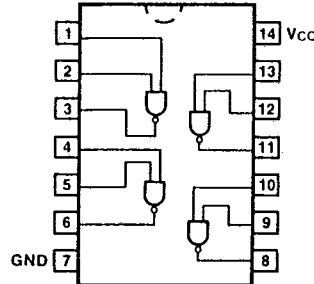


T-43-15

54/7438
54LS/74LS38

QUAD 2-INPUT NAND BUFFER
(With Open-Collector Output)

CONNECTION DIAGRAM
PINOUT A



ORDERING CODE: See Section 9

PKGS	PIN OUT	COMMERCIAL GRADE	MILITARY GRADE	PKG TYPE
		V _{CC} = +5.0 V ±5%, T _A = 0° C to +70° C	V _{CC} = +5.0 V ±10%, T _A = -55° C to +125° C	
Plastic DIP (P)	A	7438PC, 74LS38PC		9A
Ceramic DIP (D)	A	7438DC, 74LS38DC	5438DM, 54LS38DM	6A
Flatpak (F)	A	7438FC, 74LS38FC	5438FM, 54LS38FM	3I

INPUT LOADING/FAN-OUT: See Section 3 for U.L. definitions

PINS	54/74 (U.L.) HIGH/LOW	54/74LS (U.L.) HIGH/LOW
Inputs	1.0/1.0	0.5/0.25
Outputs	OC**/30	OC**/15 (7.5)

DC AND AC CHARACTERISTICS: See Section 3*

SYMBOL	PARAMETER	54/74		54/74LS		UNITS	CONDITIONS
		Min	Max	Min	Max		
V _{OL}	Output LOW Voltage	0.4				V	V _{IN} = 2.0 V, V _{CC} = Min, I _{OL} = 48 mA
I _{OH}	Output HIGH Current			250		μA	V _{OH} = 5.5 V, V _{CC} = Min, V _{IN} = V _{IL}
I _{CCH}	Power Supply Current	8.5		2.0		mA	V _{IN} = Gnd
I _{CCL}		54		12			V _{IN} = Open
t _{PLH}	Propagation Delay	22		22		ns	Figs. 3-2, 3-4
t _{PHL}		18		22			

*DC limits apply over operating temperature range; AC limits apply at T_A = +25° C and V_{CC} = +5.0 V.
**OC — Open Collector