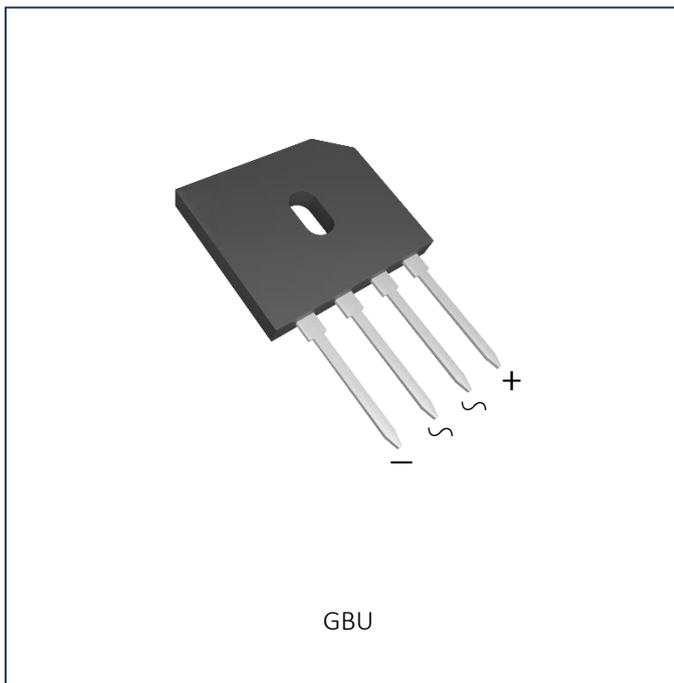


封装外形 Package



主要参数 Device summary

Symbol	Value
$I_{F(AV)}$	25A
V_{RRM}	1000V
$V_{F(typ)}$	0.88V@12.5A 125°C
$I_{R(typ)}$	30 μ A@ V_{RRM} 125°C
$T_{j(max)}$	150°C

产品特点 Features

- 玻璃钝化芯片 Glass passivated chip
- 高浪涌电流能力 High surge current capability
- 低漏电流 Low leakage current
- 符合 RoHS 指令 2011/65/EU
Compliant to RoHS directive 2011/65/EU
- 焊料浸渍温度最高为 275°C，持续 7 秒
Solder dip 275 °C max. 7 s

产品应用 Typical Applications

AC/DC 桥式全波整流的通用用途，显示器、电视、打印机、电源、开关电源、适配器、音频设备和家用电器。

General purpose use in AC/DC bridge full wave rectification for monitor, TV, printer, power supply, switching mode power supply, adapter, audio equipment, and home appliances.

机械数据 Mechanical Data

- 模塑料符合 UL94 V-0 易燃等级，符合 RoHS 标准
Molding compound meets UL 94 V-0 flammability rating, RoHS-compliant
- 端子：镀锡引线，可焊接 J-STD-002 和 JESD22-B102
Terminals: Tin plated leads, solderable per J-STD-002 and JESD22-B102
- 极性：本体标记
Polarity: As marked on body
- 重量：约 3.8 克/3.5 克（短脚）
Weight: Approximate 3.8g/3.5g(short pin)

最大额定值 Maximum ratings(Ta=25°C)

项目 Parameter	符号 Symbol	数值 Value	单位 Unit
反向重复峰值电压 Peak repetitive reverse voltage	VRRM	1000	V
正向电流 Forward current	IF	带散热片 Tc=100°C With heatsink Tc=100°C	25
		不带散热片 Tc=25°C Without heatsink Tc=25°C	3.5
浪涌电流 Non-repetitive single pulse surge current t=8.3ms	IFSM	300	A
结温 Junction temperature	Tj	-55~+150	°C
存储温度 Storage temperature	TSTG	-55~+150	°C
绝缘电压 (端子至外壳交流 1 分钟) Dielectric strength(terminal to case AC 1 minute)	Vdis	2500	V
安装扭矩 Mounting torque@Recommend torque: 5kg·cm	Tor	8	kg·cm

电特性 Electrical characteristics(Ta=25°C)

