SKN 240, SKR 240

Stud Diode

VRSM V	VRRM V	IFRMS = 500 A (maximum value for continuous operation) IFAV = 240 A (sin. 180; T = 122 °C)	
400	400	SKN 240/04	SKR 240/04
800	800	SKN 240/08	SKR 240/08
1200	1200	SKN 240/12	SKR 240/12
1400	1400	SKN 240/14	SKR 240/14
1600	1600	SKN 240/16	SKR 240/16
1800	1800	SKN 240/18	SKR 240/18

Rectifier Diode

IFAV
SKN 240 ID
SKR 240

IFSM

Features

i2t
- Reverse voltages up to 1800 V
- Hermetic metal case with glass insulator

VF
- Cooling via heatsinks
- Threaded stud ISO M16 x 1,5, M20 x 1,52) or ¾ - 16 UNF 2A2)

VT
IRD
- SKN: anode to stud

Qrr
- SKR: cathode to stud

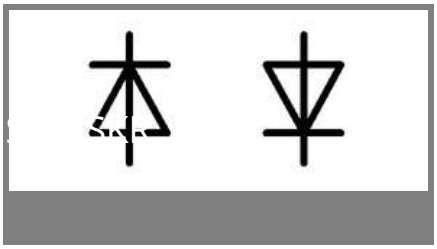
Typical Applications * Tvj

- All purpose high power rectifier Tstg diodes
- Non-controllable and half-Visol controllable rectifiers Ms
- Free-wheeling diodes
- Recommended snubber network:

RC: 0,5 µF, 30 Ω (P = 2W), a R m
Rp: 50 kΩ (PR = 20 W)

1) Mounting with grease-like thermal compound or joint contact compound
2) M16x1,5 is standard, "UNF" should be added in description for ¾ - 16 UNF thread, while "M20" must be added for M20x1,5
3) To include silicone sleeve, "C/ ESPAG." Should be added in description.

Symbol	Condition	Values	Units
	sin. 180 ; TC = 95 °C	320	A
	P 1/120; Ta = 50°C; B2 / B6	279 / 404	A
	P 1/120F; Ta = 40°C; B2 / B6	535 / 762	A
	Tvj = 25° C ; 10 ms	6000	A
	Tvj = 180° C ; 10 ms	5000	A
	Tvj = 25° C ; 8,3...10 ms	180000	A2s
	Tvj = 180° C ; 8,3...10 ms	125000	A2s
	Tvj = 25° C, IF = 750 A	max. 1,4	V
V(TO)	Tvj = 180° C	max. 0,85	V
	Tvj = 180° C	max. 0,6	mΩ
	Tvj = 180° C ; VRD = VRRM	max. 60	mA
	Tvj = 160°C, -diF/dt = 10 A/µs	200	µC
Rth(j-c)		0,2	K/W
Rth(c-s)		0,03	K/W
		-40...+180	°C
Tstg		-55...+180	°C
	M16 or ¾-16 UNF Stud	-	V~
	M20 Stud	30	Nm
	M16 or ¾-16 UNF Stud (lubricated)	40	Nm
	M20 Stud (lubricated)1)	22,5	Nm
	approx. 1)	30	Nm
		5 * 9,81	m/s2
		250	g
Case		E 15	



