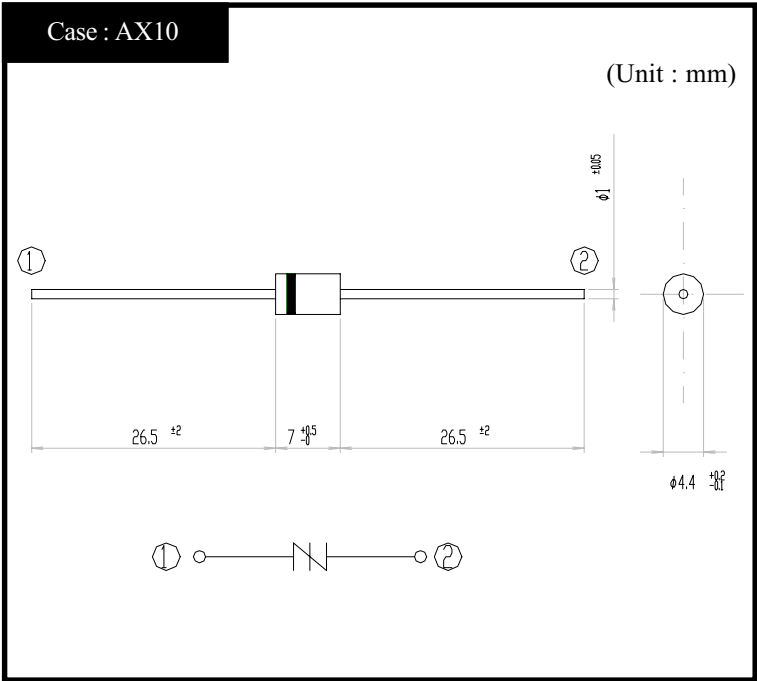


K1V10

OUTLINE DIMENSIONS



RATINGS

●Absolute Maximum Ratings

Item	Symbol	Conditions	Ratings	Unit
Storage Temperature	T _{stg}		-40~125	°C
Operating Junction Temperature	T _j		125	°C
Maximum Off-state Voltage	V _{DRM}		90	V
RMS On-state Current	I _T	T _I = 112°C, 50Hz sine wave (θ = 180°)	1	A
Surge On-state Current	I _{TSM}	T _j = 25°C, 50Hz sine wave (θ = 180°), non-repetitive 1-cycle peak value	20	A
Pulse On-state Current	I _{TRM}	T _a = 25 °C, pulse width t _o = 10 μ s, sine wave, repetitive peak value f = 1 kHz	25	A
		T _a = 25 °C, pulse width t _o = 10 μ s, sine wave, repetitive peak value f = 60 Hz	80	
Critical Rate of Rise of On-state Current	di _T /dt		80	A/ μ s

●Electrical Characteristics (T_I=25°C)

Item	Symbol	Conditions	Ratings	Unit
Breakover Voltage	V _{BO}	I _B = 0, 50Hz sine wave	95~113	V
Off-state Current	I _{DRM}	V _D = V _{DRM}	Max 10	μ A
Breakover Current	I _{BO}		Max 0.5	mA
Holding Current	I _H		TYP 50	mA
On-state Voltage	V _T	I _T = 1A	Max 1.5	V
Switching Resistance	R _S		Min 0.1	k Ω
Thermal Resistance	θ j l	Junction to lead	Max 15	°C/W

●Standard Design with P.C.B.

