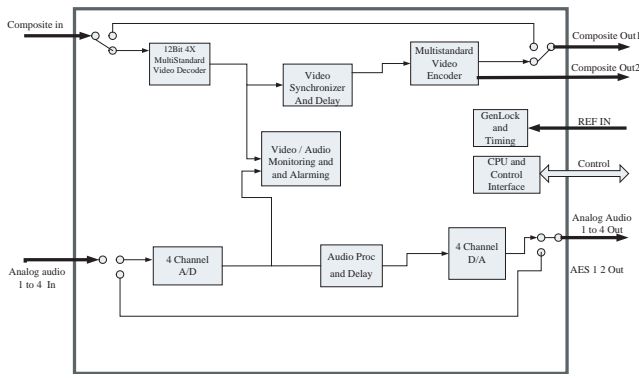


**Description:**

The DL240ANA solid state delay line provides up to 120 seconds delay for audio and video signal to give an operator complete control over the program content being broadcast to air. The signal monitoring and alarm features provide input signal error detection. Video input, freeze frame, black field, audio too high and too low errors are all monitored by the DL240ANA. The DL240ANA offers analog composite video input and output, 4 channels balanced analog audio input and output. The outputs of DL240ANA are all protected by relay bypass.



FUNCTIONAL BLOCK DIAGRAM

**Features:**

- ▶ 120 seconds maximum delay
- ▶ 4X A/D and 8X D/A conversion with 12-bit resolution for analog composite video
- ▶ Advanced 5-line adaptive comb filter for analog composite video input
- ▶ Automatic gain and chroma controls (AGC and ACC)
- ▶ Fully functioned video processing amplifier
- ▶ Frame synchronizer
- ▶ Test signal generator (color bars and black field outputs)
- ▶ Input signal error monitoring
- ▶ Relay bypass protected outputs
- ▶ Redundant power supply



**Specifications:** specifications are subject to change without change

**Analog Video Specifications**

Standards	NTSC, PAL
Return Loss	>40 dB to 5.8 MHz
Composite Input (BNC)	75 ohms, 1 Vp-p, +/-3dB
Composite output (BNC)	75 ohms, 1 Vp-p
A/D and Decoding	4X 12-bit
D/A and Encoding	8X 12-bit
Decoding Algorithm	5-line adaptive comb
Frequency Response	±0.1 dB to 5.8MHz
Signal to Noise Ratio	>70 dB 10 kHz to 6 MHz
Differential Gain	<1%
Differential Phase	<1 degree
K-Factor (2T)	<.5%
Video Level	+6 dB/-1 dB
Luma Level	+/- 6dB
Chroma Level	+/- 6 dB
Hue Phase	+/- 90 degrees
Black Level	+/- 7.5 IRE

**Genlock Specifications**

Genlock Ref (BNC Loop)	75 ohms, 1 Vp-p
Return Loss	>40 dB to 5.8 MHz
Horizontal phase range	1 line, with resolution of 37 ns
Vertical phase range	1 frame, with resolution of 1 line
Subcarrier phase range	60 degrees, with resolution of 1.4 degrees

**Analog Audio Specifications**

Connection	3-pin connector
Number of Inputs	2 Stereo Channels (Balanced)
Input Impedance	>36kohms
Input Operating Levels	+24, +20, +16, +12dBu, 36kohms
Maximum Input Level	+24 dBu
A/D Resolution	24-bit
Number of Outputs	2 Stereo Channels (Balanced)
D/A Resolution	24-bit
Output Operating Levels	+24, +20, +16, +12dBu, 36kohms
Maximum Output Level	+24 dBu (66ohms)
Sampling Rate	48 kHz

**Ordering Information:**

DL240-ANA: Analog composite/analog audio delay line