

30A Avg.

400 Volts

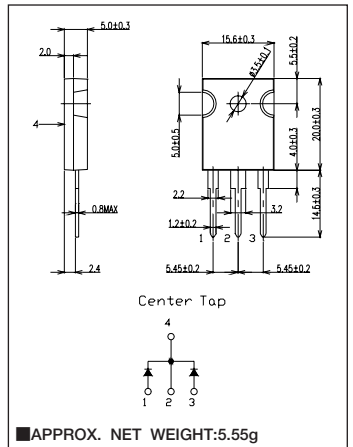
FRED

KCU30A40

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}	400	V
平均整流電流 Average Rectified Forward Current	I_O	50Hz、正弦全波通電抵抗負荷 50Hz Full Sine Wave Resistive Load	30
実効順電流 R.M.S. Forward Current	$I_F(RMS)$	33.3	A
サージ順電流 Surge Forward Current	I_{FSM}	150 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}	$T_j=25^{\circ}\text{C}$, $V_{RM}=V_{RRM}$, 1素子あたり per diode	—	—	30	μA
ピーク順電圧 Peak Forward Voltage	V_{FM}	$T_j=25^{\circ}\text{C}$, $I_{FM}=15\text{A}$, 1素子あたり per diode	—	1.37	1.57	V
逆回復時間 Reverse Recovery Time	t_{rr}	$T_j=25^{\circ}\text{C}$, $I_{FM}=10\text{A}$, $-di/dt=50\text{A}/\mu\text{s}$	—	33	45	ns
熱抵抗 Thermal Resistance	$R_{th(j-c)}$	接合部・ケース間 Junction to Case	—	—	2	°C/W

定格・特性曲線

FIG.1

順電圧特性
FORWARD CURRENT VS. VOLTAGE

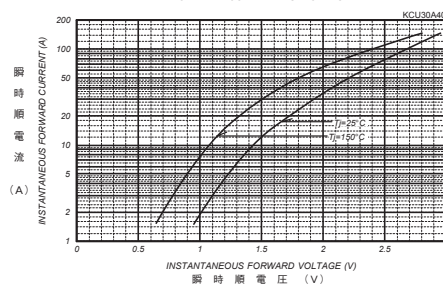


FIG.2

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

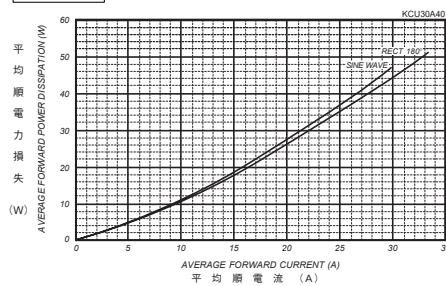


FIG.3

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

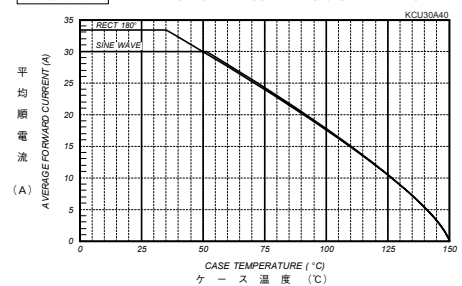


FIG.4

サージ順電流定格
SURGE CURRENT RATINGS

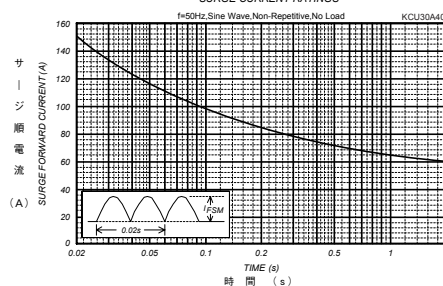


FIG.5

サージ実効順電流定格
RMS SURGE CURRENT RATINGS

