Elektronische Bauelemente

2SA1611

-0.1A , -60V

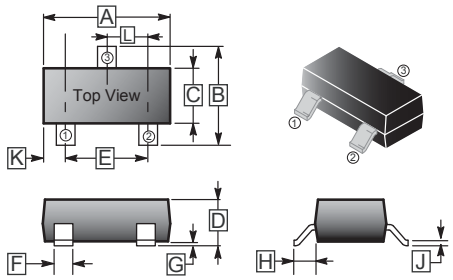
PNP Silicon Plastic Encapsulated Transistor

RoHS Compliant Product
A suffix of "-C" specifies halogen & lead-free

FEATURES

- High DC Current Gain
- High Voltage
- Complementary to 2SC4177

SOT-323



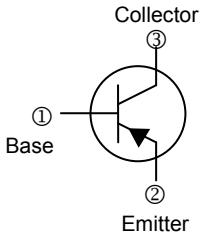
REF.	Millimeter		REF.	Millimeter	
	Min.	Max.		Min.	Max.
A	1.80	2.20	G	0.100 REF.	
B	1.80	2.45	H	0.525 REF.	
C	1.15	1.35	J	0.08	0.25
D	0.80	1.10	K	-	-
E	1.20	1.40	L	0.650 TYP.	
F	0.20	0.40			

CLASSIFICATION OF h_{FE}

Product-Rank	2SA1611-M4	2SA1611-M5
Range	90~180	135~270
Marking	M4	M5
Product-Rank	2SA1611-M6	2SA1611-M7
Range	200~400	300~600
Marking	M6	M7

PACKAGE INFORMATION

Package	MPQ	LeaderSize
SOT-323	3K	7' inch



ABSOLUTE MAXIMUM RATINGS (T_A = 25°C unless otherwise noted)

Parameter	Symbol	Ratings	Unit
Collector to Base Voltage	V_{CBO}	-60	V
Collector to Emitter Voltage	V_{CEO}	-50	V
Emitter to Base Voltage	V_{EBO}	-5	V
Collector Current - Continuous	I_C	-100	mA
Collector Power Dissipation	P_C	150	mW
Thermal Resistance Junction to Ambient	$R_{\theta JA}$	833	°C / W
Junction and Storage Temperature	T_J, T_{STG}	150, -55~150	°C

ELECTRICAL CHARACTERISTICS (T_A = 25°C unless otherwise noted)

Parameter	Symbol	Min.	Typ.	Max.	Unit	Test Conditions
Collector to Base Breakdown Voltage	$V_{(BR)CBO}$	-60	-	-	V	I_C= -100μA, I_E=0
Collector to Emitter Breakdown Voltage	$V_{(BR)CEO}$	-50	-	-	V	I_C= -1mA, I_B=0
Emitter to Base Breakdown Voltage	$V_{(BR)EBO}$	-5	-	-	V	I_E= -100μA, I_C=0
Collector Cut-off Current	I_{CBO}	-	-	-100	nA	V_{CB}= -60V, I_E=0
Emitter Cut-off Current	I_{EBO}	-	-	-100	nA	V_{EB}= -5V, I_C=0
DC Current Gain	h_{FE}	90	-	600		V_{CE}= -6V, I_C= -1mA
Collector to Emitter Saturation Voltage	$V_{CE(sat)}$	-	-	-0.3	V	I_C= -100mA, I_B= -10mA
Collector to Emitter Voltage	V_{BE}	-0.58	-	-0.68	V	V_{CE}= -6V, I_C= -1mA
Transition Frequency	f_T	-	180	-	MHz	V_{CE}= -6V, I_C= -10mA
Collector Output Capacitance	C_{ob}	-	4.5	-	pF	V_{CB}= -10V, I_E=0, f=1MHz

*Pulse test : pulse width ≦ 350μs, duty cycle ≦ 2.0%.