

UHF MIXER
SILICON EPITAXIAL SCHOTTKY BARRIER DIODE

DESCRIPTION AND APPLICATIONS

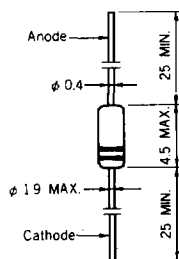
The 1SS97 is silicon epitaxial schottky barrier diode, especially designed for mixing, switching, log or A-D converting, frequency discriminating sampling and wave shaping.

FEATURES

- Small size glass package. (DO-35 TYPE)
- High breakdown voltage: $V_R = 10$ V MIN. at $I_R = 10$ μ A
- Batch matched.
- Low cost.

PACKAGE DIMENSIONS
in millimeters

JEDEC : DO-35



Color Code (from cathode)
Green, Blue

ABSOLUTE MAXIMUM RATINGS (Ta = 25 °C)

Reverse Voltage	V_R	10	V
Forward Current	I_F	35	mA
DC Power Dissipation	P_d	150	mW
Junction Temperature	T_j	+175	°C
Storage Temperature	T_{stg}	-65 to +175	°C
Reverse Burnout *	B_o	2.0	erg

Note * : Capacitor charge method C(charge) = 25 pF

ELECTRICAL CHARACTERISTICS (Ta = 25 °C)

CHARACTERISTIC	SYMBOL	MIN.	TYP.	MAX.	UNIT	TEST CONDITIONS
Reverse Voltage	V_R	10			V	$I_R = 10$ μ A
Forward Voltage	V_F	0.46		0.55	V	$I_F = 10$ mA
Delta Forward Voltage *	ΔV_F			10	mV	$I_F = 10$ mA
Capacitance	C_t			1.0	pF	$V_R = 0$, $f = 1.0$ MHz
Delta Capacitance *	ΔC_t			0.2	pF	$V_R = 0$, $f = 1.0$ MHz

Note * : Difference of V_F , C_t .

TYPICAL CHARACTERISTICS (Ta = 25 °C)

