

Case outline 4002
STK-011,
 4002 4002 4002A
015, 016

thick film hybrid IC

6.5 to 15Wmin
 AF POWER AMP.

These are to be discontinued in the future

Features

- ©IMST, 1 Channel by 1 Power Supply.
- AF output power of STK-011 : 6.5W min.
- AF output power of STK-015: 10W min.
- AF output power of STK-016 : 15W min.

MAXIMUM RATINGS / Ta=25 C

		STK-011	STK-015	STK-016	unit
Maximum Supply Voltage	V_{CC} max (pin 3 to 1)	38	48	54	V
Operating Case Temperatur	T_C	→	90	85	°C
Storage Temperature	T_{stg}	→	-30 to +100	←	°C
Allowable Load Shorting Time	t_s recommended operation condition, rated output power, f=50Hz	→	2	←	sec

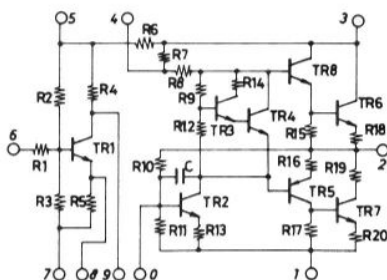
RECOMMENDED OPERATION CONDITION / Ta=25°C

		STK-011	STK-015	STK-016	unit
Recommended Supply Voltage	V_{CC}	25	32	38	V
Load Resistance	R_L	8	8	8	ohm

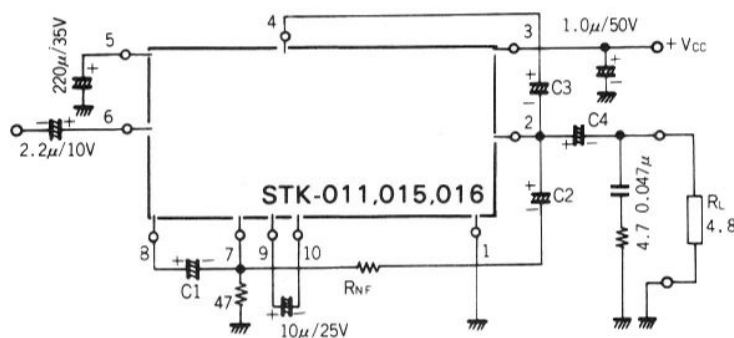
OPERATION CHARACTERISTICS / Ta=25 C, in recommended condition, Rg=600ohm, f=1kHz

		STK-011	STK-015	STK-016	unit
Quiescent Current	I	→	50	←	mAmax
Output Power	Po THD=2.0%	6.5	-	-	Wmin
	THD=1.0%	-	10	15	Wmin
Voltage Gain	VG Po=0.1W	35	33	33	dB
Distortion	THD Po=0.1W	1.0	0.5	0.3	%max
Input Resistance	r_i Po=0.1W	→	40k	←	ohm
Output Resistance	r_o Po=0.1W	→	0.2	←	ohm
Power Bandwidth	PBW THD=2%, -3Db	30 to 30K	-	-	Hz
	THD=1%, -3dB	-	30 to 30k	←	Hz

EQUIVALENT CIRCUIT



APPLICATION: AF Power Amp



	STK-011	STK-015	STK-016
C1	47u/6.3V	47u/6.3V	47u/25V
C2	22u/25V	22u/35V	22u/35V
C3	22u/25V	47u/25V	47u/25V
C4	1000u/25V	1000u/35V	2200u/35V
R _{NF}	3k	2.2k	2.2k

See the operation characteristics on this specification