# **SKKD 115F**



# SEMIPACK<sup>®</sup> 1

## **Fast Diode Modules**

**SKKD 115F** 

#### **Features**

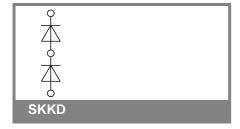
- Heat transfer through ceramic isolated metal baseplate
- Hard soldered joints for high reliability
- UL recognized, file no. E 63 532

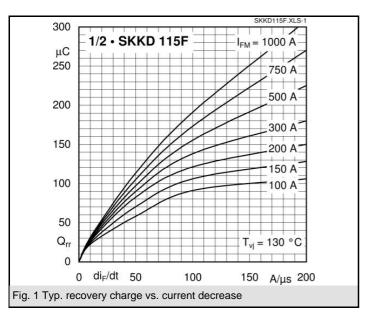
### **Typical Applications**

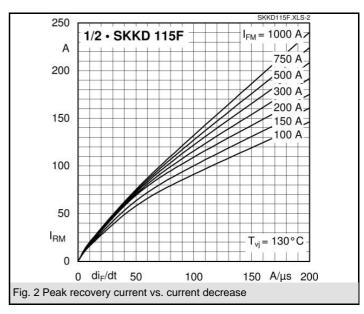
- Self-commutated inverters
- · DC choppers
- · AC motor speed control
- Inductive heating
- Uninterruptible power supplies
- Electronic welders
- General power switching applications

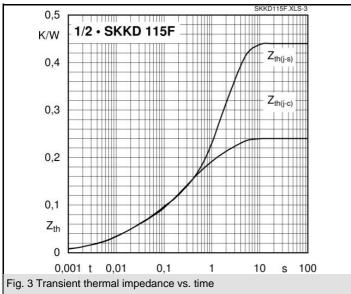
V <sub>RSM</sub>	$V_{RRM}$	I <sub>FRMS</sub> = 200 A (maximum value for continuous operation)	
V	V	$I_{FAV}$ = 115 A (sin. 180; $T_c$ = 83 °C)	
1200	1200	SKKD 115F12	
1400	1400	SKKD 115F14	

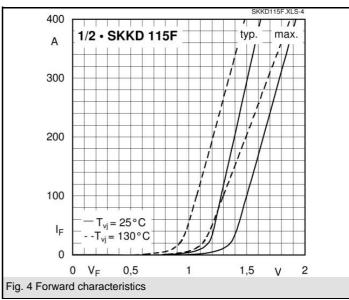
Symbol	Conditions	Values	Units
I <sub>FAV</sub>	sin. 180; T <sub>c</sub> = 85 (100) °C	113 (83)	Α
I <sub>FSM</sub>	T <sub>vi</sub> = 25 °C; 10 ms	2500	Α
	T <sub>vi</sub> = 130 °C; 10 ms	2100	Α
i²t	T <sub>vj</sub> = 25 °C; 8,3 10 ms	31250	A²s
	T <sub>vj</sub> = 130 °C; 8,3 10 ms	22000	A²s
$V_{F}$	T <sub>vi</sub> = 25 °C; I <sub>F</sub> = 300 A	max. 1,8	V
V <sub>(TO)</sub>	T <sub>vi</sub> = 130 °C	max. 1,1	V
r <sub>T</sub>	T <sub>vi</sub> = 130 °C	max. 2	mΩ
$I_{RD}$	$T_{vj}^{3}$ = 25 °C; $V_{RD}$ = $V_{RRM}$	max. 1	mA
I <sub>RD</sub>	$T_{vj}$ = 130 °C; $V_{RD}$ = $V_{RRM}$	max. 30	mA
Q <sub>rr</sub>	T <sub>vi</sub> = 130 °C, I <sub>F</sub> = 100 A,	90	μC
I <sub>RM</sub>	$-di/dt = 50 \text{ A/}\mu\text{s}, V_R = 30 \text{ V}$	90	Α
t <sub>rr</sub>	i i	2000	ns
E <sub>rr</sub>		1,35	mJ
R <sub>th(j-c)</sub>	per diode / per module	0,24 / 0,12	K/W
R <sub>th(c-s)</sub>	per diode / per module	0,2 / 0,1	K/W
T <sub>vj</sub>		- 40 <b>+</b> 130	°C
T <sub>stg</sub>		- 40 <b>+</b> 125	°C
V <sub>isol</sub>	a. c. 50 Hz; r.m.s.; 1 s / 1 min.	3600 / 3000	V~
M <sub>s</sub>	to heatsink	5 ± 15 %	Nm
M <sub>t</sub>	to terminals	3 ± 15 %	Nm
a		5 * 9,81	m/s²
m	approx.	120	g
Case		A 10	

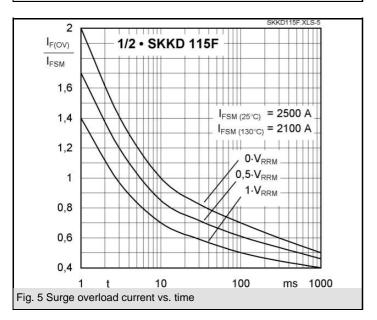




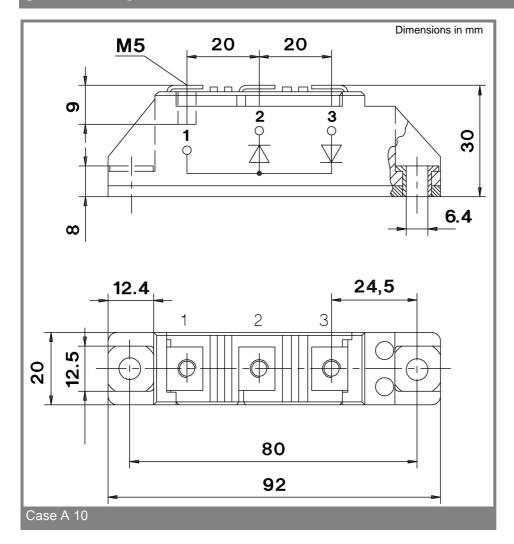








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