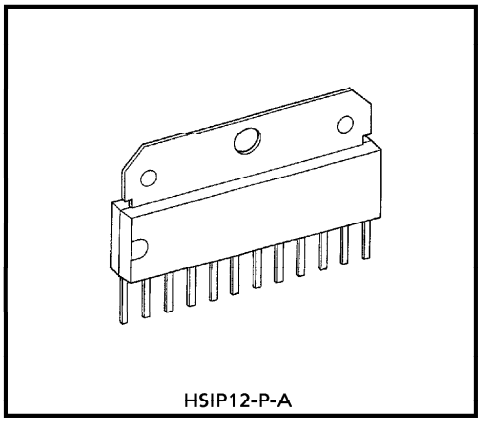
TOSHIBA BIPOLAR LINEAR INTEGRATED CIRCUIT SILICON MONOLITHIC

TA8432K

POWER AMPLIFIER FOR DRIVING A DEFLECTION CIRCUIT OF A COLOR TELEVISION

The TA8432K is a Vertical-Delection-Output circuit IC for middle and large aperture color televisions.
The TA8432K combines the vertical output circuit and the Ramp-generator in a 12 leads single-in-line type plastic package.
The TA8432K requires only vertical deflection negative pulses for vertical operation.

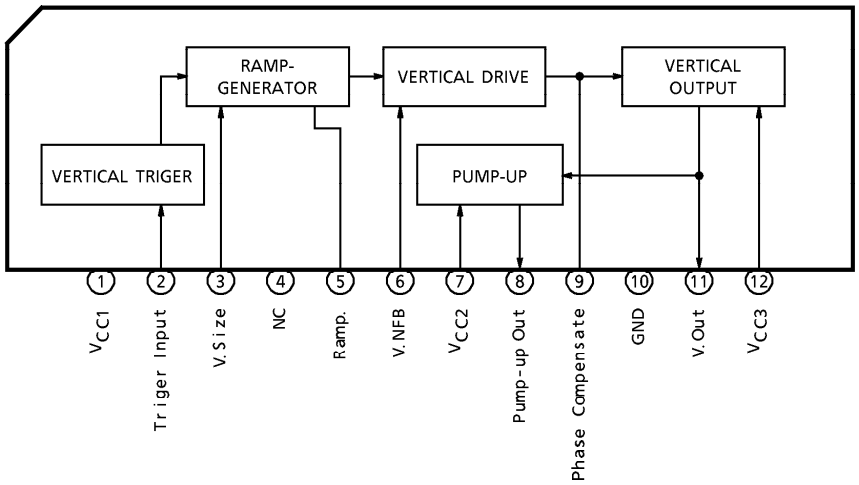


Weight : 3.2g (Typ.)

FEATURES

- Large output current : $2.2A_{p-p}$ (MAX.)
- Built-in Ramp-generator
- Built-in V.Driver circuit
- Small power dissipation Pump-Up circuit
- Vertical Output circuit
- Minimum number of external components'

