 4-wire bus. The receiver line card can communicate with up to 128 individual accounts. The SCS-1 Receiver has a capacity of five line cards attached to five bridges with a total capacity of 640 multiplex accounts.



An illustration of the conversion follows:





### Figure 4: Converted 2-wire

Tellabs 242 Installation

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# INITIAL SETUP