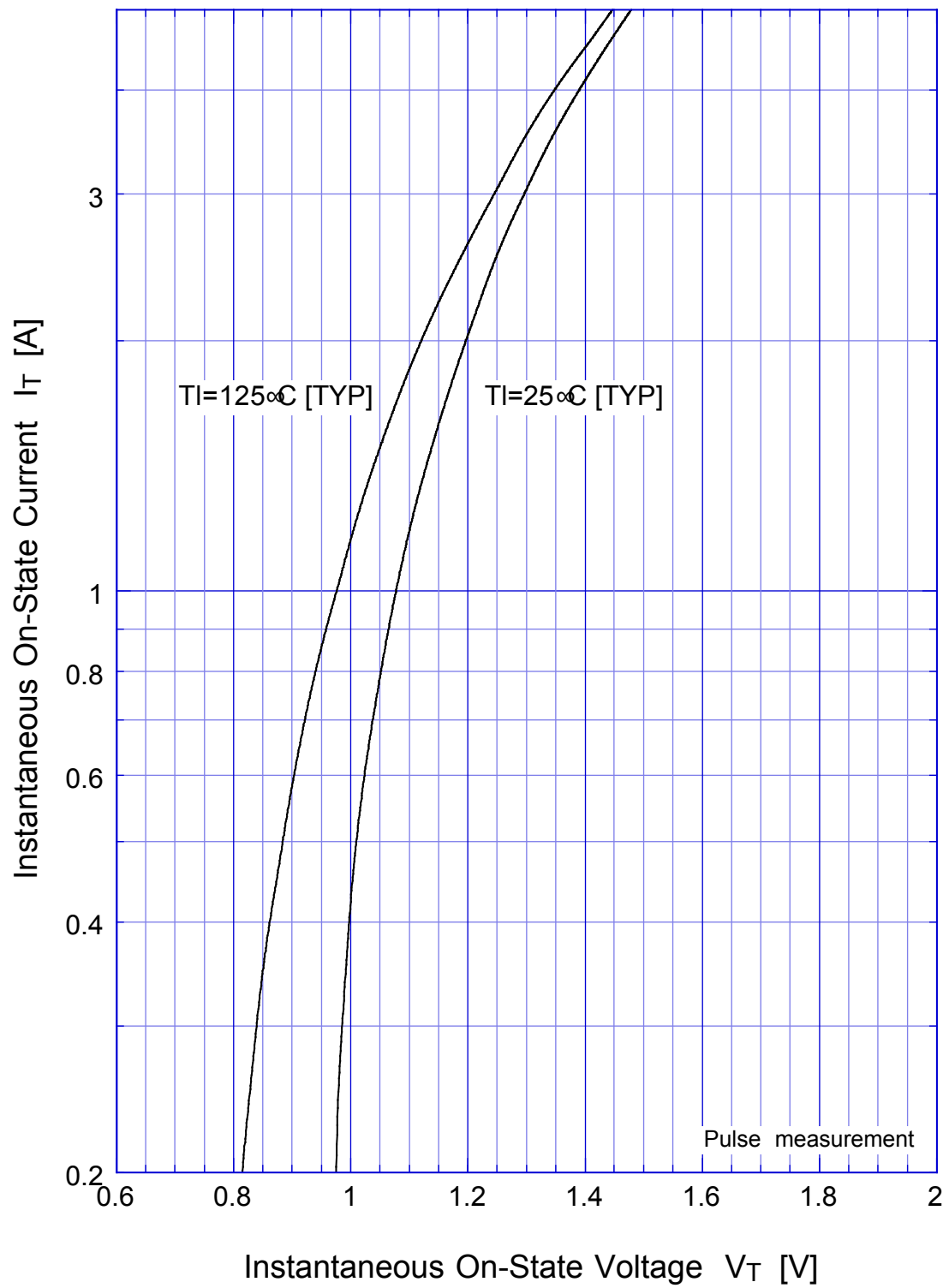
Item	Symbol	Conditions	Standard	Unit
RMS On-state Current	I _T	Assembled in P.C.B., T _a = 25°C, soldering land 3mm ϕ	1.2	A

