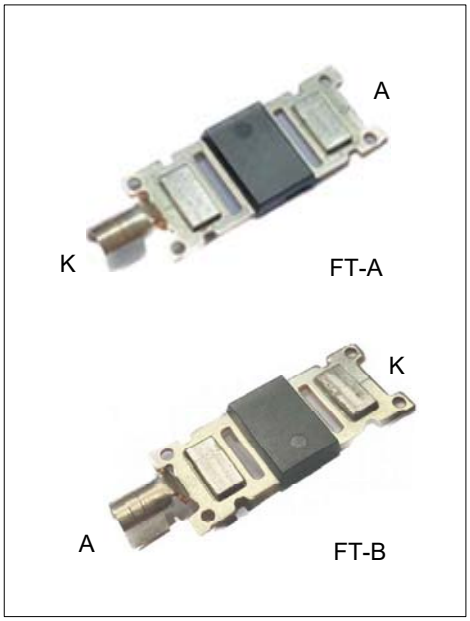
FT4045-P180

Preliminary ***DIODE***

SCHOTTKY BYPASS DIODE MODULE



■ FEATURES

* High frequency operation
* Low forward voltage drop
* High purity, high temperature epoxy encapsulation for enhanced mechanical strength and moisture resistance
* Guard ring for enhanced ruggedness and long term reliability

■ SYMBOL

FT-A	FT-B
A —▶|— K	K —|◀— A

■ ORDERING INFORMATION

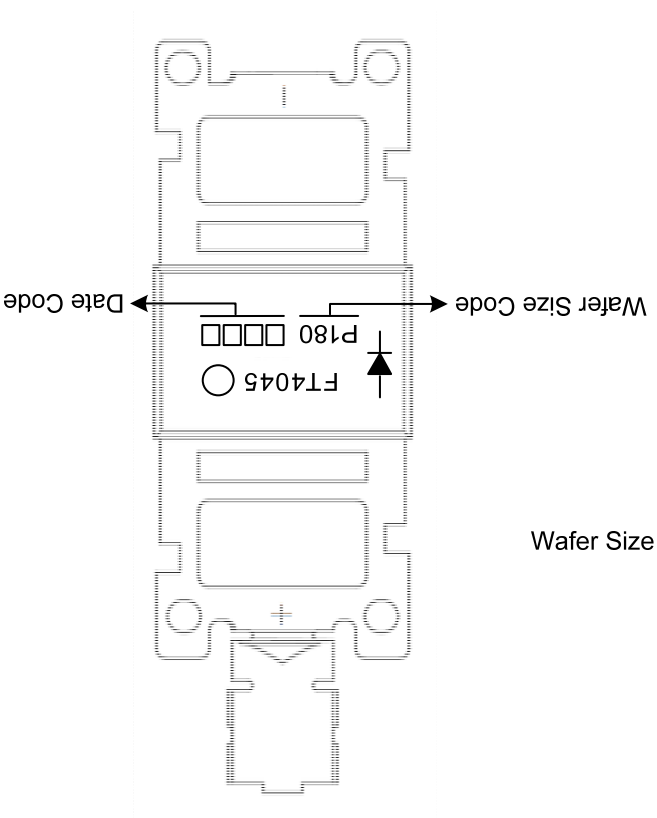
Ordering Number		Package	Packing
Lead Free	Halogen Free		
FT4045L-P180-FTA-T	FT4045G-P180-FTA-T	FT-A	Tube
FT4045L-P180-FTB-T	FT4045G-P180-FTB-T	FT-B	Tube

