



Current instruction being executed MEMO) MEM1 MEM2 MEM3 INST0 INST1 INST2 INST3 ₹ R12 RLED ₹ R14 RLED ₹ R16 RLED ₹ R18 RLED R7 R9 R10 ≥ R7 RLED ₹ R9 RLED ₹ R10 RLED ≶ RLED D7 INSN5 D5 INSN7 D14 INSN1 D6 D6 D8 D10 INSN3 D12 INSN2 D16 INSNO \uparrow \uparrow GND GND GND GND GND GND GND GND Special Instructions Control Lines Registers OEN IEN CAR RR +5٧ +5٧ +5٧ +5٧ CLK1 WRITE WR_DATA RD_DATA R15 RLED ₹ R11 RLED R13 ₹ R17 RLED R20 RLED R19 R21 R22 Rb RLED ≥ R3 RLED ₹ RLED R≥1 RLED ₹ R22 RLED RLED D9 D9 D11 NOPF D13 D15 RTN Do IEN D1 RR D2 CAR D4 OEN D17 RDAT D18 WDAT D19 WRT D20 CLK OP_NOPO \rightarrow OP_NOPF OP_IOC OP_RTN GND GND GND GND GND GND GND GND

Choose RLED values to match the properties of the LED's you are using.

$$RLED = (5 - VLED) / ILED$$

Examples:

 $\begin{array}{l} \mbox{VLED} = 1.7\mbox{V, ILED} = 15\mbox{mA, RLED} = 220\mbox{R} \\ \mbox{VLED} = 1.9\mbox{V, ILED} = 2\mbox{mA, RLED} = 1550\mbox{R} \mbox{ (1K8 should be fine)} \\ \mbox{VLED} = 1.9\mbox{V, ILED} = 10\mbox{mA, RLED} = 310\mbox{R} \mbox{ (330R should be fine)} \\ \end{array}$

Recommend 2mA LED's to reduce current draw on TTL outputs

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Title: l	UE1-T	TL CI	lock	and .	Front	Panel
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Size: A4	Date: 202	5		Rev: 2		
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