K1V10

K1V11

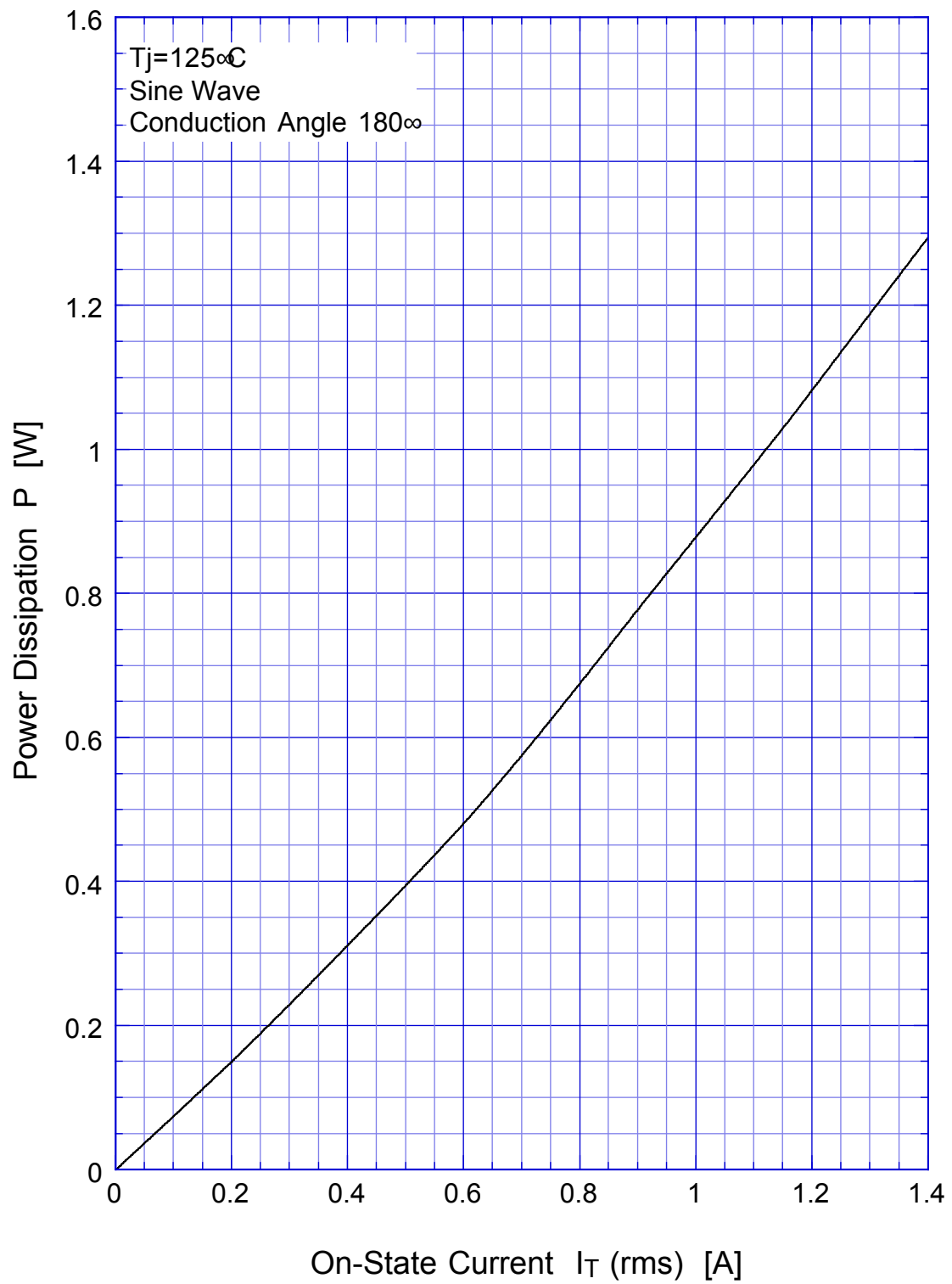
K1V12

Typical On-State Voltage



K1V10
K1V11
K1V12

Power Dissipation

