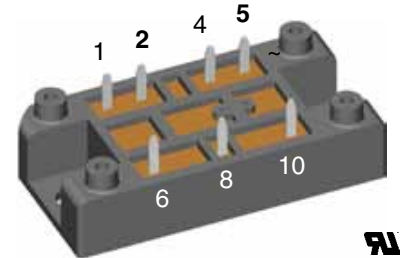
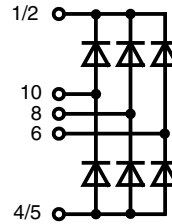


Three Phase Rectifier Bridge

$$I_{dAV} = 55 \text{ A}$$

$$V_{RRM} = 800\text{-}2200 \text{ V}$$

$V_{RSM/DSM}$ V	$V_{RRM/DRM}$ V	Type
900	800	VUO 52-08NO1
1300	1200	VUO 52-12NO1
1500	1400	VUO 52-14NO1
1700	1600	VUO 52-16NO1
1900	1800	VUO 52-18NO1
2100	2000	VUO 52-20NO1
2200	2300	VUO 52-22NO1



Symbol	Conditions	Maximum Ratings
I_{dAV}	$T_C = 90^\circ\text{C}$, module	54 A
I_{dAV}	$T_A = 45^\circ\text{C}$ ($R_{thKA} = 0.5 \text{ K/W}$), module	43 A
I_{dAVM}	module	55 A
I_{FSM}	$T_{VJ} = 45^\circ\text{C}$; $t = 10 \text{ ms}$ (50 Hz)	350 A
	$V_R = 0$; $t = 8.3 \text{ ms}$ (60 Hz)	375 A
	$T_{VJ} = T_{VJM}$; $t = 10 \text{ ms}$ (50 Hz)	305 A
	$V_R = 0$; $t = 8.3 \text{ ms}$ (60 Hz)	325 A
I^2t	$T_{VJ} = 45^\circ\text{C}$; $t = 10 \text{ ms}$ (50 Hz)	615 A ² s
	$V_R = 0$; $t = 8.3 \text{ ms}$ (60 Hz)	590 A ² s
	$T_{VJ} = T_{VJM}$; $t = 10 \text{ ms}$ (50 Hz)	465 A ² s
	$V_R = 0$; $t = 8.3 \text{ ms}$ (60 Hz)	445 A ² s
T_{VJ}		-40...+130 °C
T_{VJM}		130 °C
T_{stg}		-40...+125 °C
V_{ISOL}	50/60 Hz, RMS $t = 1 \text{ min}$	3000 V~
	$I_{ISOL} \leq 1 \text{ mA}$ $t = 1 \text{ s}$	3600 V~
M_d	Mounting torque (M5)	2 - 2.5 Nm
	(10-32 UNF)	18 - 22 lb.in.
Weight	Typ.	35 g

Symbol	Conditions	Characteristic Values
I_R	$V_R = V_{RRM}$ $T_{VJ} = 25^\circ\text{C}$	0.3 mA
	$T_{VJ} = T_{VJM}$	5.0 mA
V_F	$I_F = 55 \text{ A}$ $T_{VJ} = 25^\circ\text{C}$	1.46 V
V_{T0}	For power-loss calculations only	0.8 V
r_t		12.5 mΩ
R_{thJH}	per diode, 120° rect.	1.5 K/W
	per module, 120° rect.	0.25 K/W
d_s	Creeping distance on surface	12.7 mm
d_A	Creepage distance in air	9.4 mm
a	Max. allowable acceleration	50 m/s ²

Data according to IEC 60747 and refer to a single diode unless otherwise stated.

