

The LC 950 is a fast 16 channel ECL-to-NIM-to-ECL converter

DATA

ECL IN

34-pin flatcable connector,
differential ECL input

pins 1 + 2 = IN1
pins 3 + 4 = IN2

pins 31 + 32 = IN16
pins 33 + 34 = ground or not connected

right hand pins: high true signals, nom. -0.9V
left hand pins: low true signal, nom. -1.7V
input impedance 110 Ω differential

OUT NIM

Lemo connector, NIM output,
output impedance 50 Ω
"0" = 0V, "1" = -0.7V

INPUT NIM

Lemo connector, NIM input
input impedance 50 Ω
"0" = 0V, "1" = -0.7V

ECL OUT

34-pin flatcable connector,
differential ECL output

pins 1 + 2 = OUT1
pins 3 + 4 = OUT2

pins 31 + 32 = OUT16
pins 33 + 34 = ground or not connected

right hand pins: high true signals, nom. -0.9V
left hand pins: low true signal, nom. -1.7V
drives 110 Ω differential

Switching times

$t_r = t_f$ ca. 300 ps

Delay

ECL – NIM 2.2 ns, NIM – ECL 2.0ns

Skew

Output to Output (max) +/- 25 ps

Range of frequency

max. 1500MHz

Temperature range

0 – 50 °C

Dimension

6U-high, 4U-wide, VME unit

Power requirements

+ 5V 120mA, +12V 1100mA

Figure 1. Logic Diagram

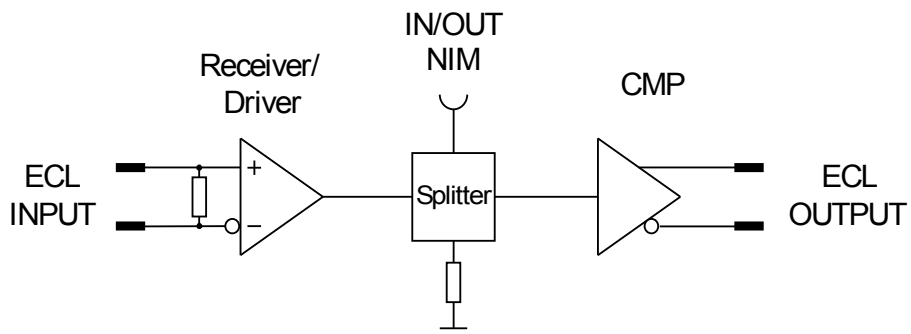


Figure 2. Configuration ECL IN / NIM OUT

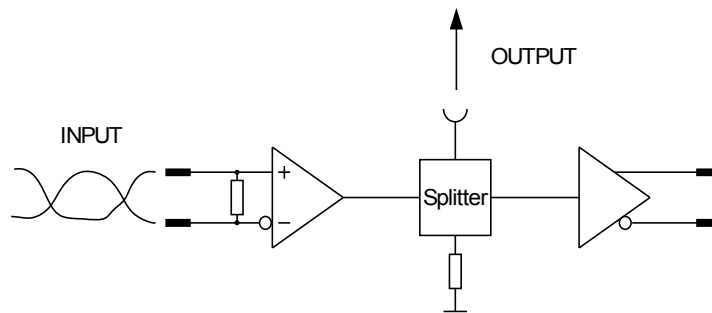


Figure 3. Configuration NIM IN / ECL OUT

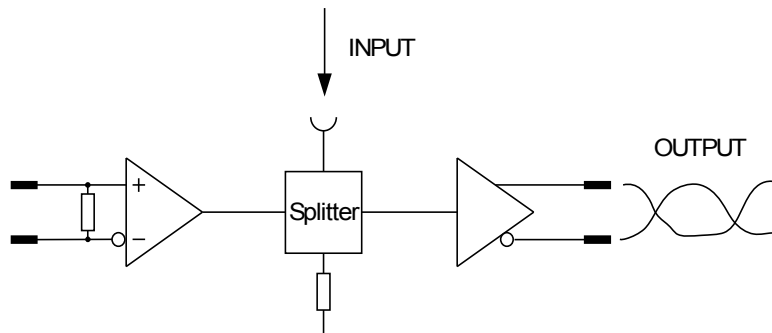
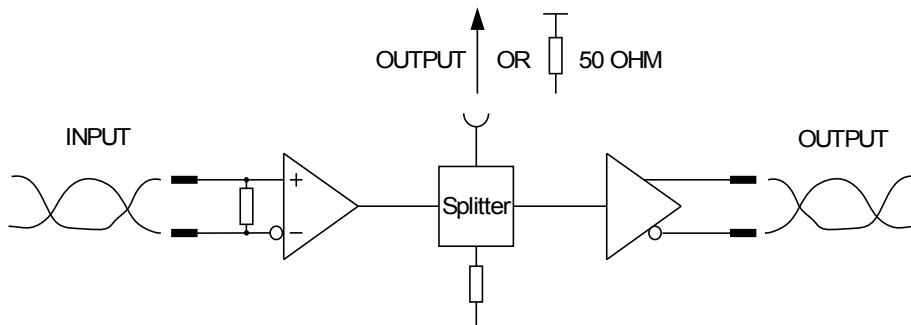


Figure 4. Configuration ECL IN / NIM OUT / ECL OUT



IMPORTANT ! "NIM OUTPUT" should be terminated with **50 Ohm**