

30A Avg.

40 Volts

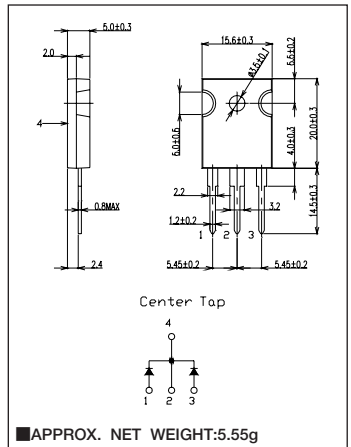
SBD

KCH30A04

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}	40	V
くり返しピークサージ逆電圧 Repetitive Peak Surge Reverse Voltage	V_{RRSM}	45 pulse width $\leq 1 \mu s$ duty $\leq 1/50$	V
平均整流電流 Average Rectified Output Current	I_O	50Hz, 正弦全波抵抗負荷 50Hz Full Sine Wave Resistive Load	30 A
実効順電流 RMS Forward Current	$I_F(RMS)$	33.3	A
サージ順電流 Surge Forward Current	I_{FSM}	250 50Hz正弦全波, 1サイクル, 非くり返し 50Hz Full Sine Wave, 1cycle, Non-repetitive	A
動作接合温度範囲 Operating Junction Temperature Range	T_{jw}	-40~+150	°C
保存温度範囲 Storage Temperature Range	T_{stg}	-40~+150	°C
締付トルク Mounting torque	F_{tor}	推奨値 Recommended Value	0.5 N·m

OUTLINE DRAWING(mm)



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}	$T_j=25^\circ C$, $V_{RM}=V_{RRM}$, 一素子あたり Per Diode	—	—	1	mA
ピーク順電圧 Peak Forward Voltage	V_{FM}	$T_j=25^\circ C$, $I_{FM}=15A$, 一素子あたり Per Diode	—	—	0.61	V
熱抵抗 Thermal Resistance	$R_{th(j-c)}$	接合部・ケース間 Junction to Case	—	—	1.5	°C/W

定格・特性曲線

FIG.1

順電圧特性
FORWARD CURRENT VS. VOLTAGE

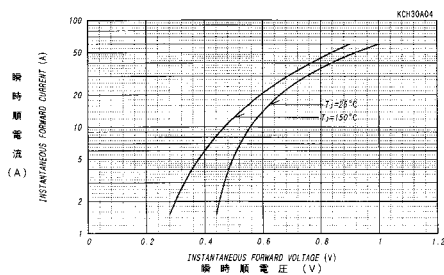


FIG.2

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

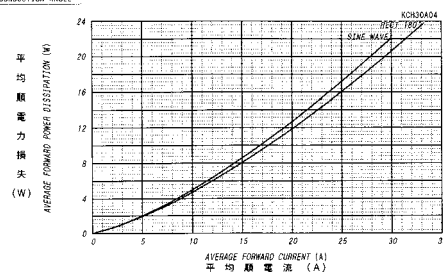


FIG.3

ピーク逆電流 - ピーク逆電圧特性
PEAK REVERSE CURRENT VS. PEAK REVERSE VOLTAGE
 $T_j=150^\circ C$

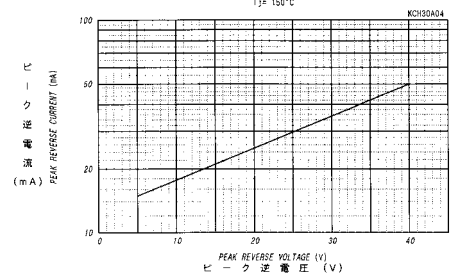


FIG.4

平均逆電力損失
AVERAGE REVERSE POWER DISSIPATION

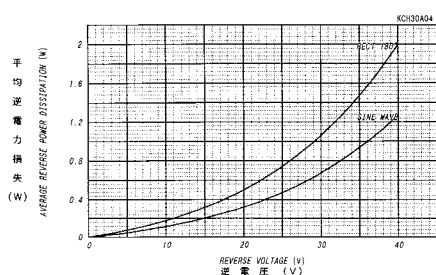


FIG.5

平均順電流 - ケース温度定格
AVERAGE FORWARD CURRENT VS. CASE TEMPERATURE
 $V_{FM}=40V$

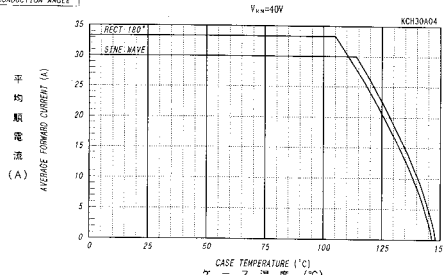


FIG.6

サージ順電流定格
SURGE CURRENT RATINGS
 $f=50Hz$ Sine Wave, Non-Repetitive, No Load

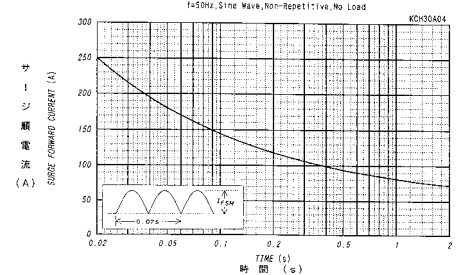


FIG.7

接合容量特性
JUNCTION CAPACITANCE VS. REVERSE VOLTAGE
 $T_j=25^\circ C$, $V_R=20Vrms$, $f=100kHz$, Typical Value

