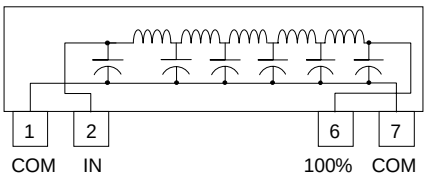
SL4 Series Single-In-Line Passive Single Output 50 Ω Impedance Delays

SL4 Schematic Diagram



OPERATING SPECIFICATIONS

Pulse Overshoot (Pos) ..... 5% to 10%, typical
Pulse Distortion (S) ..... 3% typical
Attenuation ..... 0.5 dB maximum
Working Voltage ..... 25 VDC maximum
Dielectric Strength ..... 100VDC minimum
Insulation Resistance ..... 1,000 Megohms min. @ 100VDC
Temperature Coefficient ..... 70 ppm/°C, typical
Band Width (f_C) ..... .35/tr approx.
Operating Temperature Range ..... -55° to +125°C
Storage Temperature Range ..... -65° to +150°C

TEST CONDITIONS

(Measurements made at 25°C)
Input Rise Time ..... 2.0 ns max.
Input Pulse Period ..... 500 ns
Input Pulse Width ..... 1000 ns

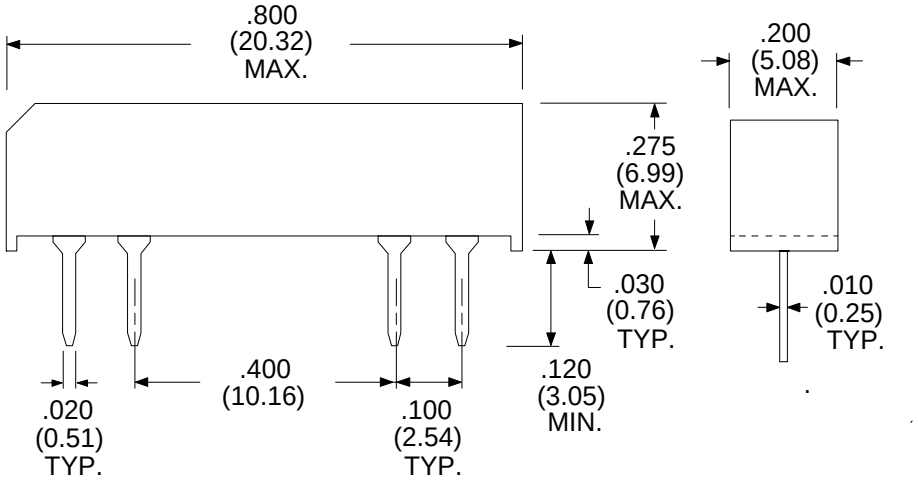
ENVIRONMENTAL

All units are designed to meet the applicable portions of MIL-D-23859, MIL-D-83531 and are capable of meeting the environmental requirements of MIL-STD-202 for moisture resistance, vibration shock, humidity and life.

Electrical Specifications at 25°C [1, 2, 3]

Delay (ns)	Rise Time 10% - 90% max. (ns)	DCR max. (Ohms)	7-Pin SIP Style Single 55 Ohm P/N
1.0 ± 0.2	1.0	0.3	SL 4 - 1 - 50
1.5 ± 0.3	1.0	0.3	SL 4 - 1P5 - 50
2.0 ± 0.5	1.0	0.3	SL 4 - 2 - 50
2.5 ± 0.6	1.0	0.4	SL 4 - 2P5 - 50
3.0 ± 0.6	1.0	0.4	SL 4 - 3 - 50
3.5 ± 0.7	1.0	0.5	SL 4 - 3P5 - 50
4.0 ± 0.8	1.0	0.5	SL 4 - 4 - 50
4.5 ± 0.8	1.0	0.6	SL 4 - 4P5 - 50
5.0 ± 1.0	1.0	0.7	SL 4 - 5 - 50
6.0 ± 1.0	1.5	0.8	SL 4 - 6 - 50
7.0 ± 1.0	1.6	0.8	SL 4 - 7 - 50
7.5 ± 1.0	1.7	0.9	SL 4 - 7P5 - 50
8.0 ± 1.0	1.8	0.9	SL 4 - 8 - 50
9.0 ± 1.0	1.9	0.9	SL 4 - 9 - 50
10 ± 1.0	2.0	1.0	SL 4 - 10 - 50
11 ± 1.0	2.2	1.1	SL 4 - 11 - 50
12 ± 1.0	2.4	1.2	SL 4 - 12 - 50
13 ± 1.0	2.8	1.3	SL 4 - 13 - 50
14 ± 1.0	3.0	1.5	SL 4 - 14 - 50
15 ± 1.0	3.0	1.6	SL 4 - 15 - 50
16 ± 1.0	3.3	1.6	SL 4 - 16 - 50
20 ± 1.0	4.0	1.7	SL 4 - 20 - 50
25 ± 1.3	5.0	1.7	SL 4 - 25 - 50
30 ± 1.5	9.0	1.7	SL 4 - 30 - 50
35 ± 1.8	10.5	1.8	SL 4 - 35 - 50
40 ± 2.0	12.5	1.8	SL 4 - 40 - 50
50 ± 2.5	15.0	1.8	SL 4 - 50 - 50

1. Delays measured at 50% Level on the Leading Edge
2. Impedance, Z_0, 50 Ohms ± 10 %
3. Output terminated to ground through $R_L = Z_0$



Physical Dimensions
inches (mm)

RHOMBUS P/N: **50 Ohm *SL4* Series**	
CUST P/N:	NAME:
DATE: 01/09/98	SHEET: 1 OF 1

Rhombus Industries Inc.
Transformers & Magnetic Products
www.rhombus-ind.com
15801 Chemical Lane,
Huntington Beach, CA 92649-1595
Phone: (714) 898-0960 • FAX: (714) 896-0971