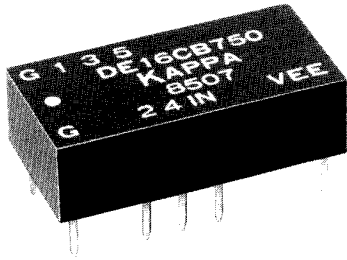


SERIES DE16CB (16-PIN) 5-TAP

ECL 10K DIGITAL DELAY LINE



RECOMMENDED OPERATING CONDITIONS

		MIN	TYP	MAX	UNIT
V_{EE}	Supply Voltage	-5.72	-5.20	-4.68	Vdc
V_{IH}	High-Level Input Voltage	-1.105		-0.810	Vdc
V_{IL}	Low-Level Input Voltage	-1.850		-1.475	Vdc
T_A	Operating Temperature (with 500 LFPM air flow)	-30	+25	+85	°C

DC ELECTRICAL CHARACTERISTICS⁽¹⁾

TEST CONDITIONS

I_E	Supply Current			75	mAdc
I_{IH}	High-Level Input Current	$V_{IH} = -0.810V$		425	μ Adc
I_{IL}	Low-Level Input Current	$V_{IL} = -1.850V$	0.5		μ Adc
V_{OH}	High-Level Output Voltage	$V_{IH} = -0.810V$	-1.060	-0.700	Vdc
V_{OL}	Low-Level Output Voltage	$V_{IL} = -1.850V$	-1.890	-1.615	Vdc
N	Fanout			85	ECL loads

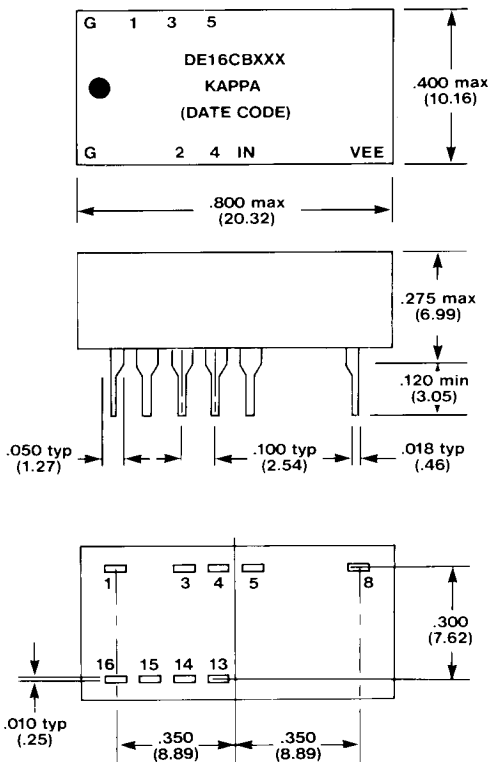
FEATURES

- ECL 10K interfaced
- Delays from 10 ns to 500 ns
- 5 equally spaced delay taps
- Standard 16-pin package
- Power dissipation: 200 mW_{typ} (no load)

INPUT PULSE TEST CONDITIONS

E_{IN}	Pulse Amplitude (See Notes)		0.98	V
T_{RI}	Pulse Risettime			ns
T_{FI}	Pulse Falltime			ns
T_W	Pulse Width, % of Total Delay	100		%
d	Duty Cycle			60 %

MARKINGS AND DIMENSIONS, in (mm)



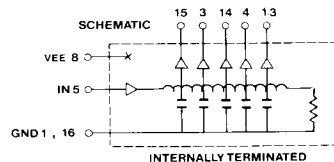
AC ELECTRICAL CHARACTERISTICS

PART NUMBER	Total Delay (ns) (2) (3) (5)	Tap Delay (ns) (2) (3) (5)	Max Output Risettime (ns) (4) (5)	Max Output Falltime (ns) (4) (5)
DE16CB100	10	2.0	4.0	4.0
DE16CB200	20	4.0	4.0	4.0
DE16CB250	25	5.0	4.0	4.0
DE16CB500	50	10.0	4.0	4.0
DE16CB750	75	15.0	5.0	5.0
DE16CB101	100	20.0	6.0	6.0
DE16CB151	150	30.0	7.0	7.0
DE16CB201	200	40.0	8.0	8.0
DE16CB251	250	50.0	10.0	10.0
DE16CB301	300	60.0	15.0	15.0
DE16CB401	400	80.0	15.0	15.0
DE16CB501	500	100.0	20.0	20.0

Notes:

1. All DC electricals are specified over the operating temperature range at $V_{EE} = -5.2V \pm 0.04V$
2. Delays measured at -1.3V level on leading edge only, $V_{IH} = -0.810V$, $V_{IL} = -1.790V$, $V_{EE} = -5.2V$, $V_{CC} = GND$, $T_A = +25^\circ C$.
3. Delay tolerance: $\pm 5\%$ or ± 1.0 ns, whichever is greater, referenced to input.
4. Risettime measured from 20% to 80%, and Falltime measured from 80% to 20%, $V_{EE} = -5.2V$, $V_{CC} = GND$, $T_A = +25^\circ C$.
5. Output terminals terminated with 100 Ω to -2.0 Volts.

Other delays also available upon request.



U.S.A. Factory Direct: 1443 Pinewood Street, Rahway, NJ 07065, Phone (908) 396-9400, Toll Free 800-223-0603