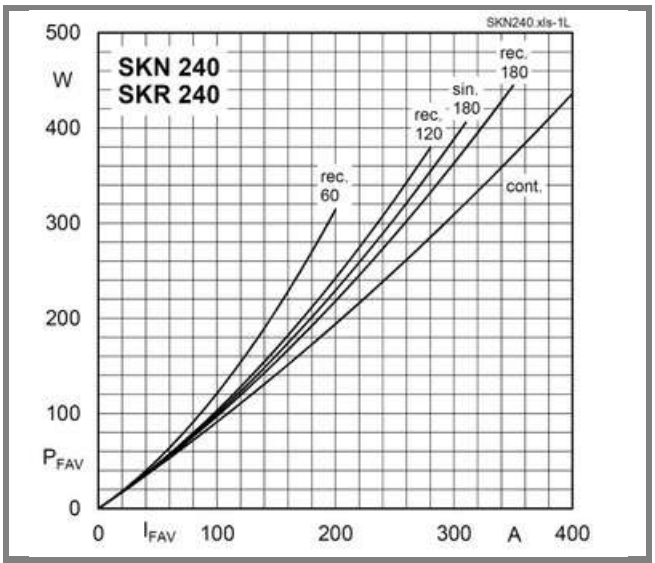


Fig. 1L Power dissipation vs. forward current

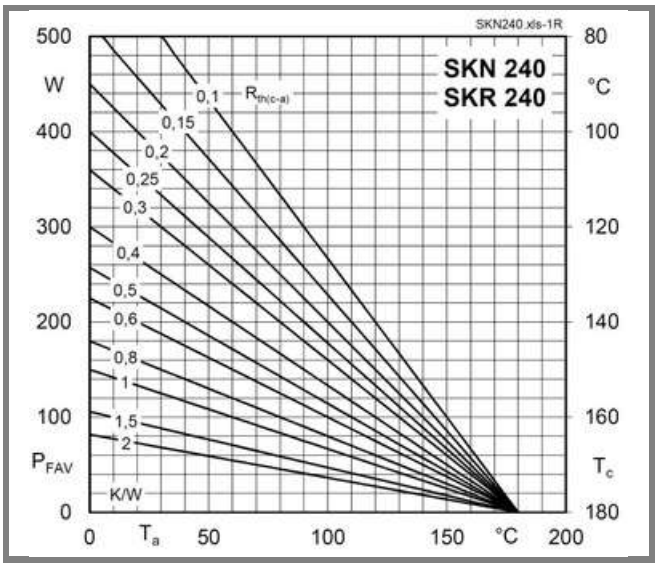


Fig. 1R Power dissipation vs. ambient temperature

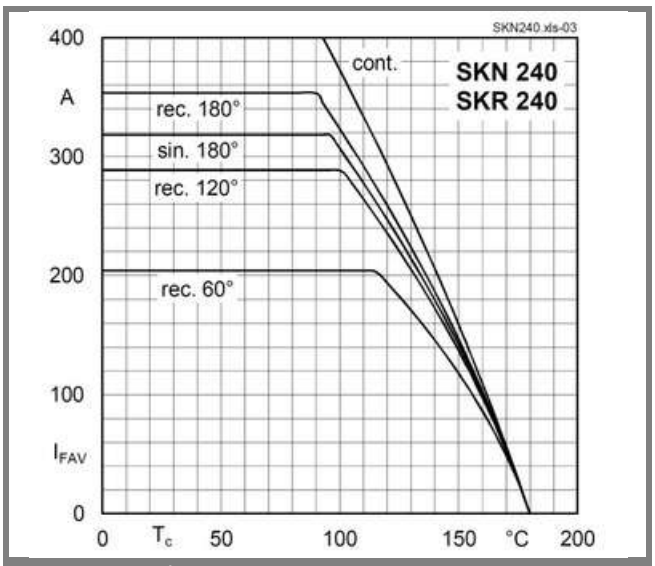


Fig. 3 Forward current vs. case temperature

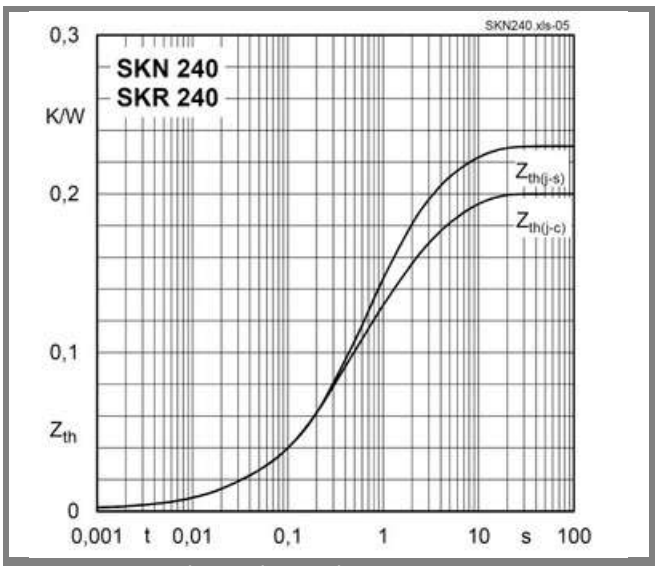


Fig. 5 Transient thermal impedance vs. time