项目 Parameter	测试条件 Tests conditions		数值 Value			单位 Unit
			最小值 (min)	典型值 (typ)	最大值 (max)	
VRRM 反向电压	IR=0.05mA		1000	-	-	V
IR 反向漏电	Tj=25°C	VR=VRRM	-	-	5	μA
	Tj=125°C		-	-	250	
VF 正向电压	Tj=25°C	IF=12.5A	-	-	1.10	V
	Tj=100°C	IF=4A	-	0.79	-	
		IF=5A	-	0.81	-	
	Tj=125°C	IF=4A	-	0.76	-	
		IF=5A	-	0.78	-	

热特性 Thermal characteristics(Ta=25°C)

Parameter	Symbol	Value	Unit
结到环境热阻 (无散热片) Junction to ambient thermal resistance(without heatsink)	Rth(j-a)	25	°C/W
结到管壳热阻 (有散热片) Thermal resistance from junction to case(with heatsink)	Rth(j-c)	1.0	°C/W

典型特征图 Typical Characteristics

图 1: 正向电流与外壳温度

FIG 1: I_F - T_c

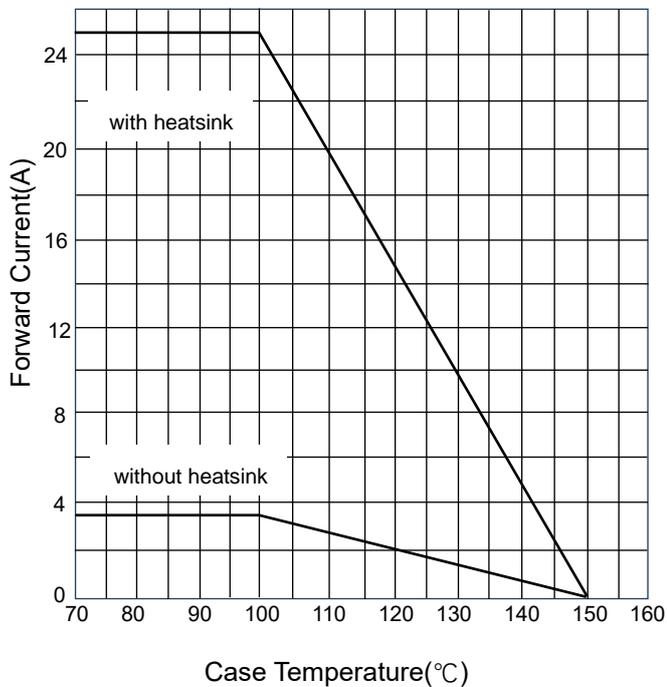


图 2: 正向浪涌循环次数

FIG 2: Surge Forward Current Capability

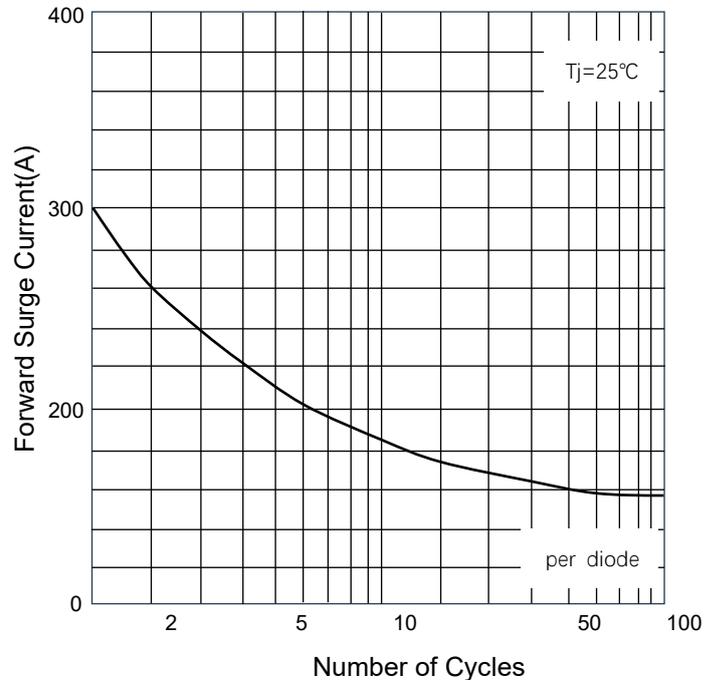


图 3: 反向电压与反向电流

FIG 3: V_R - I_R

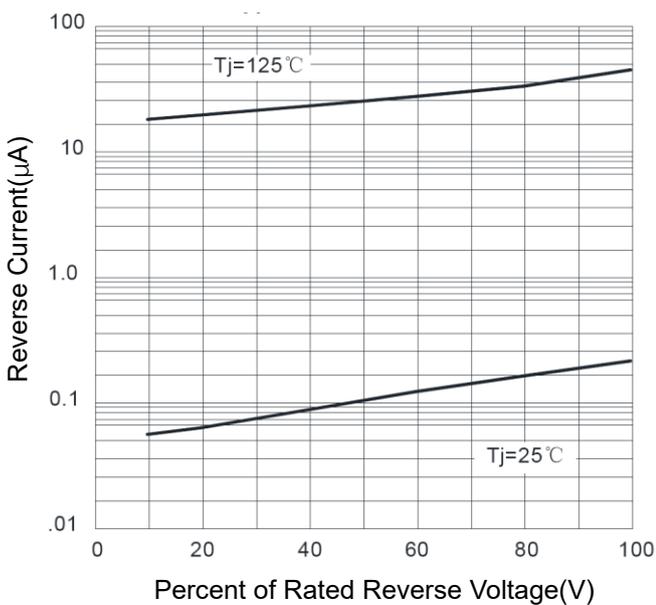
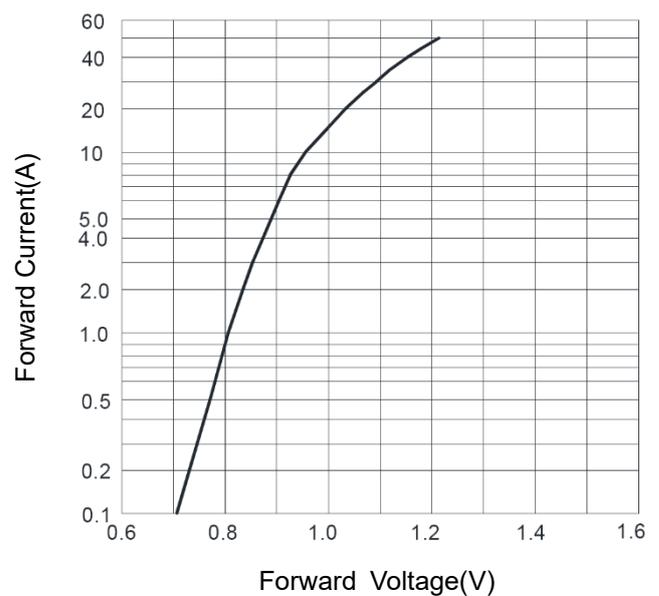
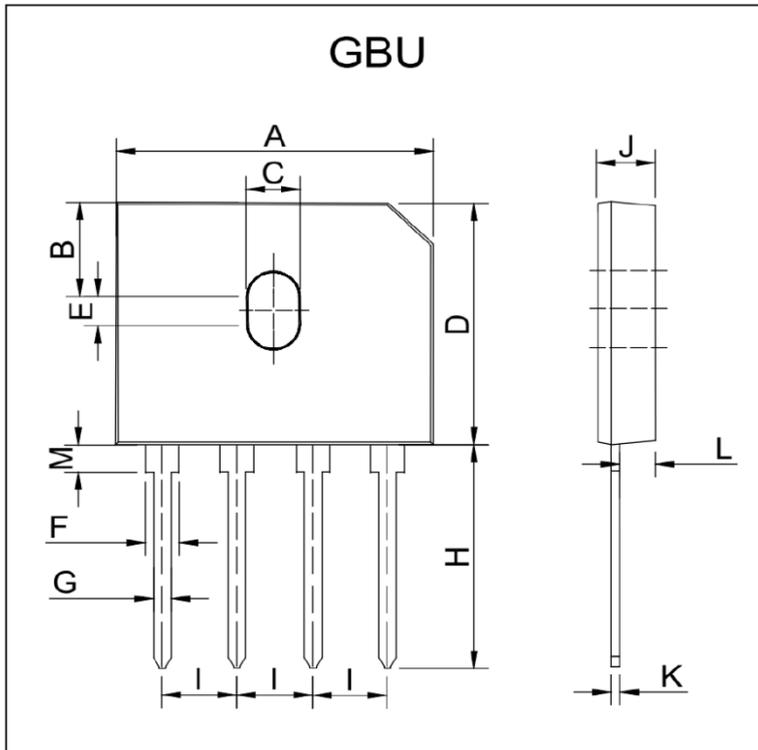


