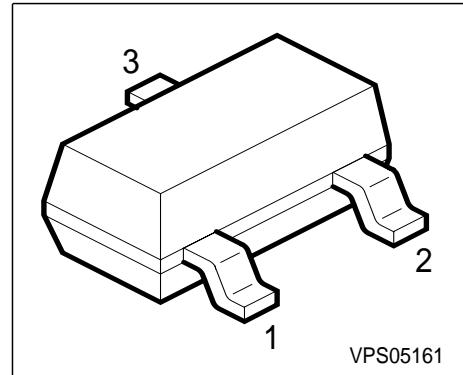


Silicon Schottky Diode

Preliminary data

- Rectifier Schottky diode for modem applications
- High reverse voltage
- For power supply
- For clamping and protection in all high voltage applications



ESD: Electrostatic discharge sensitive device, observe handling precaution!

Type	Marking	Ordering Code	Pin Configuration			Package
BAT 240A	4Ms	Q62702-A1234	1=C1/A2	2 = C2	3 = A1	SOT-23

Maximum Ratings

Parameter	Symbol	Value	Unit
Diode reverse voltage	V_R	240	V
Peak reverse voltage	V_{RM}	250	V
Forward current	I_F	400	mA
Surge forward current ($t \leq 10\text{ms}$)	I_{FSM}	1	A
Total power dissipation, $T_S = 28^\circ\text{C}$	P_{tot}	400	mW
Junction temperature	T_j	80	$^\circ\text{C}$
Storage temperature	T_{stg}	- 55 ...+150	

Maximum Ratings

Junction - ambient 1)	R_{thJA}	≤ 465	K/W
Junction - soldering point	R_{thJS}	≤ 305	

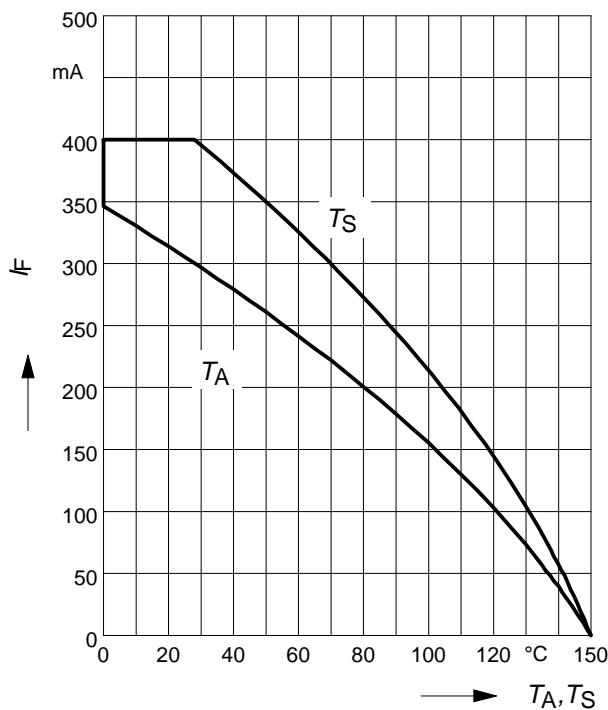
1) Package mounted on epoxy pcb 40mm x 40mm x 1.5mm / 0.5cm² Cu

Electrical Characteristics at $T_A = 25^\circ\text{C}$, unless otherwise specified.

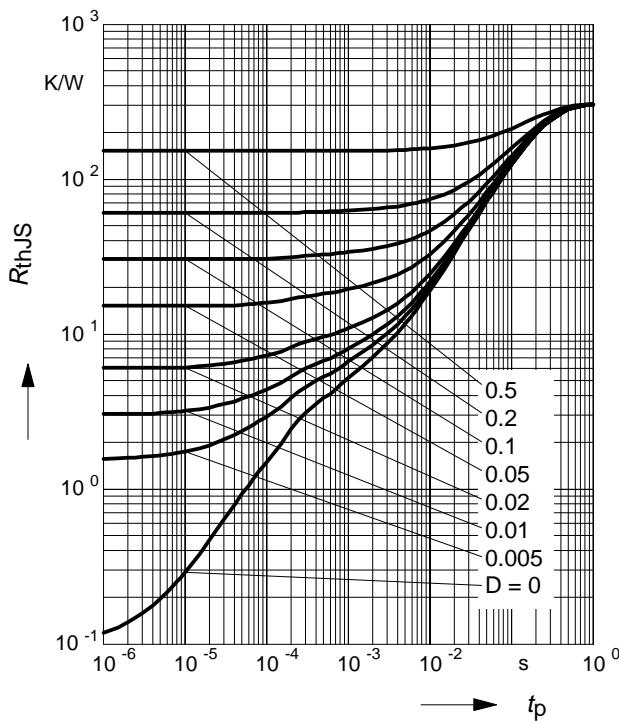
Parameter	Symbol	Values			Unit
		min.	typ.	max.	
DC characteristics					
Breakdown voltage $I_{(\text{BR})} = 500 \mu\text{A}$	$V_{(\text{BR})}$	240	-	-	V
Reverse current $V_R = 200 \text{ V}$ $V_R = 240$	I_R	-	5	-	μA
Forward voltage $I_F = 10 \text{ mA}$ $I_F = 20 \text{ mA}$ $I_F = 50 \text{ mA}$	V_F	-	0.325	-	V
-	-	-	0.37	-	
-	-	-	0.47	-	
AC characteristics					
Diode capacitance $V_R = 10 \text{ V}, f = 1 \text{ MHz}$	C_T	-	11.5	-	pF

Forward current $I_F = f(T_A^*; T_S)$

* Package mounted on epoxy



Permissible Pulse Load $R_{thJS} = f(t_p)$



Permissible Pulse Load

$I_{Fmax} / I_{FDC} = f(t_p)$