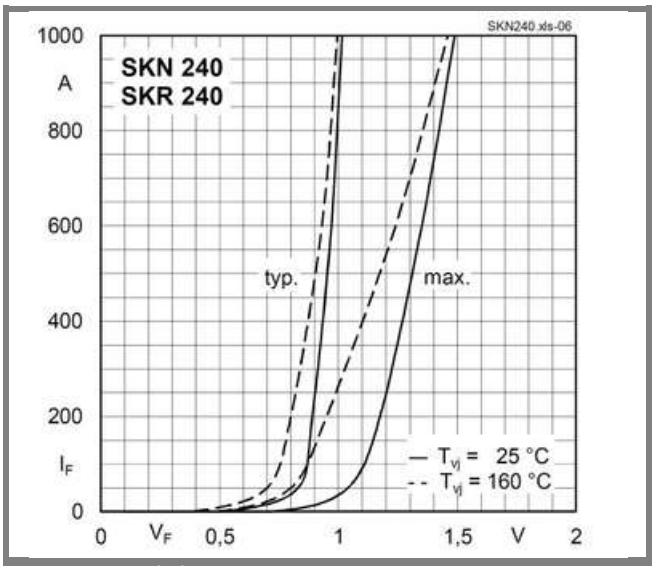


Fig. 6 Forward characteristics

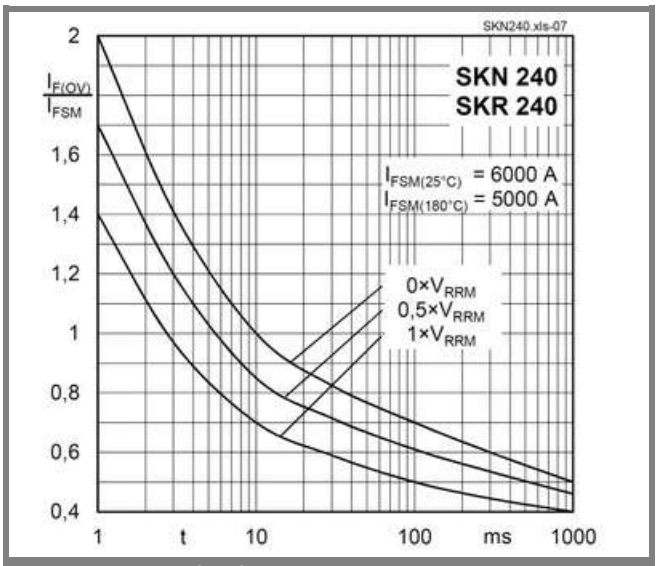
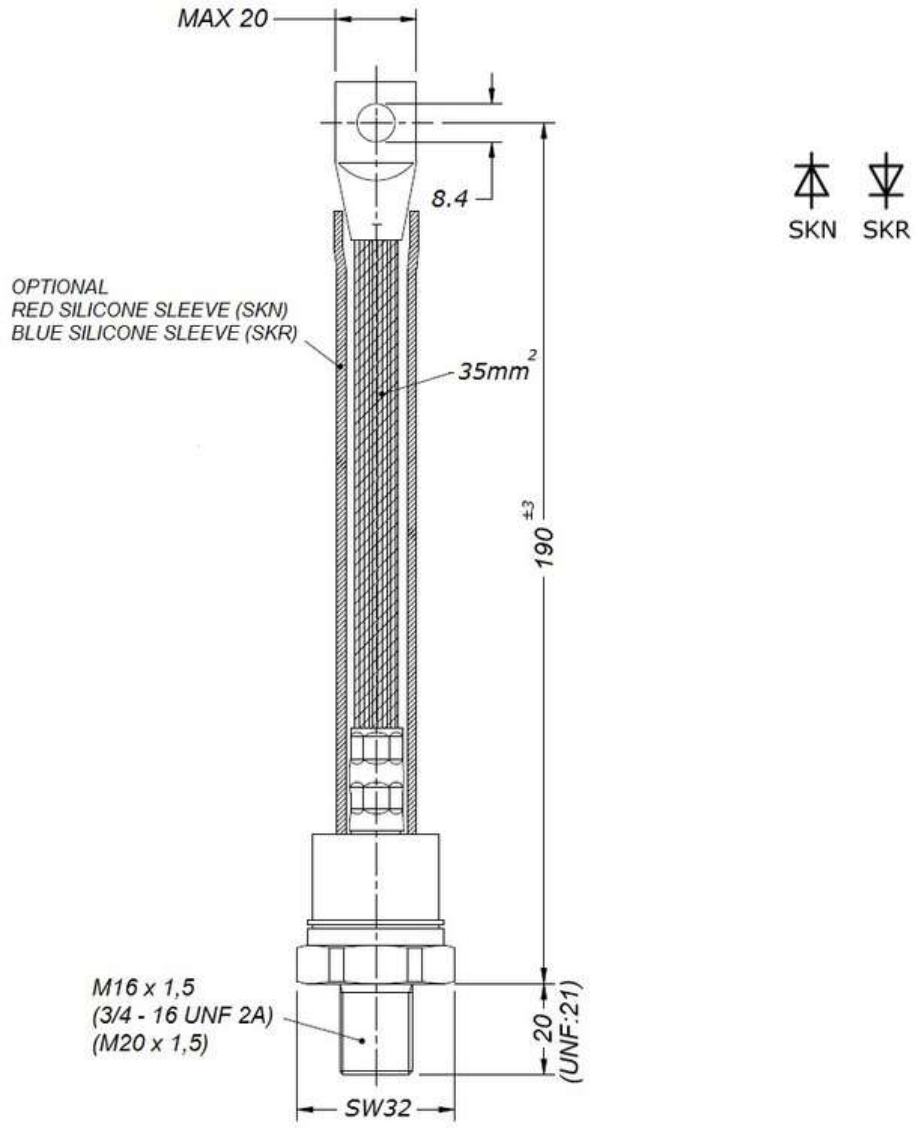


Fig. 7 Surge overload current vs. time

Dimensions in mm



Case E15 (IEC 60191: A 15 M; JEDEC: DO-205 AB)

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