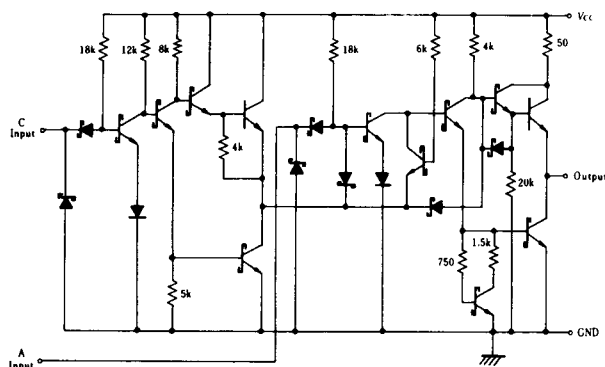
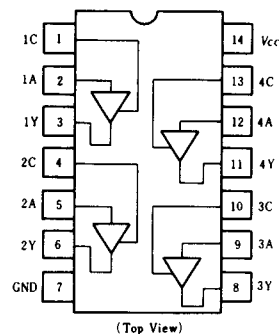


HD74LS126A • Quadruple Bus Buffer Gates (with three-state outputs)

■CIRCUIT SCHEMATIC (1/4)



■PIN ARRANGEMENT



■FUNCTION TABLE

Inputs		Outputs
C	A	Y
L	X	Z
H	H	H
H	L	L

Note) H; high level,
L; low level,
X; irrelevant
Z; off (high-impedance) state
of a 3-state output

■RECOMMENDED OPERATING CONDITIONS

Item	Symbol	min	typ	max	Unit
High level output current	I_{OH}	—	—	-2.6	mA
Low level output current	I_{OL}	—	—	24	mA

■ELECTRICAL CHARACTERISTICS ($T_a = -20 \sim +75^\circ\text{C}$)

Item	Symbol	Test Conditions	min	typ*	max	Unit
Input voltage	V_{IH}		2.0	—	—	V
	V_{IL}		—	—	0.8	
Output voltage	V_{OH}	$V_{CC} = 4.75\text{V}$, $V_{IH} = 2\text{V}$, $V_{IL} = 0.8\text{V}$, $I_{OH} = -2.6\text{mA}$	2.4	—	—	V
	V_{OL}	$V_{CC} = 4.75\text{V}$, $V_{IH} = 2\text{V}$, $I_{OL} = 24\text{mA}$	—	—	0.5	
		$V_{IL} = 0.8\text{V}$, $I_{OL} = 12\text{mA}$	—	—	0.4	
			—	—	—	
Off-state output current	I_{OZH}	$V_{CC} = 5.25\text{V}$, $V_{IH} = 2\text{V}$, $V_O = 2.4\text{V}$	—	—	20	μA
	I_{OZL}	$V_{IL} = 0.8\text{V}$, $V_O = 0.4\text{V}$	—	—	-20	
			—	—	—	
	I_{IH}	$V_{CC} = 5.25\text{V}$, $V_{IH} = 2.7\text{V}$	—	—	20	
Input current	I_{IL}	$V_{CC} = 5.25\text{V}$, $V_I = 0.4\text{V}$	—	—	-0.4	mA
		A input	—	—	-0.4	
	I_I	$V_{CC} = 5.25\text{V}$, $V_I = 7\text{V}$	—	—	0.1	mA
		C input	—	—	—	
Short-circuit output current	I_{OS}	$V_{CC} = 5.25\text{V}$	-40	—	-225	mA
Supply current	I_{CC}^{**}	$V_{CC} = 5.25\text{V}$	—	12	22	mA
Input clamp voltage	V_{IK}	$V_{CC} = 4.75\text{V}$, $I_{IN} = -18\text{mA}$	—	—	-1.5	V

* $V_{CC} = 5\text{V}$, $T_a = 25^\circ\text{C}$

** I_{CC} is measured with the A and C input grounded.

■ SWITCHING CHARACTERISTICS ($V_{CC}=5V$, $T_a=25^{\circ}C$)

Item	Symbol	Test Conditions	min	typ	max	Unit
Propagation delay time	t_{PLH}	$C_L=45pF$ $R_L=667\Omega$	—	9	15	ns
	t_{PHL}		—	8	18	
Output enable time	t_{ZH}		—	16	25	ns
	t_{ZL}		—	21	35	
Output disable time	t_{HZ}	$C_L=5pF$	—	—	25	ns
	t_{LZ}	$R_L=667\Omega$	—	—	25	

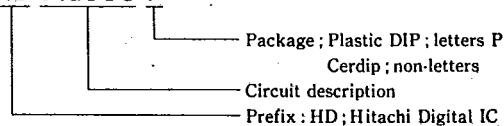
Note) Refer to Test Circuit and Waveform of the Common Item.

PACKAGING INFORMATION

T-90-20

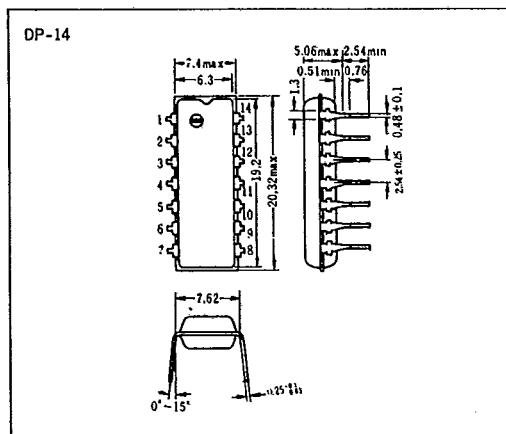
Factory orders for circuits described in this databook should include a three-part type number as explained in the following example.

