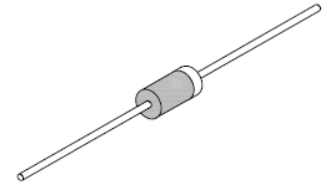


2.0A Sintered Glass Passivated Ultra Fast Recovery Rectifier (SGP[®])

Features

- Sintered glass passivated (SGP[®]) rectifier chip
- Low forward voltage, high current capability
- Low leakage current, high surge current capability
- High temperature soldering guaranteed: 260°C/10 seconds
/.0375" (9.5mm) lead length, 5lbs (2.3kg) tension
- RoHS Compliance



DO-15
(DO-204AC)



Mechanical Data

Case:	JEDEC DO-204AC(DO-15) molded plastic body
Epoxy:	Plastic package has UL flammability classification 94V-0
Terminals:	Plated axial leads, solderable per MIL-STD-750, Method 2026
Polarity:	Color band denotes cathode end
Weight:	0.015 ounces, 0.4 gram

Maximum Ratings and Electrical Characteristics ($T_A=25^{\circ}\text{C}$ unless noted otherwise)

Symbol	Description	UGP 20A	UGP 20B	UGP 20D	UGP 20G	UGP 20J	UGP 20K	UGP 20M	Unit	Conditions
V_{RRM}	Maximum Repetitive Peak Reverse Voltage	50	100	200	400	600	800	1000	V	
V_{RMS}	Maximum RMS Voltage	35	70	140	280	420	560	700	V	
V_{DC}	Maximum DC Blocking Voltage	50	100	200	400	600	800	1000	V	
I_{F(AV)}	Maximum Average Forward Rectified Current	2.0							A	0.375" (9.5mm) lead length(Fig.1)
I_{FSM}	Peak Forward Surge Current	65				60			A	8.3ms single half sine-wave superimposed on rated load (JEDEC Method)

2.0A Sintered Glass Passivated Ultra Fast Recovery Rectifier (SGP[®])

UGP20A - UGP20M

Symbol	Description	UGP 20A	UGP 20B	UGP 20D	UGP 20G	UGP 20J	UGP 20K	UGP 20M	Unit	Conditions	
V_F	Maximum Instantaneous Forward Voltage	1.00			1.25	1.70			V	I _F =2.0 A	
I_R	Maximum DC Reverse Current at Rated DC Blocking Voltage	5				5				μA	T _A =25° C
		30				100					T _A =125° C
		100				-					T _A =150° C
T_{rr}	Typical Reverse Recovery Time	50				75				nS	I _F =0.5A, I _R =1A, I _{rr} =0.25A
C_J	Typical Junction Capacitance	45								pF	V _R =4V, f=1MHz
R_{thJA} R_{thJL}	Typical Thermal Resistance	40				15				°C / W	Note
T_J	Operating Temperature range	-65 to +175				-55 to +150				°C	
T_{STG}	Storage Temperature Range	-65 to +175				-55 to +150					

Note: Thermal resistance from junction to ambient at 0.375" (9.5mm) lead lengths, P.C.B mounted.

