STK350-050



2-Channel AF Voltage Amplifier (120 to 150W/channel supported)

Overview

The STK350-050 is a voltage amplifier for use in audio power output stages. It comprises a 2-channel amplifier integrated in a small package, making possible audio set miniaturization and design simplification.

Features

- Split power supply for wide bandwidth (f=20Hz to 20kHz).
- Member of a family of devices with power capacities from 40W to 150W.
- Compact package.
- High withstand voltage.

Series Configuration

The STK350-050 is a member of a family of devices with differing output capacities.

Type No.	V _{CC} max [V]	V _{CC} [V]	THD [%]	Tc max [°C]	Power [W] (R _L =8Ω)
STK350-000	±55	±36	0.005	115	40 to 60
STK350-010	±59	±41	0.005	115	60 to 80
STK350-020	±65	±47	0.005	115	80 to 90
STK350-030	±75	±50	0.005	115	90 to 100
STK350-040	±80	±55	0.005	115	100 to 120
STK350-050	±90	±60	0.005	115	120 to 150

Package Dimensions

unit:mm



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SANYO Electric Co., Ltd. Semiconductor Company TOKYO OFFICE Tokyo Bldg., 1-10, 1 Chome, Ueno, Taito-ku, TOKYO, 110-8534 JAPAN

Specifications

Maximum Ratings at $Ta = 25^{\circ}C$

Parameter	Symbol	Conditions	Ratings	Unit
Maximum supply voltage	V _{CC} max		±90	V
Operating substrate temperature	Tc		115	°C
Storage temperature	Tstg		-30 to +115	°C

Operating Characteristics at Ta = 25°C, VG=40dB, specified test circuit

Parameter	Symbol	Conditions	Ratings			Unit
Falametei			min	typ	max	Unit
Current drain	ICC	V _{CC} =±72V		20	30	mA
Neutral voltage	VN	V _{CC} =±72V	-70		+70	mV
Output noise voltage	VNO	$V_{CC}=\pm72V$, Rg=10k Ω			1.0	mVrms
Input impedance	rj	V _{CC} =±72V, f=1kHz, V _O =2.83V		100		kΩ
Total harmonic distortion	THD	$V_{CC}=\pm 60V$, f=20kHz, $V_{O}=34.6V$			0.005	%

Note. All tests are made using a constant-voltage supply.

Equivalent Circuit



Test Circuit



Sample Application Circuit-60W/8Ω Amplifier (V_{CC}=±41V)



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