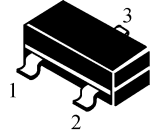


# KEL<sup>®</sup>

C3876

SOT-23

- 1. BASE
- 2. EMITTER
- 3. COLLECTOR



## ■ MAXIMUM RATINGS (T<sub>a</sub>=25°C) 最大額定值

Characteristic 特性參數	Symbol 符號	Rating 額定值	Unit 單位
Collector-Base Voltage 集電極-基極電壓	V <sub>CBO</sub>	35	V
Collector-Emitter Voltage 集電極-發射極電壓	V <sub>CEO</sub>	30	V
Emitter-Base Voltage 發射極-基極電壓	V <sub>EBO</sub>	5	V
Collector Current-Continuous 集電極電流-連續	I <sub>c</sub>	500	mA
Collector Power Dissipation 集電極耗散功率	P <sub>C</sub>	225	mW
Junction Temperature 結溫	T <sub>j</sub>	150	°C
Storage Temperature Range 儲存溫度	T <sub>stg</sub>	-55~150	°C

## ■ DEVICE MARKING 打標

C3876	O	Y	G(R)
MARK	WO	WY	WG
H <sub>FE1</sub>	70~140	120~240	200~400

KEL C3876



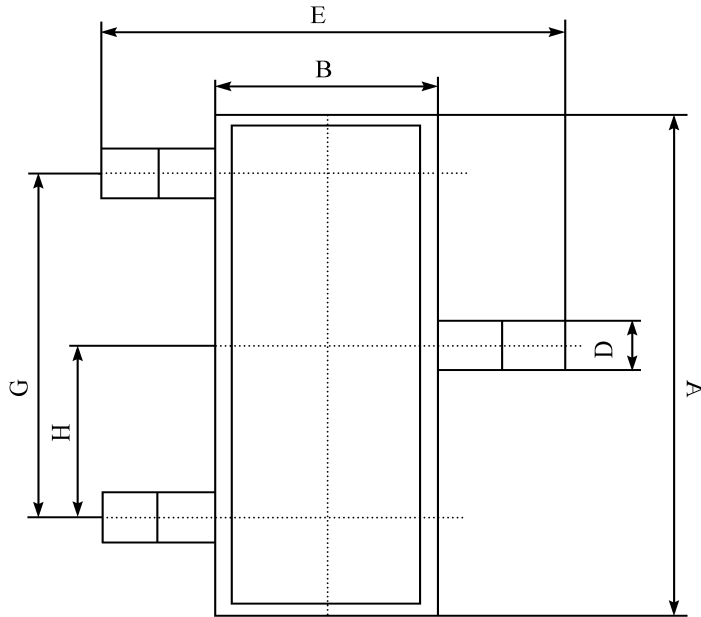
C3876

**■ELECTRICAL CHARACTERISTICS 電特性**

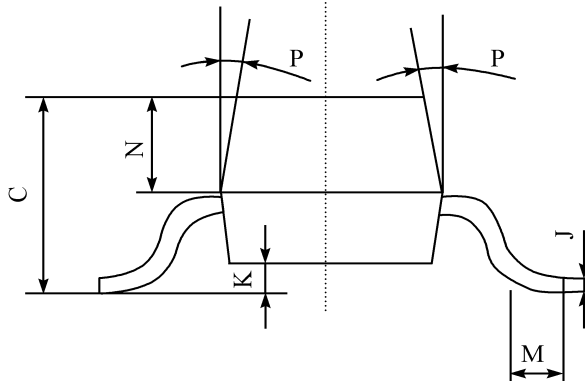
( $T_A=25^{\circ}\text{C}$  unless otherwise noted 如無特殊說明,溫度為  $25^{\circ}\text{C}$ )

Characteristic 特性參數	Symbol 符號	Test Condition 測試條件	Min 最小值	Typ 典型值	Max 最大值	Unit 單位
Collector Cutoff Current 集電極截止電流	$I_{CBO}$	$V_{CB}=35\text{V},$ $I_E=0$	—	—	0.1	$\mu\text{A}$
Emitter Cutoff Current 發射極截止電流	$I_{EBO}$	$V_{EB}=5\text{V},$ $I_C=0$	—	—	0.1	$\mu\text{A}$
Collector-Base Breakdown Voltage 集電極-基極擊穿電壓	$V_{(BR)CBO}$	$I_C=100\mu\text{A}$	35	—	—	V
Collector-Emitter Breakdown Voltage 集電極-發射極擊穿電壓	$V_{(BR)CEO}$	$I_C=1.0\text{mA}$	30	—	—	V
Emitter-Base Breakdown Voltage 發射極-基極擊穿電壓	$V_{(BR)EBO}$	$I_E=100\mu\text{A}$	5	—	—	V
DC Current Gain 直流電流增益	$H_{FE1}$	$V_{CE}=1\text{V},$ $I_C=100\text{mA}$	70	—	400	—
DC Current Gain 直流電流增益	$H_{FE2}$	$V_{CE}=6\text{V},$ $I_C=400\text{mA}$	25(O) 40(Y)	—	—	—
Collector-Emitter Saturation Voltage 集電極-發射極飽和壓降	$V_{CE(sat)}$	$I_C=100\text{mA},$ $I_B=10\text{mA}$	—	0.1	0.25	V
Base-Emitter Saturation 基極-發射極電壓	$V_{BE}$	$V_{CE}=1\text{V},$ $I_C=100\text{mA}$	—	0.8	1.0	V
Transition Frequency 特徵頻率	$f_T$	$V_{CE}=6\text{V},$ $I_C=20\text{mA}$	—	300	—	MHz
Collector Output Capacitance 輸出電容	$C_{ob}$	$V_{CB}=6\text{V}, I_E=0,$ $f=1\text{MHz}$	—	7	—	pF

## ■DIMENSION 外形封裝尺寸



序號	數值及公差
A	$2.90 \pm 0.10$
B	$1.30 \pm 0.10$
C	$1.00 \pm 0.10$
D	$0.40 \pm 0.10$
E	$2.40 \pm 0.20$
G	$1.90 \pm 0.10$
H	$0.95 \pm 0.05$
J	$0.13 \pm 0.05$
K	$0.00 - 0.10$
M	$\geq 0.2$
N	$0.60 \pm 0.10$
P	$7 \pm 2^\circ$



This datasheet presents technical data of Tak Cheong's Silicon Rectifier Diodes. Complete specifications for the individual devices are provided in the form of datasheets. A comprehensive Selector Guide is included to simplify the task of choosing the best set of components required for a specific application. For additional information, please visit our website <http://www.takcheong.com>.

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