Eurotek
Broadcast Solutions

BOARD PLUG-IN EK-NAE/3
"NETWORK ADAPTER"

The EK-NAE/3 board is a 2 ASI to E3 transparent multiplexer/network adapter, and E3 to 2 ASI network adapter/transparent demultiplexer (see EK-NAE/3 block scheme). It is composed by two physical input represented by the two input BNC connectors located in the board panel (see EK-NAE/3 board panel description),

plus two internal inputs that are directly connected with the Mainframe by the internal connections matrix line (see EK-MFR/2 user's manual). The same composition is mirrored for the other way. All the TS inputs are interfaced with the VC mapper unit, the transport stream present on a particular input can be mapped to one of the four Virtual Channels (VC1 ÷ VC4) of the VC mapper. If an input is not used it can be connected by the menu to the waste container. After the mapping procedure between the input transport streams and the desidered Virtual Channels, an unique stream is generated. After that optionally it is possible to add RS correction code bits, the insertion of the RS encoder limits the bit rate capability of the system.

The next step is to serialize the stream at the fixed bit rate of the E3 output port.

On the other way the incoming E3 signal is clock recovered and then deserialized, the optional RS decoder performs the error correction and then the demapper unit extracts the packets for each output. The architecture of the system permits to use the processed TS for SFN network because never in the chain of the incoming packets is modified and anyway the time position of the packets at the outputs of the transparent demultiplexer is related to the inputs.

Features

- E3 to ASI & ASI to E3 Adapter
- 4 different ASI input
- Bypass output function
- Complete web management

Applications

- Digital Microwave Links
- DTV, DVB-T, DVB-S

ALL4DIGIT SYSTEM

DVB Digital Video Broadcasting

TECHNICAL SPECIFICATION

TS Ports	ASI
PDH Ports	G.703
Input Stream type	ISO / IEC 13818-1
ASI Data-Rate	1-216 Mbit/s
Internal Data-Rate	1-216 Mbit/s
Performance/overall jitter	ETR 101290
ASI i/o Reference	EN 50083-9
Max. Input cable length	200 m Belden 8281 except when in bypass mode
Power Consumption	5 W
Input / Output Connector	BNC FEMALE 75 Ohm

BLOCK SCHEME