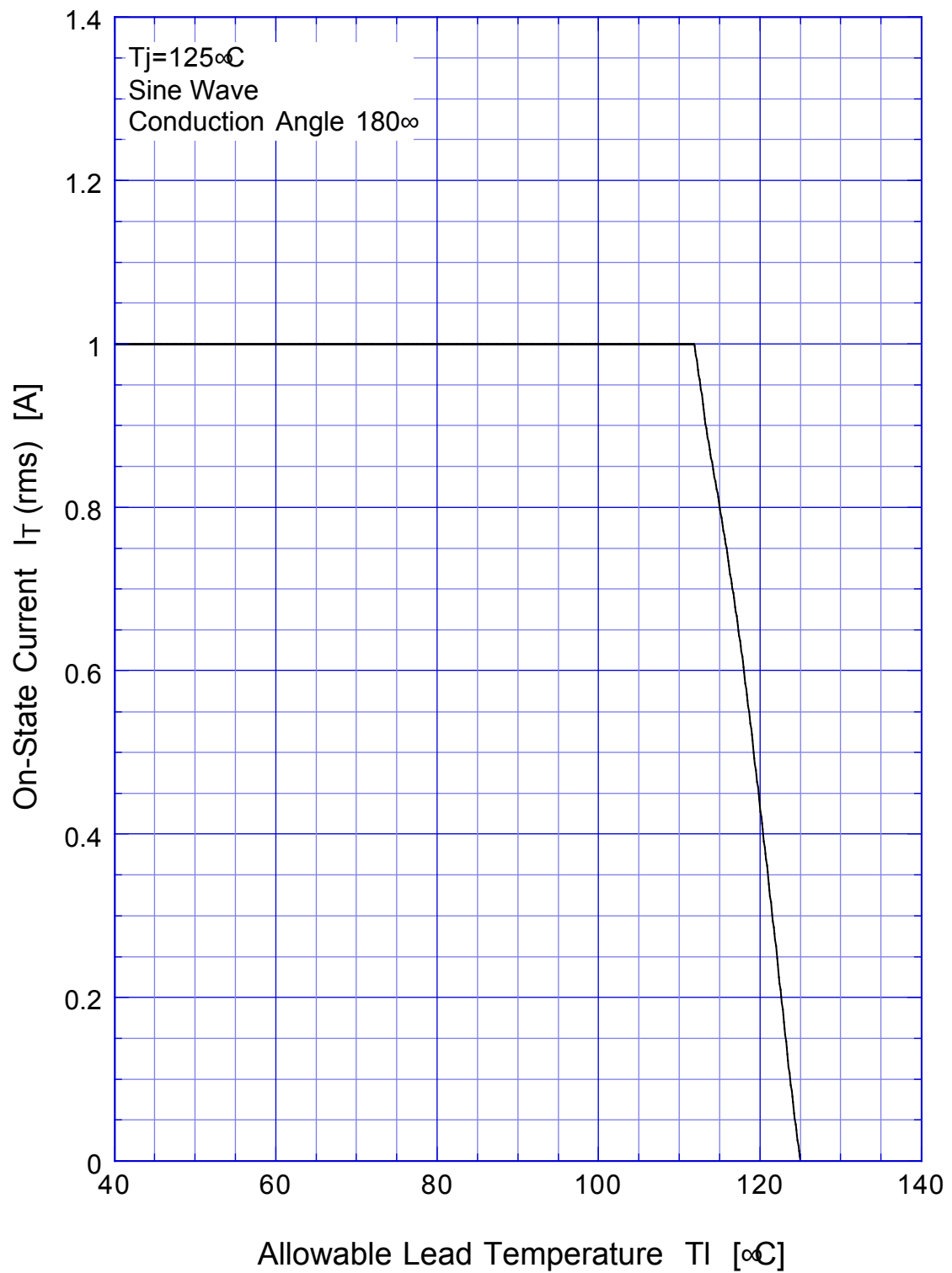


K1V10

K1V11

K1V12

Maximum Lead Temperature

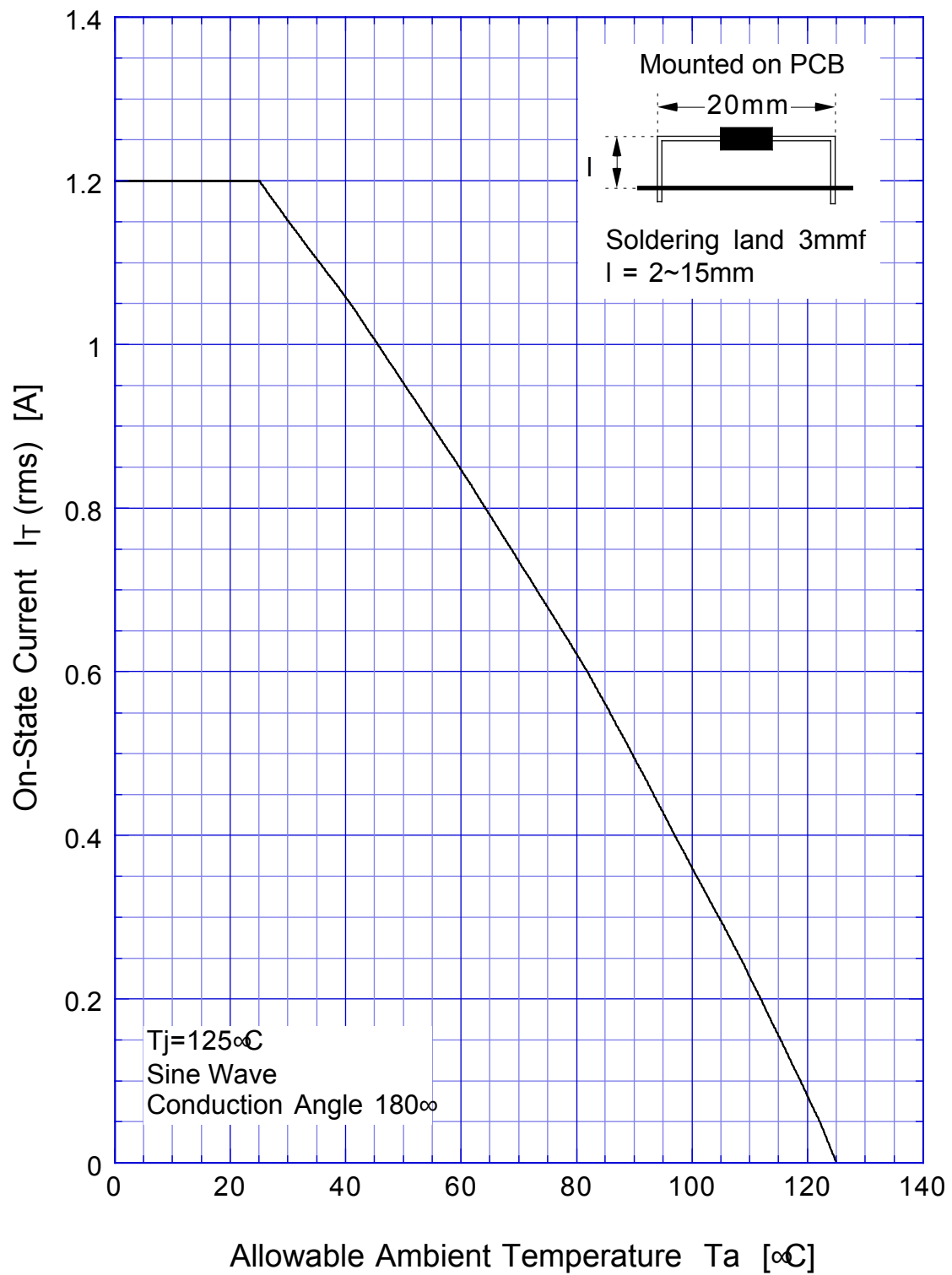