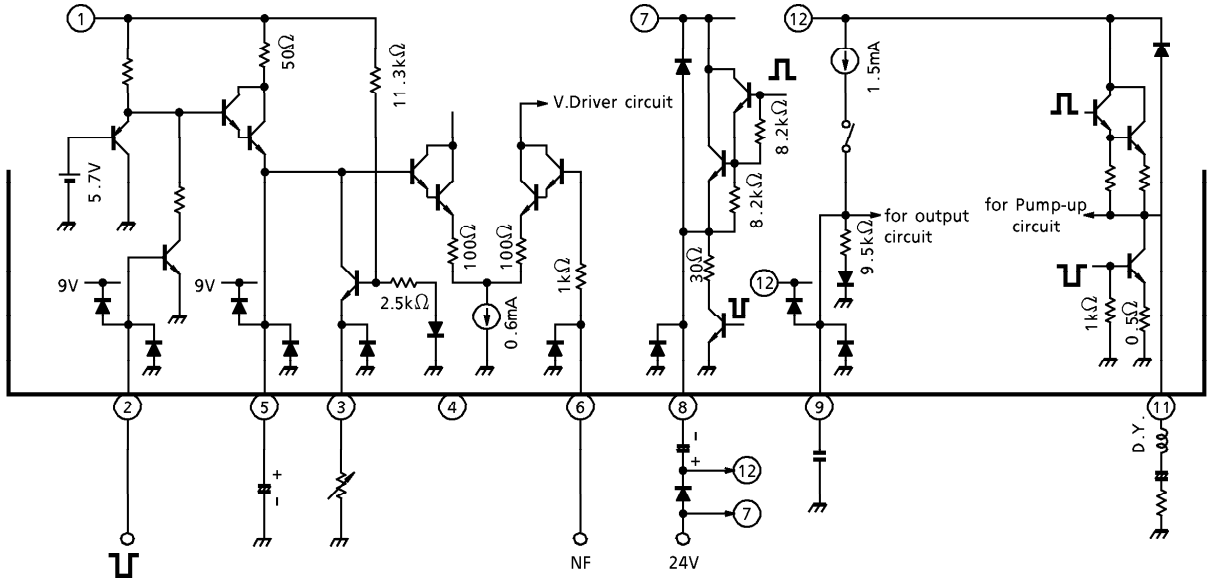
BLOCK DIAGRAM



961001EBA2

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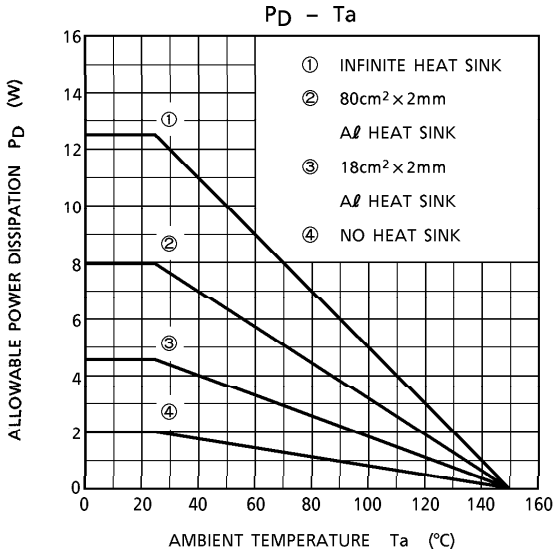
TERMINAL INTERFACE



MAXIMUM RATINGS (Ta = 25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
V.Driver Power Supply	V_{CC}	15	V
Pump-up Power Supply Voltage	V_{CC}	30	V
Vertical Output Supply Voltage	V_{CC}	60	V
Power Dissipation	$P_{D\ max}$	12.5 (Note)	W
Operating Temperature	T_{opr}	−20~85	°C
Storage Temperature	T_{stg}	−55~150	°C

(Note) Operate at Ta = 25°C with an infinite heat-sink. With other heat-sink is shown below.



RECOMMENDED OPERATING CONDITIONS (Ta = 25°C)

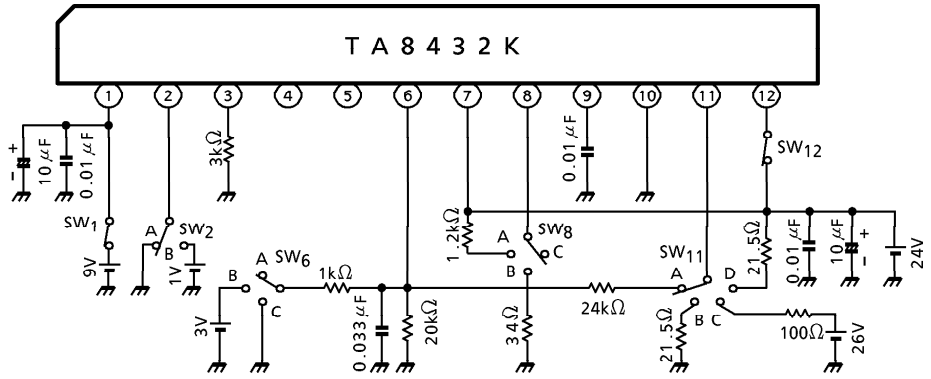
CHARACTERISTIC	SYMBOL	MIN.	TYP.	MAX.	UNIT
V.Driver Supply Voltage	V_{CC1}	8.1	9.0	9.9	V
Pump-up Supply Voltage	V_{CC2}	—	24	29	V
Deflection Output Current	I_{11p-p}	—	—	2.2	A_{p-p}

