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Silicon

Complementary

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D5K2

Unijunction Transistor

absolute maximum ratings	:(25° C fr	ee air)	DIMENSIONS WITHIN JEDEC OUTLINE TO-IS EXCEPT FOR LEAD CONFIGURATION 1.78 MIN
Voltage	D5K2		NOTES 1. MAX DIAMETER LEADS AT A GASING PLANE DOS + 0001 - 000 SELOW BASE SEAT TO SE 210 MAX
Interbase Voltage	20	V	WITHIN GOT OF FIRST TRUE LOCATION RELATIVE TO MAX WHOTH TAR AND TO THE MAX. 230 DIAMETER MEASURED WITH A SUFFILL OF WHICH MAKE IS NOT USED MAX MAX
Current			2. LEAD CHARTER IS CONTROLLED IN THE ZONE BETWEEN 500 AND 230 FROM THE BASE 54AT. SETWEEN 500 AND END OF LEAD
Average Emitter (Forward)	150	mA	A MAX OF OZI 18 MELD. 3. CALCULATED 9 MEASURING FLANGE DIAMETER MCLUDING TAR AND EXCLUDING TAR, AND SUPPRACTION THE SMALLER MIN
Peak Emitter (Forward) (Note 1)	2	A	4. THE CASE IS ELECTRICALLY CONNECTED TO THE SUBSTRATE AND MUST BE ISOLATED (MOTE 1) 3 LEADS
Peak Reverse Emitter	15	mA	APPROX WEIGHT DIS OZ
Power			LEAD 2
Average Total	200	mW	
Temperature			LEAD
Operating	-55 to $+100$	$^{\circ}\mathrm{C}$	EMITTER E BASE ONE B
Storage	-55 to $+150$	$^{\circ}\mathrm{C}$	BASE ONE B, 2048 MAX 036 MIN O36 MIN (MOTE 3)

electrical characteristics: (25° C free air)

Intrinsic Standoff Ratio		Min. 0.58	Тур. 0.60	Max. 0.62	
Peak Point Voltage	η	0.00	0.60	0.62	
$(V_{BB} = 5V)$	V_P	3.2	3.45	3.7	Volts
$(V_{BB} = 10V)$	$V_{\mathbf{P}}$	6.1	6.45	6.8	Volts
Interbase Resistance	* 1	0.1	0.40	0.0	¥ 0113
$(I_{BB} = 0.1 \text{mA})$	$R_{ m \scriptscriptstyle BBO}$	5	8	15	kohms
Emitter Breakdown Voltage	11110			10	
$(I_{EB1} = 10\mu A)$	V_{EB1O}	8.0	9.5		Volts
Peak Point Current					, 0.00
$(V_{BB} = 10V)$	I_P			15	μ A
Valley Point Current					,
$(V_{BB} = 10V)$	I_v	1	2		mA
Emitter Reverse Current					
$(V_{EB1} = 5V)$	I_{EB1O}		0.1	10	nA
Emitter Saturation Voltage					,
$(I_E = 50 \text{mA}, V_{BB} = 10 \text{V})$	$V_{E(sat)}$		1.1	1.5	Volts
Modulated Interbase Current					
$(I_E = 50 \text{mA}, V_{BB} = 10 \text{V})$	$I_{B2 (\bmod)}$		4	10	mA
Peak Pulse Voltage					
(Note 4)	V_{OIT}	3.5	4.5		Volts
Diode Voltage Drop	**				
(Note 3)	V_{D}	.30	.45	.60	Volts
Minimum Charge to Trigger	0				,
$(V_{BR} = 10V)$	Qt		50		pC
Turn-on Time (See Figure 7)	t_{on}			1	μsec.
Recovery Time (See Figure 7)	t_{rec}			10	μsec.
Relaxation Oscillator Frequency Shift from 25°C Value (See Figure 1,					
$C = 0.1 \mu F$, $R_{B2} = 1 k\Omega$, $V_{S} = 12.5 V$)					
-15° C to $+65^{\circ}$ C			0.3	1.0	%
-55°C to $+100$ °C			0.5	2.0	%

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