Note: Pin Assignment: A: Anode K: Cathode

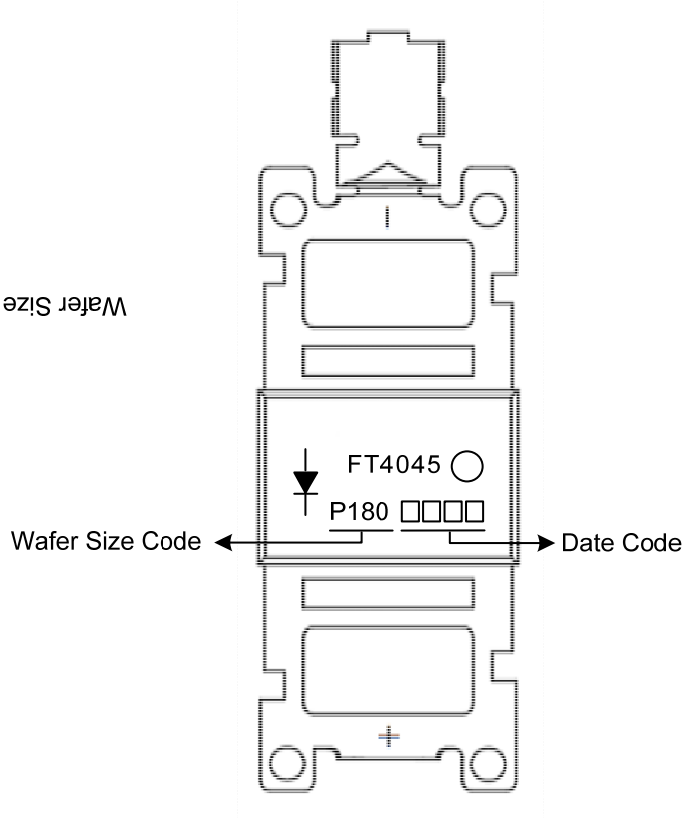
FT4045G-P180-FTA-T

(1)Packing Type	(1) T: Tube
(2)Package Type	(2) FTA: FT-A, FTB: FT-B
(3)Wafer Size Code	(3) P150D
(4)Green Package	(4) G: Halogen Free and Lead Free, L: Lead Free

■ MARKING



FT-A



FT-B

■ ABSOLUTE MAXIMUM RATINGS (T_A=25°C unless otherwise specified)

Single phase, half wave, 60Hz, resistive or inductive load.
For capacitance load, derate current by 20%.

PARAMETER	SYMBOL	RATINGS	UNIT
DC Blocking Voltage	V_{RM}	45	V
Working Peak Reverse Voltage	V_{RWM}	45	V
Peak Repetitive Reverse Voltage	V_{RRM}	45	V
RMS Voltage	V_{RMS}	31.5	V
Average Rectified Output Current @ 60Hz Haif Sine-Wave, R-Load	I_O	40	A
Peak Forward Surge Current 8.3ms Single Half Sine-Wave Superimposed on Rated Load Per Diode	I_{FSM}	300	A
Operating Junction Temperature (In DC Forward Mode Operation Without Reverse Bias) (t<=1h)	T_J	-55 ~ +200	°C
Storage Temperature	T_{STG}	-55 ~ +150	°C

Note: Absolute maximum ratings are those values beyond which the device could be permanently damaged. Absolute maximum ratings are stress ratings only and functional device operation is not implied.

■ THERMAL CHARACTERISTICS (PER LEG)

PARAMETER	SYMBOL	RATINGS	UNIT
Typical Thermal Resistance	θ_{JC}	0.7	°C/W

■ ELECTRICAL CHARACTERISTICS (PER LEG) (T_A=25°C unless otherwise specified)

PARAMETER	SYMBOL	TEST CONDITIONS	MIN	TYP	MAX	UNIT
Reverse Breakdown Voltage	$V_{(BR)R}$	I_R=0.50mA	45			V
Maximum Instantaneous Forward Voltage Drop per Diode	V_F	I_F=40A, T_C=25°C		0.53	0.55	V
		I_F=40A, T_C=125°C			0.51	V
Reverse Leakage Current @ V_R	I_R	V_R=40V, T_C=25°C			100	μA
		V_R=40V, T_C=125°C			12	mA

Note: Pulse Test: Pulse width ≤ 300μs, Duty cycle ≤ 2%.