ELECTRICAL CHARACTERISTICS (Ta = 25°C, V_{CC1} = 9V, V_{CC2} = 24V)

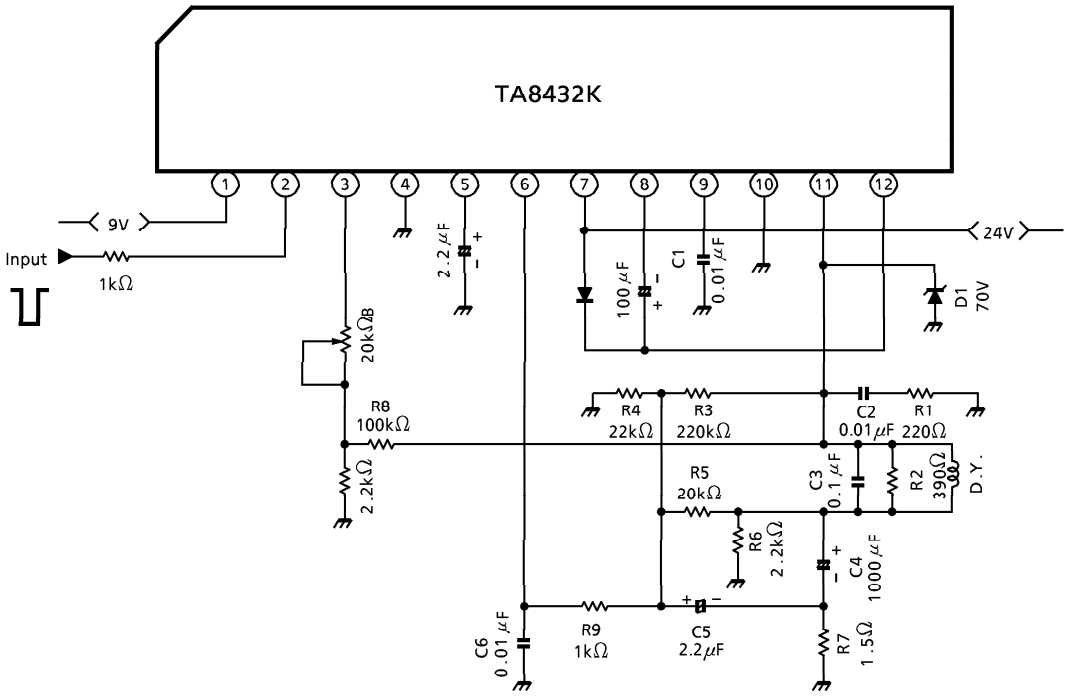
CHARACTERISTIC	SYMBOL	TEST CIR-CUIT	NOTE	MIN.	TYP.	MAX.	UNIT
V.Driver Supply Current	I_{CC1}	—	1	2	5.0	12	mA
Vertical Triger Threshold	V_2	—	2	—	—	1.0	V
Pin 3 DC Voltage	V_3	—	3	1.0	1.5	2.0	V
Ramp-signal Maximum Voltage	V_5	—	4	3.5	4.8	6.0	V
Ramp-signal Maximum Amplitude	V_{5p-p}	—	4	3.5	4.5	5.5	V_{p-p}
Output Tr. Satulation Voltage 1	V_{S11-10}	—	5	0.2	0.5	1.0	V
Output Tr. Satulation Voltage 2	V_{S12-11}	—	6	1.0	1.8	3.6	V
Pump-up Tr. Satulation Voltage 1	V_{S7-8}	—	7	1.0	2.0	5.0	V
Pump-up Tr. Satulation Voltage 2	V_{S8-10}	—	8	0.2	0.8	1.6	V
Idling Current	I_b	—	9	—	26	—	mA
Vertical Output Center Voltage	V_{CENTER}	—	10	8.0	12.0	14.0	V

