



Monolithic Linear IC

## COLOR TV VERTICAL DEFLECTION OUTPUT CIRCUIT

The LA7830 is a monolithic linear IC designed for small-aperture color TV vertical deflection output and has such features as greatly reduced number of external parts and low power dissipation. The LA7830 can be used in conjunction with the LA7620 series for video **chroma** deflection use and the LA7800 series for deflection use and the LA7850 series for display use to form a stable and compact vertical output deflection circuit.

**Features**

- . High output
- . On-chip pump-up circuit and low power dissipation
- . Minimum number of external parts required

**Maximum Ratings** at  $T_a=25^\circ\text{C}$ 

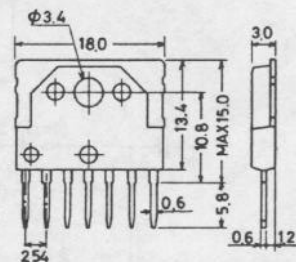
		unit
Maximum Supply Voltage	$V_6$ max	30 V
	$V_3$ max	60 V
Deflection Output Current	$I_2$ max	$\pm 1.3$ Ap-0
Allowable Power Dissipation	$P_d$ max	4.5 W
Operating Temperature	Topg	-20 to +75 $^\circ\text{C}$
Storage Temperature	Tstg	-40 to +125 $^\circ\text{C}$

**Operating Conditions** at  $T_a=25^\circ\text{C}$ 

		unit
Recommended Supply Voltage	$V_6$	24 V
Operating Voltage Range	$V_6$	18 to 27 V
Deflection Output Current	$I_2$ p-p	up to 1.5 Ap-p

**Operating Characteristics** at  $T_a=25^\circ\text{C}, V_{CC}=24.0\text{V}$ 

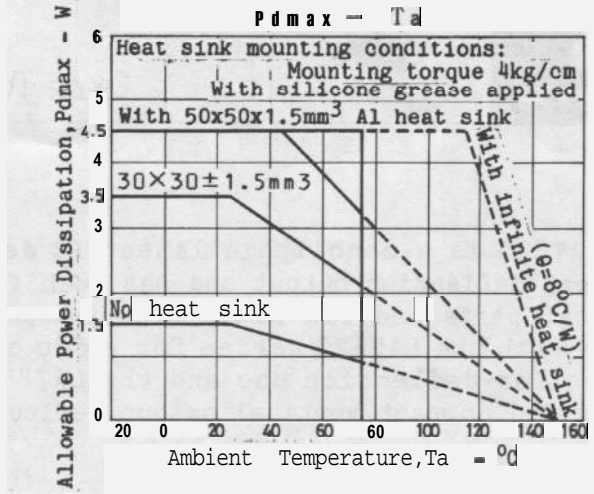
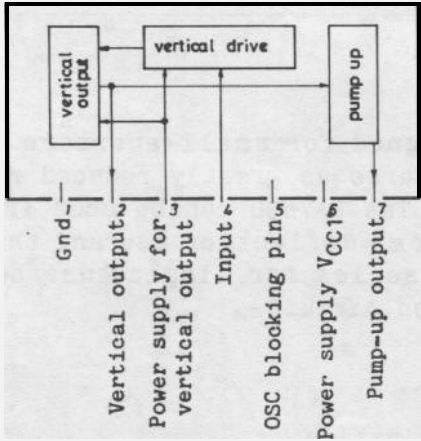
	min	typ	max	unit
Output Transistor Saturation Voltage (1)		0.5	1.0	V
Output Transistor Saturation Voltage (2)		1.8	2.6	V
Pin 7 Saturation Voltage (1)			1.5	V
Pin 7 Saturation Voltage (2)		0.8	1.6	V
Quiescent Current	8.0	11.5	24.0	mA
Middle-Point Voltage		11		V

**Case Outline** 3050-S7IC  
(unit:mm)

Information furnished by SANYO is believed to be accurate and reliable. However, no responsibility is assumed by SANYO for its use; nor for any infringements of patents or other rights of third parties which may result from its use, and no license is granted by implication or otherwise under any patent or patent rights of SANYO.

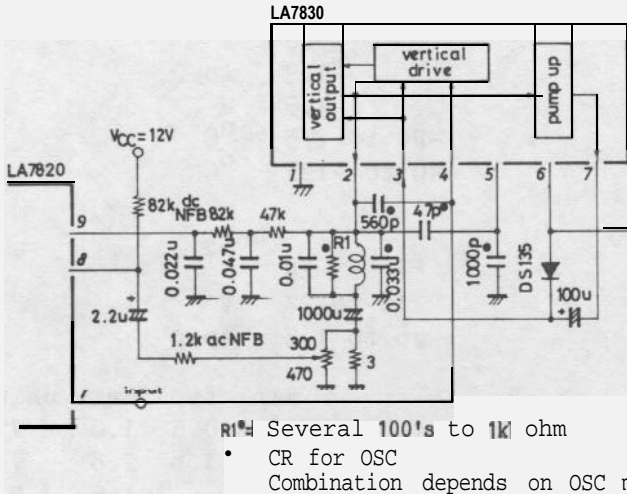
These specifications are subject to change without notice.

Equivalent Circuit Block Diagram and Pin Assignment

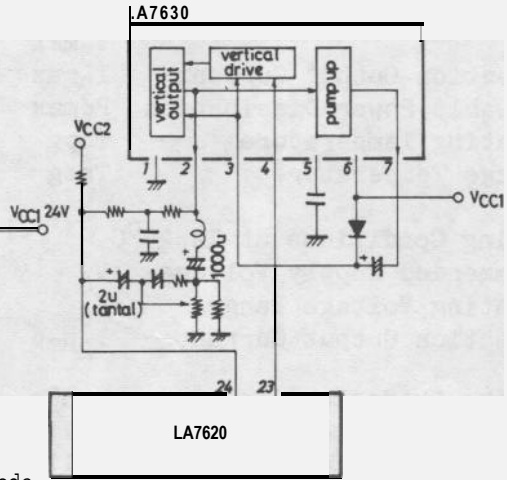


Sample Application Circuit 1  
 Vertical output of LA7820

Sample Application Circuit 2  
 Vertical output of LA7620



R1<sup>1</sup> Several 100's to 1k ohm  
 • CR for OSC  
 Combination depends on OSC mode.



Sample Application Circuit 3  
 Vertical output of LA7850

