



B044 Dual G703 Detector Module



The B044 is part of the Hawkeye range of detector modules for monitoring G703 signals (at 2.048MHz rate). The module monitors two incoming signals and provides active loop through outputs on BNC's and provides local indications on the front panel of the module. It also provides remote status signals via open collector or relay outputs. The design is implemented using an industry standard line receiver/framer chip from PMC. A micro-controller processes the data from the framer to provide the local and external alarms. A peak detector provides level detection with adjustable threshold, normally set to -4dB . The features are:-

- Two independent detectors per module.
- 75R transformer coupled input and output (120R Bal. if req.)
- Active loop through outputs
- Input level detector with adjustable threshold.
- Four alarm indications per channel.
- All alarms are available on open collectors.
- Any one of the four alarms is selectable to the summary alarm (Relay).
- Four alarms -
 - 1 – Signal level indication
 - 2 – Alarm insertion signal present (AIS) & TS16 AIS
 - 3 – Loss of Framing or Multi Framing
 - 4 – CRC 4 quality threshold alarm
- Threshold adjustable $\pm 6\text{dB}$, alarm will turn on with loss of signal.
- Alarm will turn on when three consecutive incorrect frame alignment signals have been received.
- CRC4 errors are counted internally and update a 10 bit counter every second, with the alarm being set if the count exceeds a pre-determined level.