图 4: 正向电流与正向电压

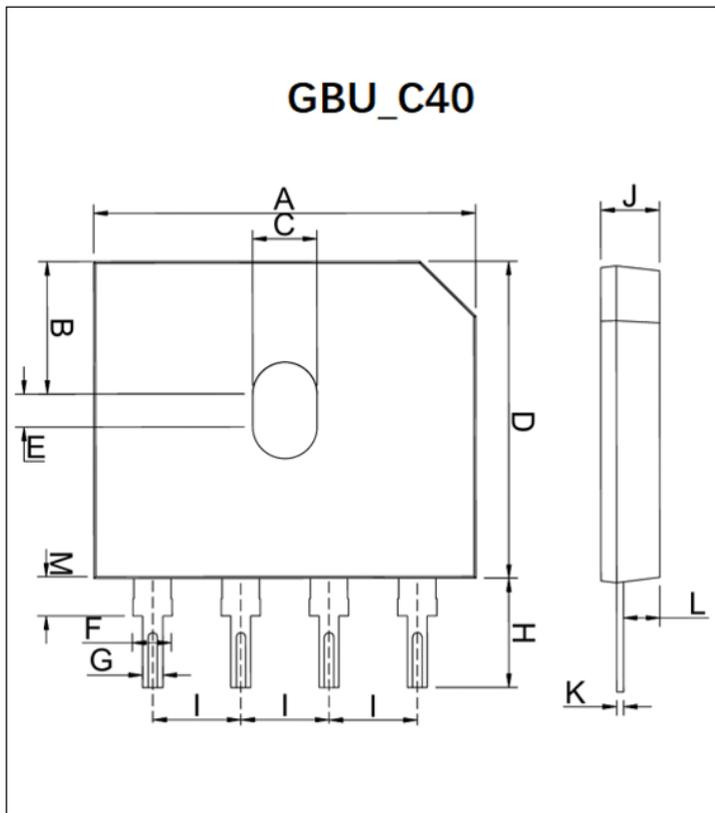
FIG 4: I_F - V_F



外形尺寸 Outline Dimensions



GBU _(mm)			
Dim	Min	Typ	Max
A	21.80	22.00	22.20
B	7.60	7.80	8.00
C	3.50	3.80	4.10
D	18.30	18.50	18.70
E	1.70	1.90	2.10
F	2.05	2.30	2,55
G	1.00	1.15	1.30
H	17.50	17.80	18.10
I	4.90	5.00	5.10
J	3.30	3.40	3.50
K	0.35	0.45	0.55
L	1.70	1.90	2.10
M	2.40	2.60	2.80



GBU_C40 _(mm)			
Dim	Min	Typ	Max
A	21.80	22.00	22.20
B	7.60	7.80	8.00
C	3.50	3.80	4.10
D	18.30	18.50	18.70
E	1.70	1.90	2.10
F	2.05	2.30	2,55
G	1.00	1.15	1.30
H	5.90	6.20	6.50
I	4.90	5.00	5.10
J	3.30	3.40	3.50
K	0.35	0.45	0.55
L	1.90	2.10	2.30
M	1.90	2.20	2.50

订购信息 Ordering Information

订单型号 Order code	印记 Marking	包装形式 Delivery Mode	基本包装 Min PKG (pcs)	盒 Box pcs	箱 Carton pcs	重量 Weight Kg
GBU2510G	GBU2510	散装 Bulk Packing	-	250	3000	12.6
GBU2510H				250	5000	19.2
GBU2510GC40						
GBU2510HC40						

注 note:

1. “C40”为短脚，详见外形尺寸。“C40” is short pin, the size is shown in the Outline Dimensions.
2. “G”为无铅版本，“H”为无卤版本。“G” is Lead-free version, “H” is Halogen-free version.

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