## FCD-2L

## E1 or Fractional E1 Access Unit

- Single port access to E1 or fractional E1 services
- Optional built-in LTU
- Selectable sync data rates: n x 56 kbps, n x 64 kbps
- Data interfaces: V.35, RS-530, V.36/RS-422, X.21
- Integrated Ethernet bridge option
- E1 interface complies with ITU G.703, G.704, G.706, G.732 and G.823
- Main link diagnostics include loopbacks, BER test and data port monitoring
- DTE2 support

The FCD-2L is a single port access unit for full or fractional E1 services. Data port rates are selectable for any multiple of 56 kbps or 64 kbps up to 1,984 kbps. Alternatively, the data port can be replaced by an Ethernet bridge, providing direct connection to the LAN. User data is



placed into the E1 frame, using only the required number of timeslots. Timeslot assignment is according to the data port speed and is consecutive, starting from any timeslot.

The FCD-2L can be ordered with or without an LTU (Line Termination Unit). The integral LTU ensures a range of up to 2 km (1.2 miles).

The FCD-2L meets all requirements of ITU for G.703, G.704, G.706 and G.732. It supports both two and 16 frames per multiframe, with or without CRC-4. Zero suppression over the line is HDB3.

The unit may be clocked from the recovered receive clock (LBT) of the main E1 link or from an internal oscillator.

The data channel interface is RS-530. Adapter cables are available for V.35, V.36/RS-422 or X.21.

The unit also supports an optional UTP bridge port.

FCD-2L setup and control is by internal jumpers. Front panel switches control all diagnostic options.

Diagnostics include user activated local loopbacks on the main E1 link and DCE data port. A pseudo-random data pattern (BERT) can be used to check the transmission path and the local and remote units. The FCD-2L can display major and minor alarms, and indicate bit error rate on the E1 line in excess of  $1 \times 10^{-3}$ .

The FCD-2L is available as a standalone unit or as a card for a 19" rack. An adapter kit enables installation of one or two standalone units in a 19" rack.