SILICON PNP EPITAXIAL TYPE (PCT PROCESS)

2N4126

FOR GENERAL PURPOSE USE SWITCHING AND AMPLIFIER APPLICATIONS.

FEATURES:

. Low Leakage Current

: I_{CBO}=-50nA(Max.) @ V_{CB}=-20V

I_{EBO}=-50nA(Max.) @ V_{EB}=-3V

. Low Saturation Voltage

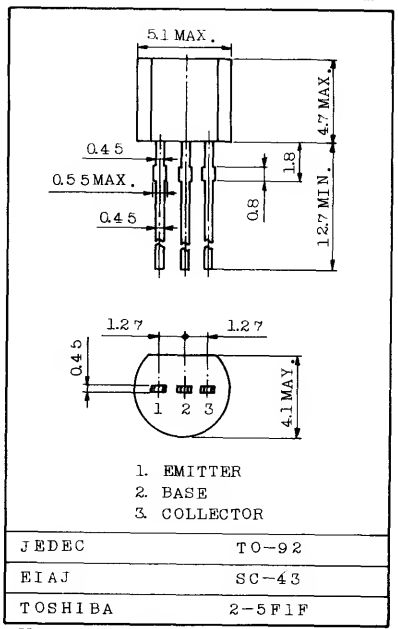
: $V_{CE(sat)}$=-0.4V(Max.) @ I_C=-50mA, I_B=-5mA

. Low Collector Output Capacitance

: C_{ob}=4.5pF(Max.) @ V_{CB}=-5V

. Complementary to 2N4124

Unit in mm



JEDEC	TO-92
EIAJ	SC-43
TOSHIBA	2-5F1F

Weight : 0.21g

MAXIMUM RATINGS (Ta=25°C)

	CHARACTERISTIC	SYMBOL	RATING	UNIT
※	Collector-Base Voltage	V_{CBO}	-25	V
※	Collector-Emitter Voltage	V_{CEO}	-25	V
※	Emitter-Base Voltage	V_{EBO}	-4	V
※	Collector Current	I_C	-200	mA
	Base Current	I_B	-50	mA
※	Collector Power Dissipation (Ta=25°C) Derate Linearly 25°C	P_C	350	mW
			2.8	mW/°C
※	Collector Power Dissipation (Tc=25°C) Derate Linearly 25°C	P_C	1.0	W
			8	mW/°C
※	Thermal Resistance (Junction to Ambient)	$R_{th(j-a)}$	357	°C/W
※	Thermal Resistance (Junction to Case)	$R_{th(j-c)}$	125	°C/W
※	Junction Temperature	T_j	150	°C
※	Storage Temperature Range	T_{stg}	-55 ~150	°C

※In accordance with JEDEC registration data.

ELECTRICAL CHARACTERISTICS (Ta=25°C)

	CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
※	Collector Cut-off Current	I_{CBO}	V_{CB}=-20V, I_E=0	-	-	-50	nA
※	Emitter Cut-off Current	I_{EBO}	V_{EB}=-3V, I_C=0	-	-	-50	nA
※	Collector-Base Breakdown Voltage	$V_{(BR)CBO}$	I_C=-10μA, I_E=0	-25	-	-	V
※	Collector-Emitter Breakdown Voltage	$V_{(BR)CEO}$	I_C=-1mA, I_B=0	-25	-	-	V
※	Emitter-Base Breakdown Voltage	$V_{(BR)EBO}$	I_E=-10μA, I_C=0	-4	-	-	V
※	DC Current Gain	$h_{FE(1)}$	V_{CE}=-1V, I_C=-2mA	120	-	360	
		$h_{FE(2)}$	V_{CE}=-1V, I_C=-50mA	60	-	-	
※	Collector-Emitter Saturation Voltage	$V_{CE(sat)}$	I_C=-50mA, I_B=-5mA	-	-	-0.4	V
※	Base-Emitter Saturation Voltage	$V_{BE(sat)}$	I_C=-50mA, I_B=-5mA	-	-	-0.95	V
※	Small Signal Forward Current Transfer Ratio	h_{fe}	V_{CE}=-20V, I_C=-10mA, f=100MHz	2.5	-	-	
※	Transition Frequency	f_T	V_{CE}=-20V, I_C=-10mA, f=100MHz	250	-	-	MHz
※	Collector Output Capacitance	C_{ob}	V_{CB}=-5V, I_E=0, f=1MHz	-	-	4.5	pF
※	Input Capacitance	C_{ib}	V_{EB}=-0.5V, I_C=0, f=1MHz	-	-	10	pF
※	Small Signal Current Gain	h_{fe}	V_{CE}=-10V, I_C=-2mA, f=1kHz	120	-	480	
※	Noise Figure	NF	V_{CE}=-5V, I_C=-100μA R_g=1kΩ, f=10Hz～15.7kHz	-	-	4	dB

※ In accordance with JEDEC registration data.