NOTE	SW						TEST TERMINAL
	1	2	6	8	11	12	
1	ON	A	A	C	A	ON	1
2	ON	B	A	C	A	ON	5
3	ON	A	A	C	A	ON	3
4	ON	A	A	C	A	ON	5
5	ON	B	B	C	D	ON	11
6	OFF	A	C	C	B	ON	12 – 11
7	OFF	A	A	B	C	OFF	7 – 8
8	OFF	A	A	A	A	OFF	8
9	ON	A	A	C	A	ON	12
10	ON	A	A	C	A	ON	11

TEST CIRCUIT



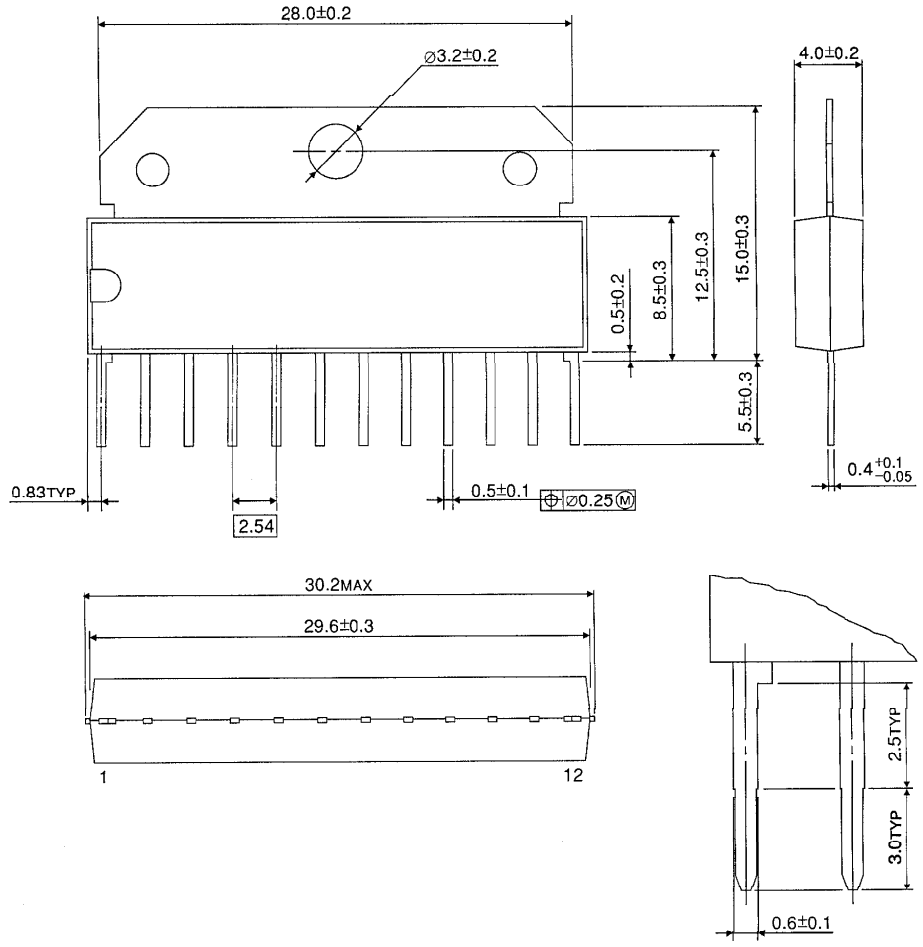
APPLICATION CIRCUIT



OUTLINE DRAWING

HSIP12-P-A

Unit : mm



Weight : 3.2g (Typ.)