HD 74LS00 P

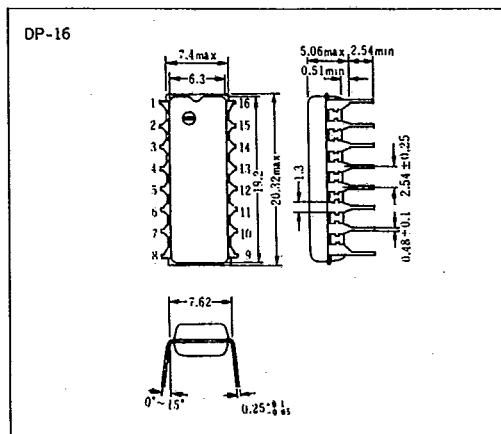


■ Plastic DIP

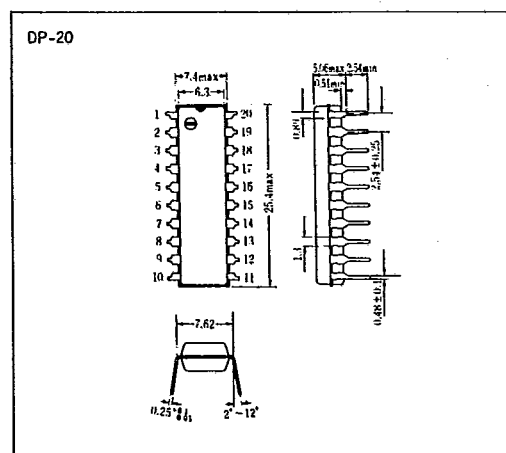
● 14 Pin



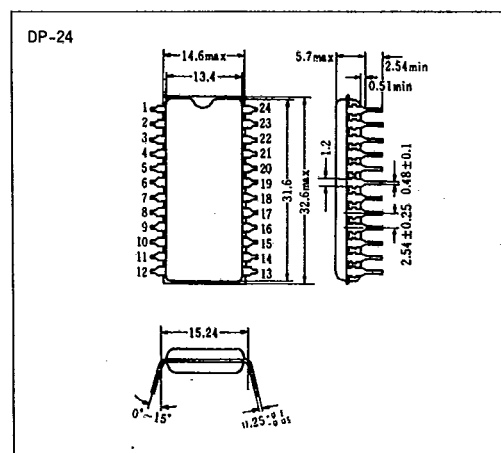
● 16 Pin



● 20 Pin



● 24 Pin



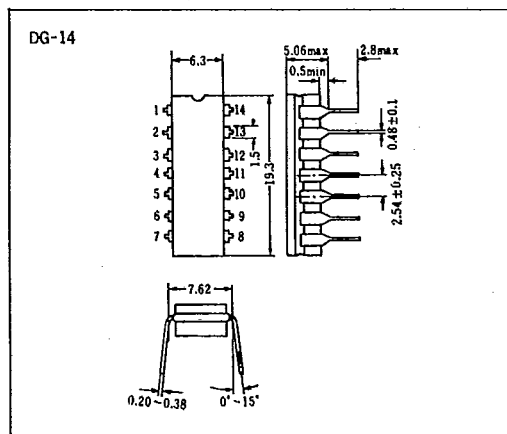
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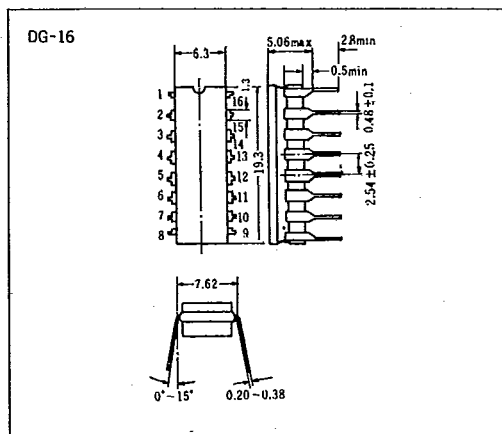
PACKAGING INFORMATION

■Cerdip

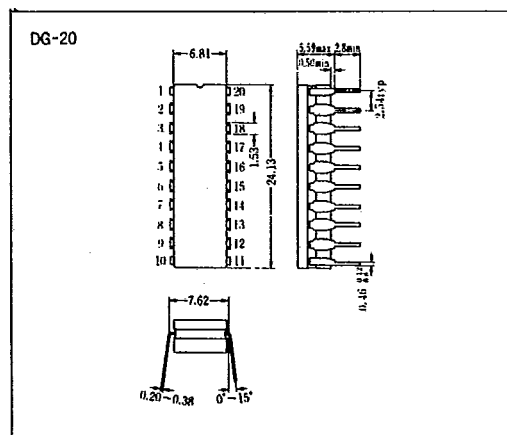
●14 Pin



●16 Pin



●20 Pin



●24 Pin

