

5A Avg.

30 Volts

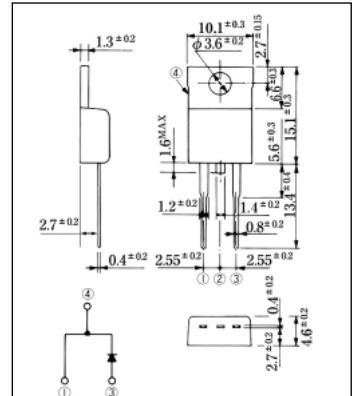
SBD

GSQ05A03L

最大定格 Maximum Ratings

Item	Symbol	Conditions	Unit		
くり返しピーク逆電圧 Repetitive Peak Reverse Voltage	$V_{RRM}$	30	V		
くり返しピークサージ逆電圧 Repetitive Peak Surge Reverse Voltage	$V_{RRSM}$	35 pulse width $\leq 1 \mu s$ duty $\leq 1/50$	V		
平均整流電流 Average Rectified Forward Current	$I_O$	50Hz, 正弦半波通電抵抗負荷 50Hz Half Sine Wave Resistive Load	$T_c = 122^\circ C$	5	A
実効順電流 R.M.S. Forward Current	$I_F(RMS)$	7.85	A		
サージ順電流 Surge Forward Current	$I_{FSM}$	120 50Hz正弦半波, 1サイクル, 非くり返し 50Hz Half Sine Wave, 1cycle, Non-repetitive	A		
動作接合温度範囲 Operating Junction Temperature Range	$T_{jw}$	-40 ~ +150	$^\circ C$		
保存温度範囲 Storage Temperature Range	$T_{stg}$	-40 ~ +150	$^\circ C$		
締付トルク Mounting torque	$F_{tor}$	推奨値 Recommended Value	0.5	N·m	

OUTLINE DRAWING(mm)



APPROX. NET WEIGHT: 1.85 g

電氣的・熱的特性 Electrical/Thermal Characteristics

Item	Symbol	Conditions	Min.	Typ.	Max.	Unit
ピーク逆電流 Peak Reverse Current	$I_{RM}$	$T_j = 25^\circ C, V_{RM} = V_{RRM}$	—	—	5	mA
ピーク順電圧 Peak Forward Voltage	$V_{FM}$	$T_j = 25^\circ C, I_{FM} = 5A$	—	—	0.47	V
熱抵抗 Thermal Resistance	$R_{th(j-c)}$	接合部・ケース間 Junction to Case	—	—	5	$^\circ C/W$

定格・特性曲線

FIG.1

順電圧特性  
FORWARD CURRENT VS. VOLTAGE

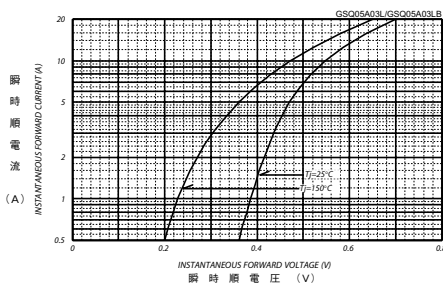


FIG.2

平均順電力損失特性  
AVERAGE FORWARD POWER DISSIPATION

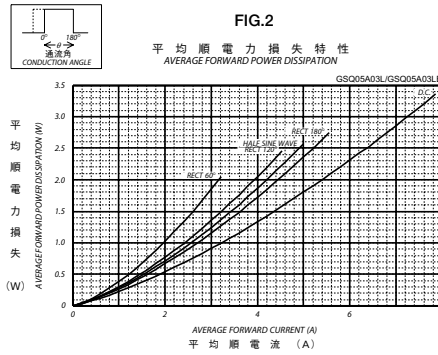


FIG.3

ピーク逆電流 - ピーク逆電圧特性  
PEAK REVERSE CURRENT VS. PEAK REVERSE VOLTAGE

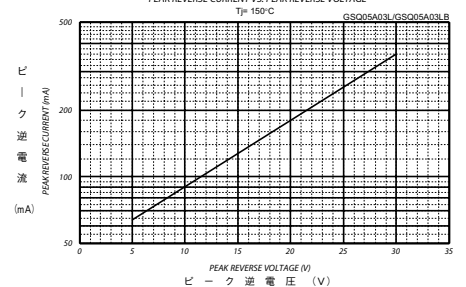


FIG.4

平均逆電力損失  
AVERAGE REVERSE POWER DISSIPATION

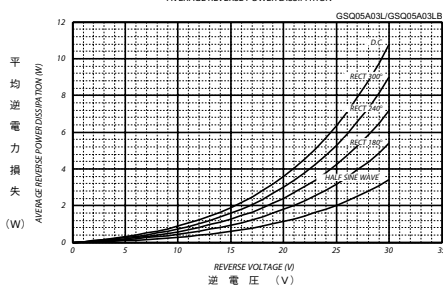


FIG.5

平均順電流 - ケース温度定格  
AVERAGE FORWARD CURRENT VS. CASE TEMPERATURE

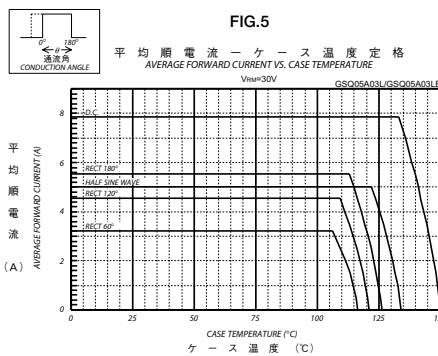


FIG.6

サージ順電流定格  
SURGE CURRENT RATINGS

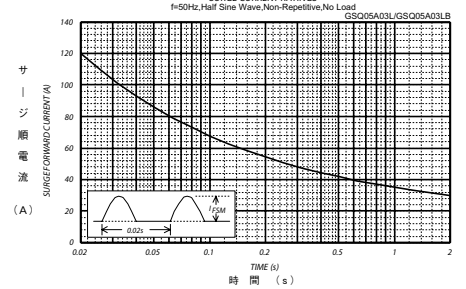


FIG.7

接合容量特性  
JUNCTION CAPACITANCE VS. REVERSE VOLTAGE

