### Preliminary Information

# **DN7204**

The Klark Teknik model DN7204, a dual input, four output user configurable digital delay line with 2.8 seconds of total delay time, offers a host of features whilst maintaining the ease of operation for which Klark Teknik products are renowned.

# User Configurable Digital Audio Delay Line & EQ



The primary purpose of the DN7204 is for synchronisation of sound paths in multiple signal distribution systems and multiway loudspeaker systems in theatre and public address installations and touring sound reinforcement systems, although it will also prove useful in delaying audio for video in post production suites and synchronisation of audio for satellite transmissions.

In addition to delay, the unit is provided with a high frequency shelf and two bands of fully parametric equalisation on each output. Thus millimetre accurate delay compensation is combined with the precision and clarity of Klark Teknik EQ.

Also featured are peak limiters on each output. These have a 'no overshoot' action and threshold setting in dBu or volts, for easy amplifier matching.

Unit configurations and delay settings can be quickly and easily set up using the front panel controls (2x16 character LCD, 6 function buttons and one rotary encoder) and stored in any of the non-volatile memory positions. Delay time resolution is  $21\mu S$  allowing accurate time alignment of drivers in multi-way loudspeaker systems.

Delay settings can be displayed in units of time (milliseconds) or distance (metres, centimetres, inches or feet). As well as individual delay times for each output, master delay times are provided on each input, allowing quick and accurate alignment of delayed speaker stacks. When set in distance mode, a temperature compensation facility is incorporated.

Each output has an independent digitally controlled output level, adjustable from +12dB to -24dB in 1dB steps, plus Mute. These are automatically stored with the delay settings in the user memories.

Full control lock-out is featured, with a user-definable code number for function access.

Fail-safe bypass relays are fitted as standard enabling automatic bypass in the event of power supply interruption.

Other options include transformer input and output balancing.

A MIDI interface is provided as standard.

#### Features

- 2.8 seconds total delay time.
- 18 Bit linear AD/DA conversion for state-of-the-art noise and distortion performance at 20Hz to 20kHz.
- Analogue output attenuators.
- Input headroom level indicator.
- Analogue input gain controls.
- MIDI interface as standard.
- User definable input/output setups.
- Two parametric and one shelf EQ on each output.
- Peak limiter on each output.
- 21μS minimum resolution.
- Easily controlled front panel delay and configuration settings with a clear 2x16 character LCD.
- 32 non-volatile memories.
- Built in auto-diagnostic service routines.
- Fail-safe bypass relays.



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