K1V10

K1V11

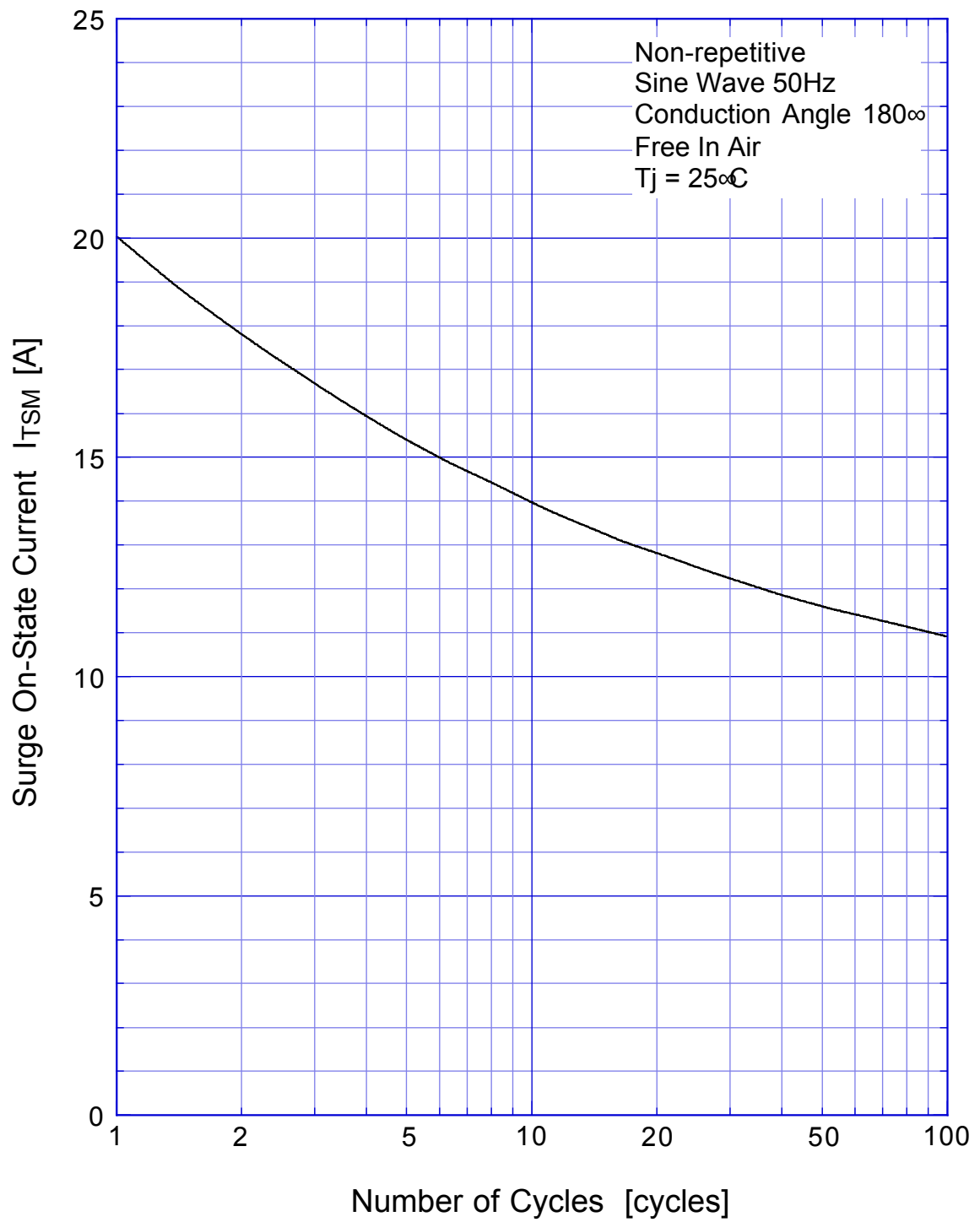
K1V12

Maximum Ambient Temperature



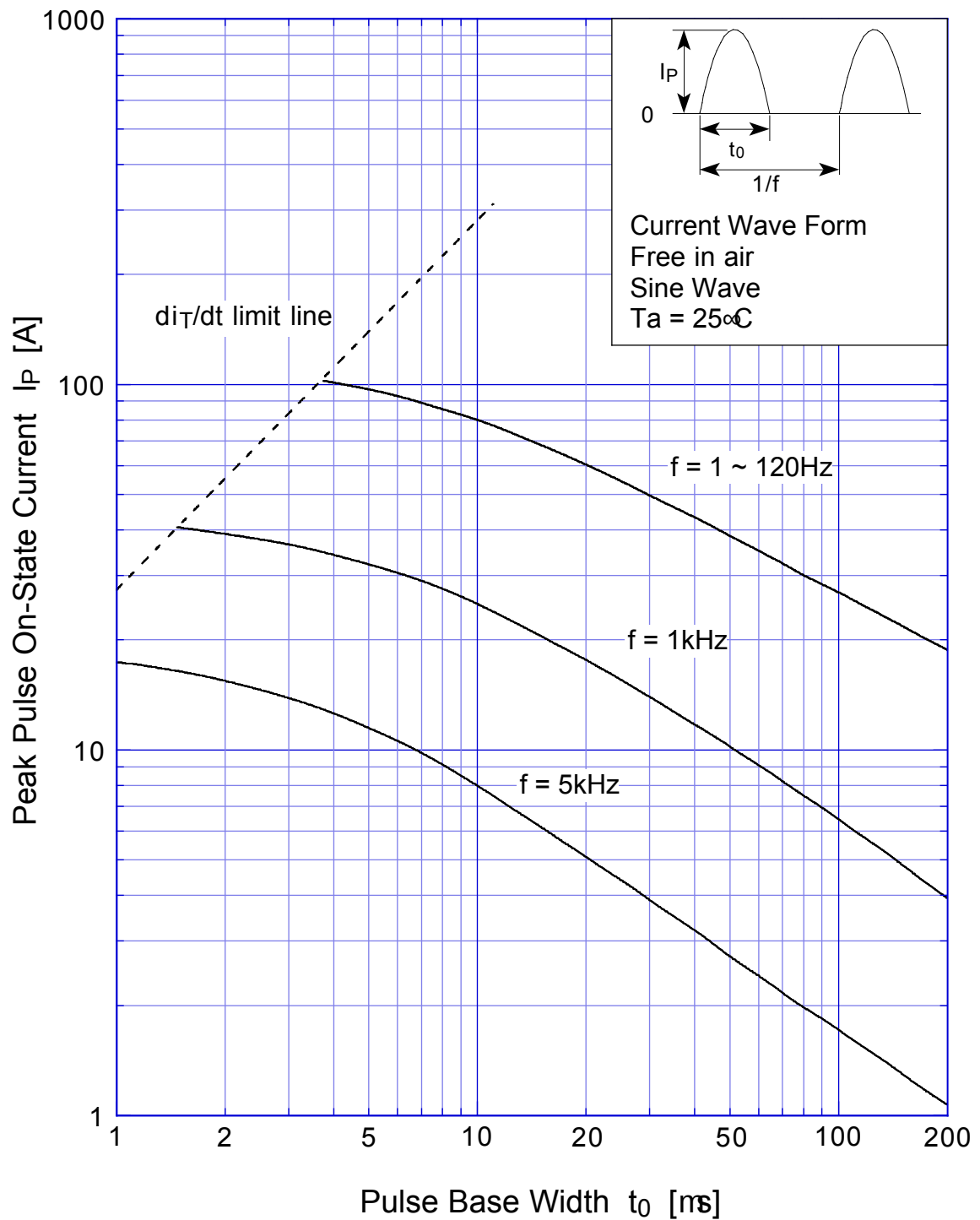
