

**ZENER SILICON RECTIFIER**

**VOLTAGE RANGE 90 to 330 Volts CURRENT 1.0 Ampere**

**FEATURES**

- \* High reliability
- \* Low leakage
- \* Low forward voltage drop
- \* Excellent clamping capability

**MECHANICAL DATA**

- \* Case: Molded plastic
- \* Epoxy: Device has UL flammability classification 94V-0
- \* Lead: MIL-STD-202E method 208C guaranteed
- \* Mounting position: Any
- \* Weight: 0.4 gram

**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

Ratings at 25 °C ambient temperature unless otherwise specified.  
 Single phase, half wave, 60 Hz, resistive or inductive load.  
 For capacitive load, derate current by 20%.



**DO-41**



Dimensions in inches and (millimeters)

**MAXIMUM RATINGS** (At TA = 25°C unless otherwise noted)

TYPE	Zener Breakdown Voltage	Dynamic Impedances @ 25°C TA				Maximum Reverse Current @ Measurement Voltage and 25°C TA		Maximum Forward Voltage @ 25°C TA @ IF = 1.0A
		IzT	ZzT	IzK	ZzK	VR	IR	
	V	mA	Ohms	mA	Ohms	V	uA	V
Z90	90	2.7	250	.25	2000	70	0.5	1.0
Z100	100	2.5	350	.25	3000	75	0.5	1.0
Z105	105	2.4	400	.25	3500	77	0.5	1.0
Z110	110	2.3	450	.25	4000	80	0.5	1.0
Z115	115	2.2	500	.25	4250	85	0.5	1.0
Z120	120	2.1	550	.25	4500	90	0.5	1.0
Z130	130	1.9	700	.25	5000	95	0.5	1.0
Z135	135	1.85	750	.25	5250	100	0.5	1.0

OPERATING AND STORAGE TEMPERATURE - 55°C to + 150°C

NOTE: Standard tolerance: +/-20%, Suffix "A" : +/-10%

TYPE	Zener Breakdown Voltage	Dynamic Impedances @ 25°C TA				Maximum Reverse Current @ Measurement Voltage and 25°C TA		Maximum Forward Voltage @ 25°C TA @ IF = 1.0A
		VZ	IzT	ZzT	IzK	ZzK	VR	IR
	V	mA	Ohms	mA	Ohms	V	uA	V
Z140	140	1.8	800	.25	5500	105	0.5	1.0
Z150	150	1.7	1000	.25	6000	110	0.5	1.0
Z160	160	1.6	1100	.25	6500	120	0.5	1.0
Z170	170	1.5	1200	.25	6750	130	0.5	1.0
Z180	180	1.4	1350	.25	7000	140	0.5	1.0
Z190	190	1.3	1500	.25	7500	150	0.5	1.0
Z200	200	1.2	1700	.25	8000	160	0.5	1.0
Z220	220	1.1	2000	.25	8250	170	0.5	1.0
Z240	240	1.0	2200	.25	8500	180	0.5	1.0
Z270	270	0.9	2500	.25	8750	200	0.5	1.0
Z300	300	0.8	3000	.25	9000	220	0.5	1.0
Z330	330	0.75	4000	.25	9500	240	0.5	1.0

OPERATING AND STORAGE TEMPERATURE - 55°C to + 150°C

2002-12

NOTE: Standard tolerance: +/-20%, Suffix "A" : +/-10%

# RATING AND CHARACTERISTIC CURVES ( Z90 THRU Z330 )