Typical Characteristics Curves

Fig.1-Max. Forward Current Derating Curve

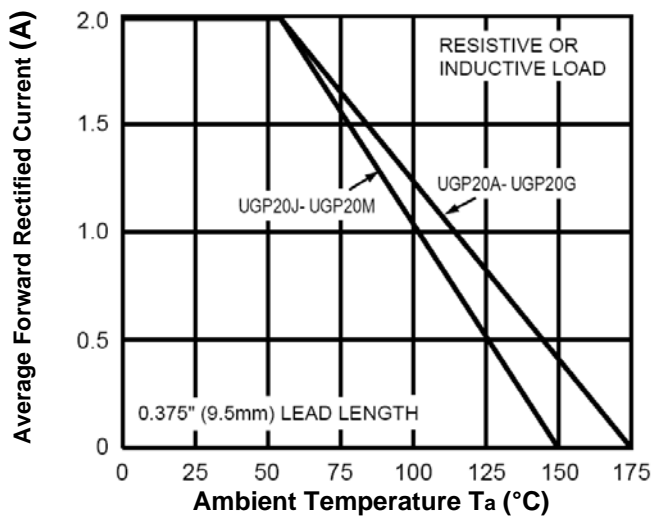
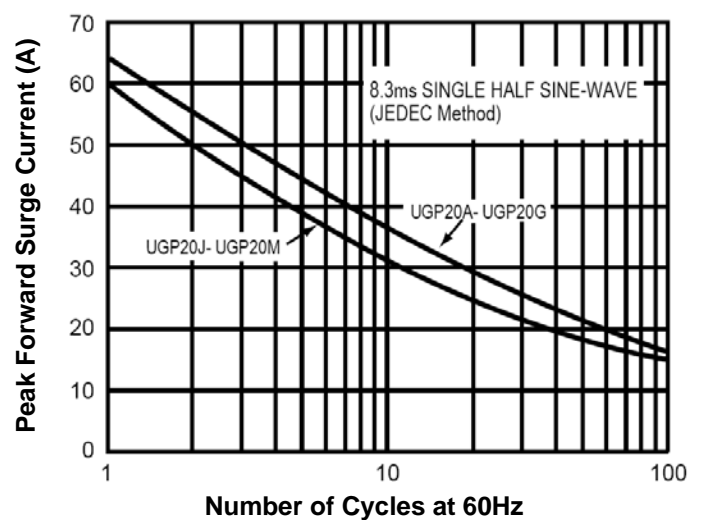


Fig.2-Max. Non-Repetitive Forward Surge Current



2.0A Sintered Glass Passivated Ultra Fast Recovery Rectifier (SGP[®])