K1V10
K1V11
K1V12

Maximum Surge On-State Current



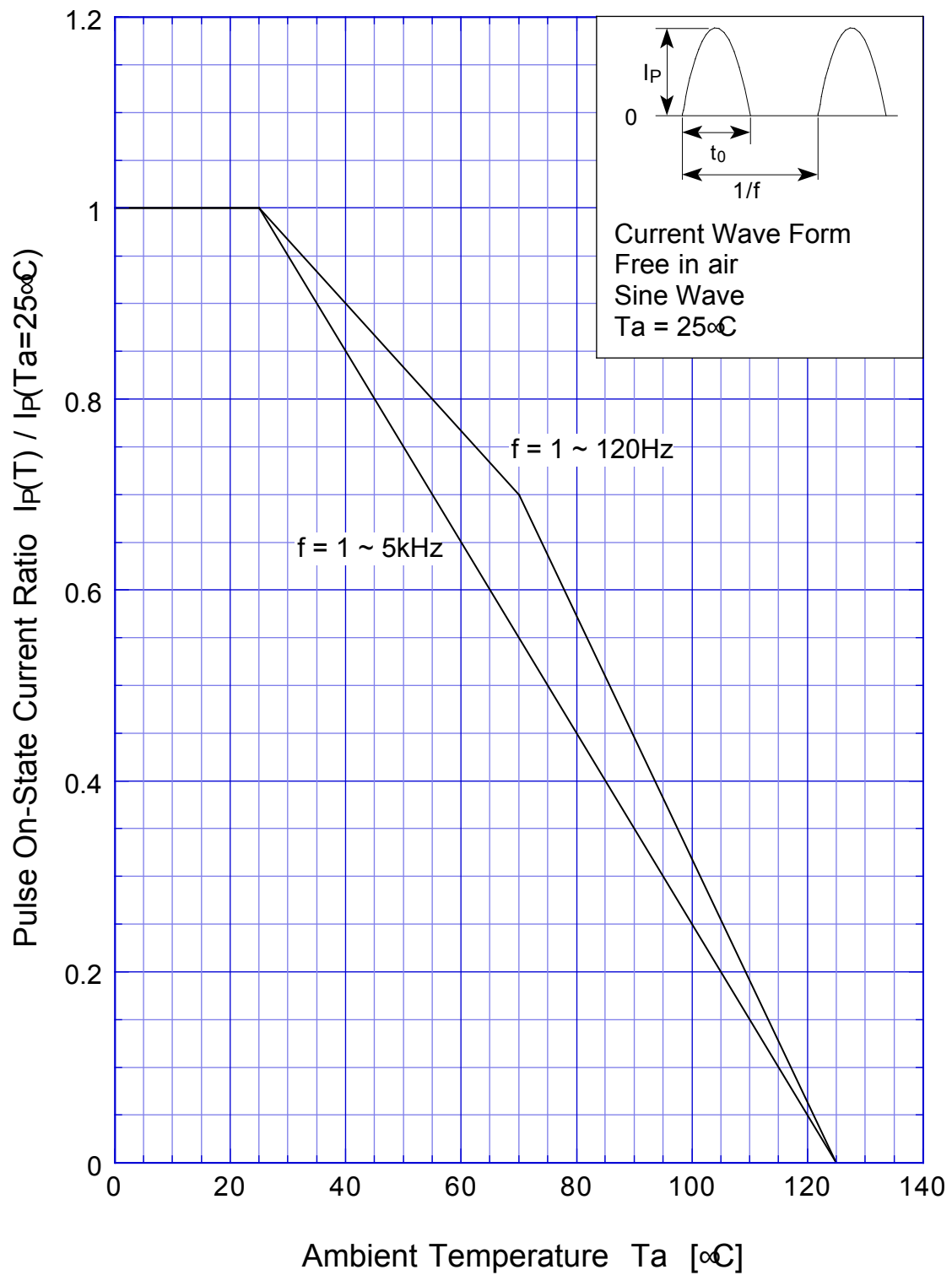
K1V10
K1V11
