



INTEGRATED CIRCUIT

TECHNICAL DATA

TA7347P

TOSHIBA BIPOLAR LINEAR INTEGRATED CIRCUIT

SILICON MONOLITHIC

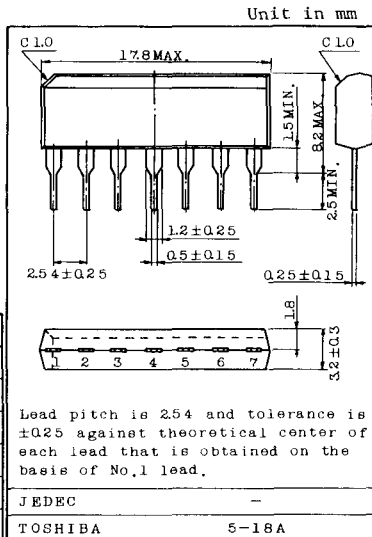
2-INPUT SWITCH

- Suitable for Audio and Video Signal
- Low Current Operation (Typ. 4.8mA)

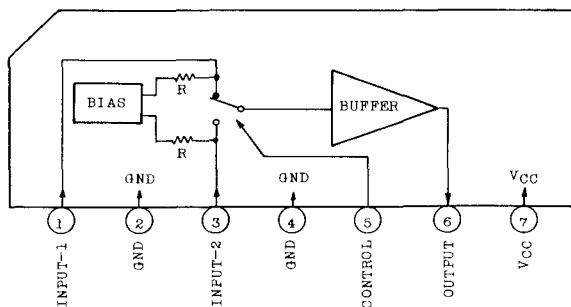
MAXIMUM RATINGS (Ta=25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
Supply Voltage	V _{CC}	14	V
Signal Level at Input Pin	e _{in}	5	V _{p-p}
Input Voltage at Control Pin	V _{IN}	-0.3-V _{CC} +0.3	V
Power Dissipation (Note)	P _D	400	mW
Operating Temperature	T _{opr}	-10 ~ 80	°C
Storage Temperature	T _{stg}	-50 ~ 125	°C

Note : Derated above Ta=25°C in the proportion of 4mW/°C.



BLOCK DIAGRAM





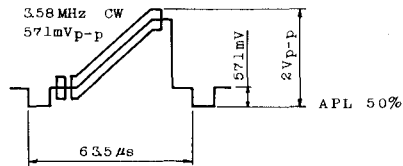
ELECTRICAL CHARACTERISTICS ($V_{CC}=9V$, $T_a=25^{\circ}C$)

CHARACTERISTIC	SYMBOL	TEST CIR-CUIT	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Supply Voltage	V_{CC}	-	-	8.0	9.0	10.0	V
Total Current	I_{CC}	-	$S_1=S_2=S_3=2$	3.8	4.8	6.2	mA
Frequency Response	G_{F1}	-	$v_i=2.5V_{p-p}$ $v_o(20Hz)/v_o(100kHz)$	-	-	± 0.5	dB
	G_{F2}	-	$v_i=2.0V_{p-p}$ $v_o(5MHz)/v_o(100kHz)$				
Insertion Loss	G_L	-	$v_i=2.5V_{p-p}$, 100kHz v_o/v_i	-0.5	-0.3	-	dB
Distortion	THD	-	$v_i=2.5V_{p-p}$, 1kHz	-	0.2	0.5	%
Differential Gain	DG	-	v_i =Input Waveform 1	-	0.5	-	%
Differential Phase	DP	-	v_i =Input Waveform 1	-	0.5	-	deg
Output Off Set Voltage	V_{OFF}	-	$S_1=S_2=2$ The difference of output DC voltage during a) $S_3=1$ and b) $S_2=2$	-	0	± 15	mV
Cross Talk	v_{CR}	-	$v_i=2.0V_{p-p}$, 4.43MHz v_o/v_i Measure in following two Modes a) $S_1=S_3=1$, $S_2=1$ b) $S_1=S_3=2$, $S_2=2$	-	-70	-60	dB
SW Control Voltage	V_{CON}	-	$S_1=2$, $S_2=S_3=1$ The voltage of V_C when output turn to off	1.7	2.2	2.7	V
Input Impedance	R_i	-	-	-	15	-	k Ω
Output Impedance	R_o	-	-	-	10	-	Ω

Note : If not specified the setting of switches, measure in the following two modes.

a) $S_1=1$, $S_2=S_3=2$ b) $S_1=2$, $S_2=S_3=1$

INPUT WAVEFORM 1



TEST CIRCUIT