UGP20A - UGP20M

Fig.3- Typical Forward Characteristics

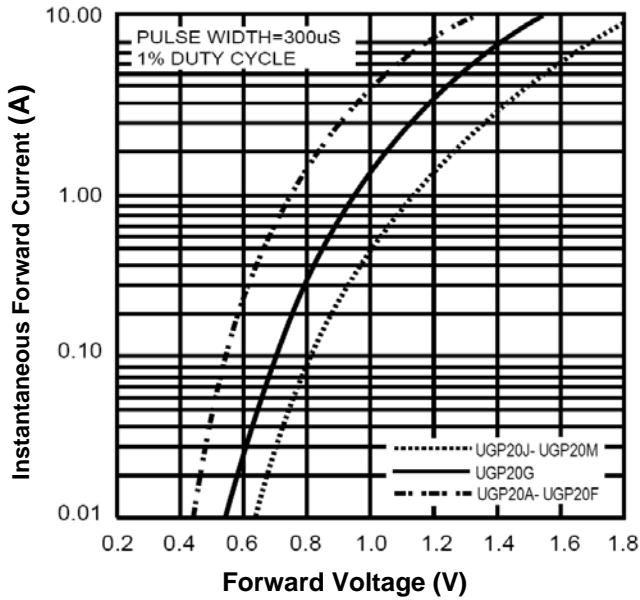


Fig.4-Typical Reverse Characteristics

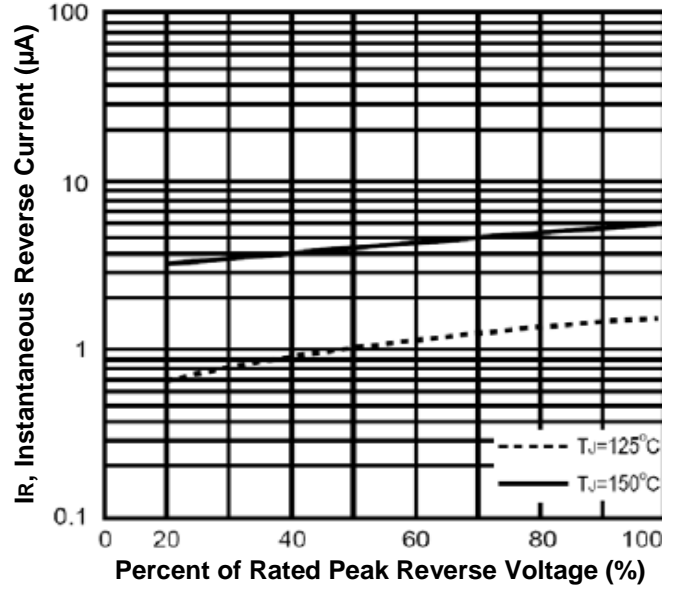
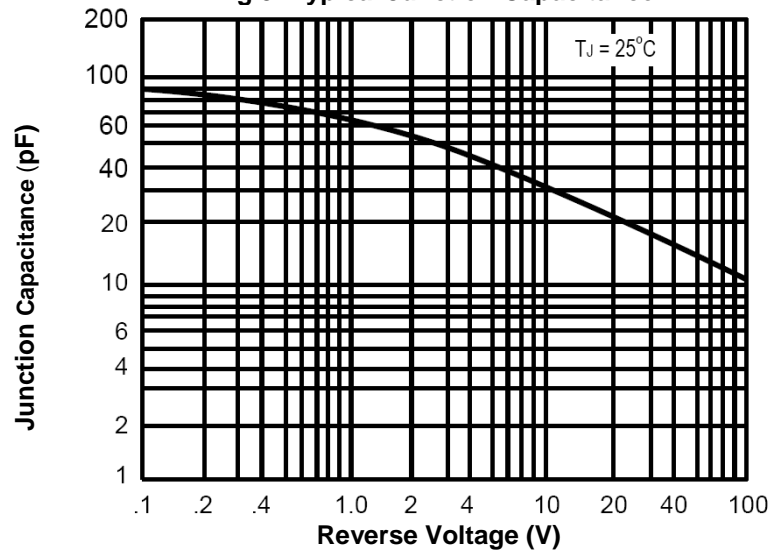


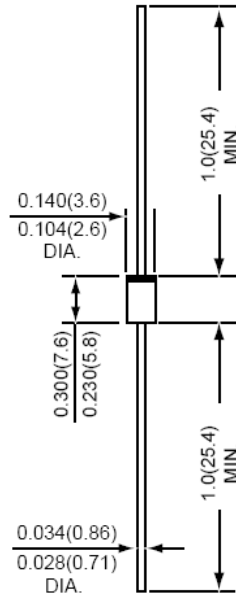
Fig.5- Typical Junction Capacitance



2.0A Sintered Glass Passivated Ultra Fast Recovery Rectifier (SGP[®])

UGP20A - UGP20M

Dimensions in inches (mm)



DO-15
(DO-204AC)

How to contact us:

US HEADQUARTERS

28040 WEST HARRISON PARKWAY, VALENCIA, CA 91355-4162

Tel: (800) TAITRON (800) 824-8766 (661) 257-6060

Fax: (800) TAITFAX (800) 824-8329 (661) 257-6415

Email: taitron@taitroncomponents.com

Http://www.taitroncomponents.com

TAITRON COMPONENTS MEXICO, S.A .DE C.V.

BOULEVARD CENTRAL 5000 INTERIOR 5 PARQUE INDUSTRIAL ATITALAQUIA, HIDALGO C.P.

42970 MEXICO

Tel: +52-55-5560-1519

Fax: +52-55-5560-2190

TAITRON COMPONETS INCORPORATED E REPRESENTAÇÕES DO BRASIL LTDA

RUA DOMINGOS DE MORAIS, 2777, 2.ANDAR, SALA 24 SAÚDE - SÃO PAULO-SP 04035-001 BRAZIL

Tel: +55-11-5574-7949

Fax: +55-11-5572-0052

TAITRON COMPONETS INCORPORATED, SHANGHAI REPRESENTATIVE OFFICE

METROBANK PLAZA, 1160 WEST YAN' AN ROAD, SUITE 1503, SHANGHAI, 200052, CHINA

Tel: +86-21-5424-9942

Fax: +86-21-5424-9931