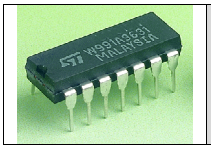


BCD to 7 Segment driver (4511B)

The 4511B converts a four bit binary number into seven output lines with sufficient output current to directly drive a seven segment display.

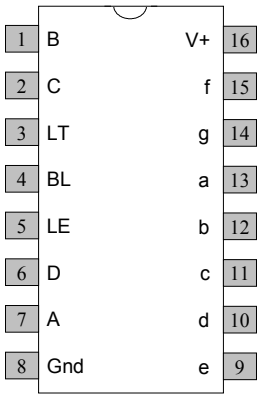
DC Characteristics

Min supply voltage = 3V

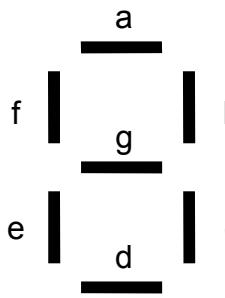
Max supply voltage = 15V

Max quiescent current consumption < 0.6 mA

Max output current (per pin) = 25 mA



Pin out - top view



The following table explains what the pins do:

Pin name	In / out	Description
A - D	Input	A to D are the binary input lines
a - f	Output	a to f are the output lines, to drive the seven segment display. See segment diagram (right)
LT	Input	Lamp Test (active low) Low = Turns all segments on, for test purposes High = normal operation
BI	Input	Blanking (active low) Low = turns all segment off High = displays the required number The Blanking pin can be used with a high speed variable width square wave to provide a dimming function
LE	Input	Latch Enable (active high) Low = normal operation High = previously displayed number is latched and held

Truth table

Inputs				Outputs							
D	C	B	A	a	b	c	d	e	f	g	Display
0	0	0	0	1	1	1	1	1	1	0	0
0	0	0	1	0	1	1	0	0	0	0	1
0	0	1	0	1	1	0	1	1	0	1	2
0	0	1	1	1	1	1	1	0	0	1	3
0	1	0	0	0	1	1	0	0	1	1	4
0	1	0	1	1	0	1	1	0	1	1	5
0	1	1	0	0	0	1	1	1	1	1	6
1	0	1	1	1	1	1	0	0	0	0	7
1	0	0	0	1	1	1	1	1	1	1	8
1	0	0	1	1	1	1	0	0	1	1	9