K1V12

Pulse On-State Current Rating



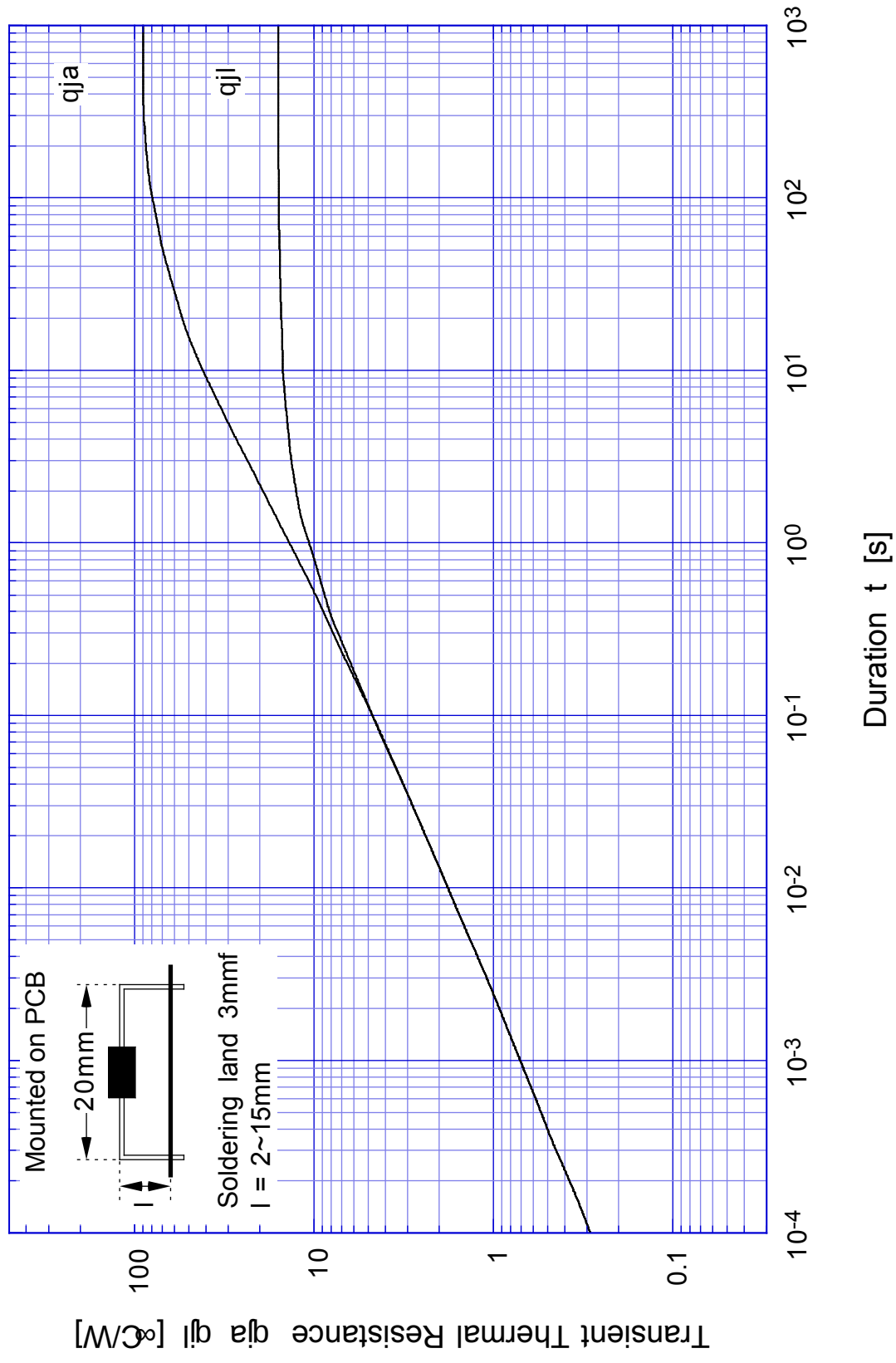
K1V10
K1V11
K1V12

Pulse On-State Current Derating



K1V10
K1V11
K1V12

Transient Thermal Resistance



K1V10

K1V11

K1V12

Breakover Voltage - Junction Temperature

