SKKE 310F

SEMIPACK® 2

Fast Diode Module

SKKE 310F

Preliminary Data

Features

- CAL (controlled axial lifetime) technology, patent No. DE 43 10 44
- Heat transfer through ceramic isolated metal baseplate
- Very short recovery times
- Soft recovery
- Low switching losses

Typical Applications

- Self-commutated inverters
- DC choppers
- AC motor speed control
- Inductive heating
- Uninterruptible power supplies
- Electronic welders
- General power switching applications

V_{RSM} V	V_{RRM} V	I_{FRMS} = 455 A (maximum value for continuous operation) I_{FAV} = 310 A (sin. 180; 50Hz; T_c = 84 °C)		
1200	1200	SKKE 310F12		

Symbol	Conditions	Values	Units
I_{FAV}	sin. 180; T_c = 85 (100) °C	308 (260)	A
I_{FSM}	T_{vj} = 25 °C; 10 ms	6500	A
	T_{vj} = 150 °C; 10 ms	5500	A
i²t	T_{vj} = 25 °C; 8,3 ... 10 ms	211000	A²s
	T_{vj} = 150 °C; 8,3 ... 10 ms	151000	A²s
V_F	T_{vj} = 25 °C; I_F = 400 A	max. 2,1	V
$V_{(TO)}$	T_{vj} = 150 °C	max. 1,2	V
r_T	T_{vj} = 150 °C	max. 1,9	mΩ
I_{RD}	T_{vj} = 25 °C; V_{RD} = V_{RRM}	max. 2	mA
I_{RD}	T_{vj} = 150 °C; V_{RD} = V_{RRM}	max. 60	mA
Q_{rr}	T_{vj} = 125 °C, I_F = 400 A,	58	µC
I_{RM}	-di/dt = 4000 A/µs, V_R = 600 V	400	A
t_{rr}		370	ns
E_{rr}		22	mJ
$R_{th(j-c)}$		0,08	K/W
$R_{th(c-s)}$		0,05	K/W
T_{vj}		-40 ... +150	°C
T_{stg}		-40 ... +125	°C
V_{isol}	a. c. 50 Hz; r.m.s.; 1 s / 1 min.	3600 / 3000	V~
M_s	to heatsink	5 ± 15%	Nm
M_t	to terminals	5 ± 15%	Nm
a		5 * 9,81	m/s²
m	approx.	250	g
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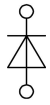

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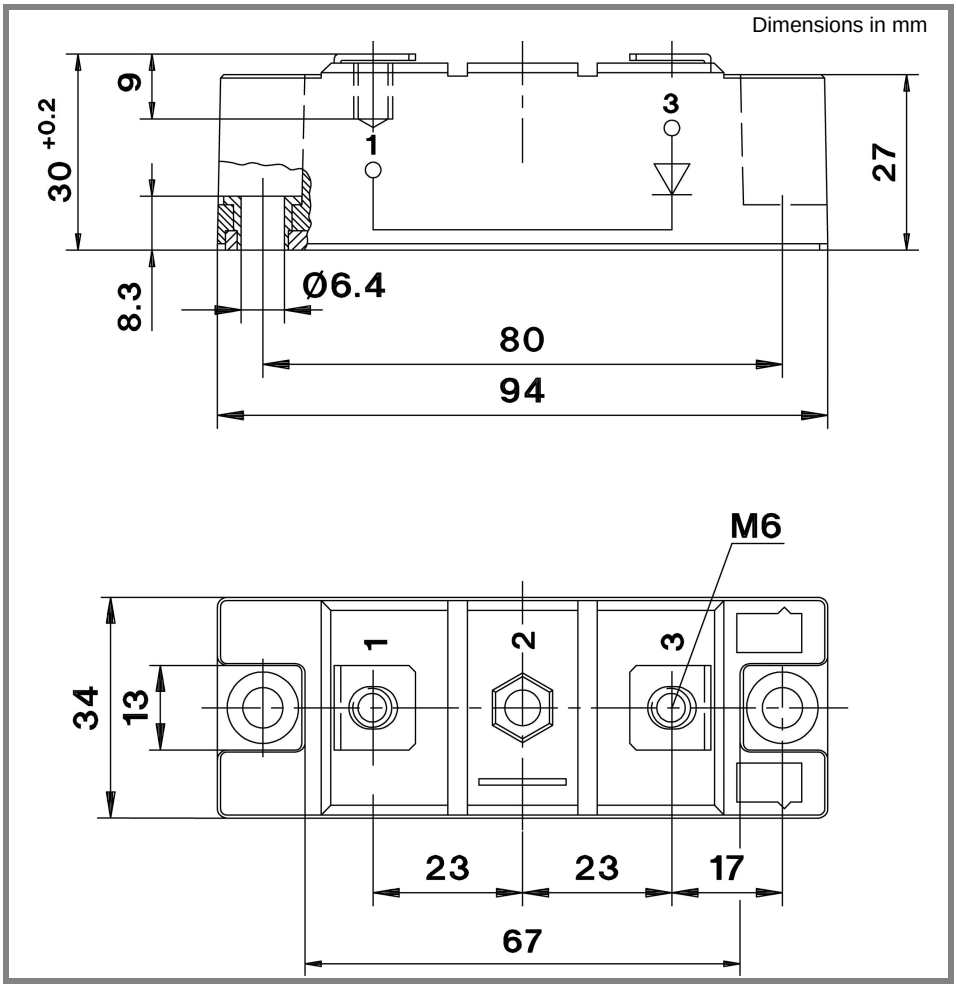

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