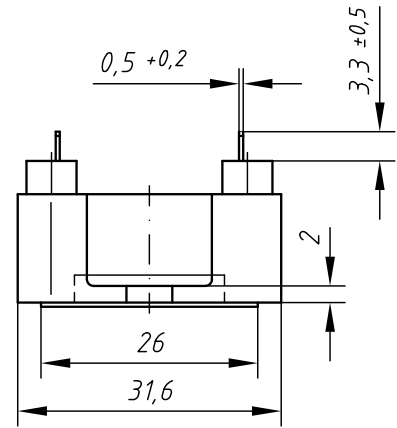
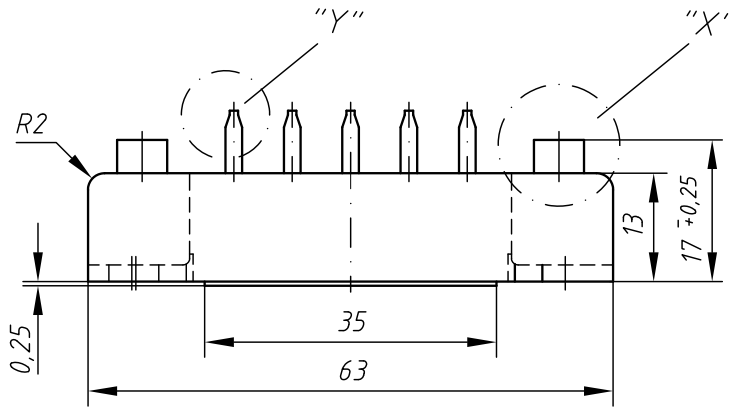
IXYS reserves the right to change limits, test conditions and dimensions.

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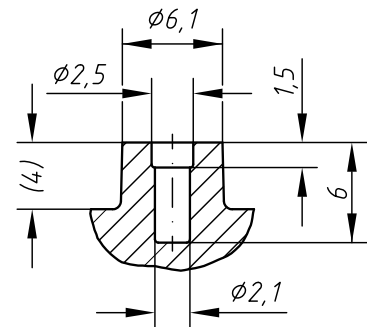
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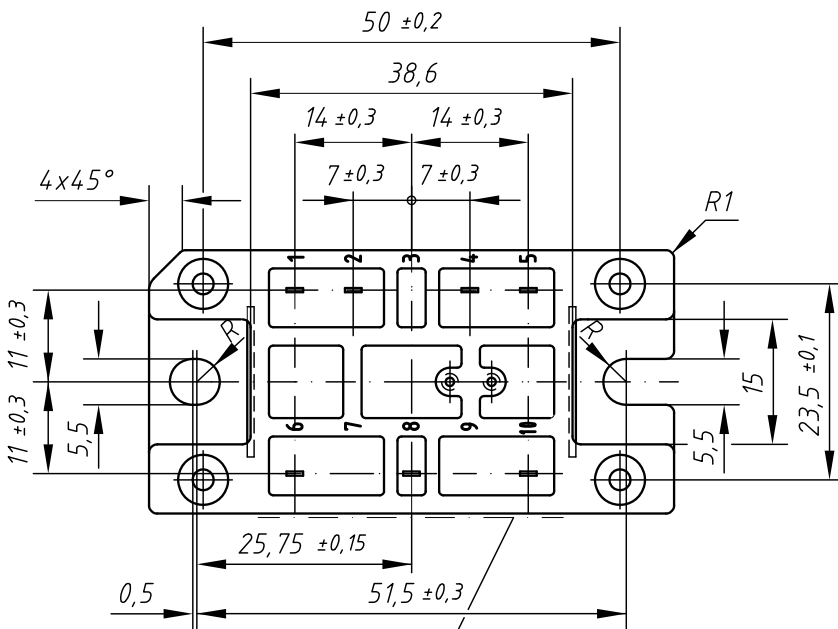
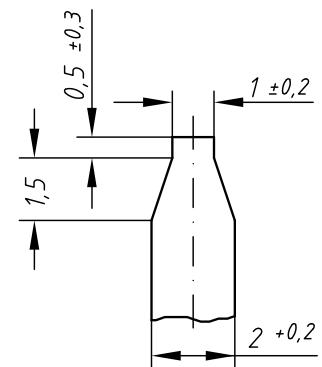
Dimensions in mm (1 mm = 0.0394")



Detail "X" M 2:1



Detail "Y" M 5:1



Aufdruck der Typenbezeichnung
Marking on Product

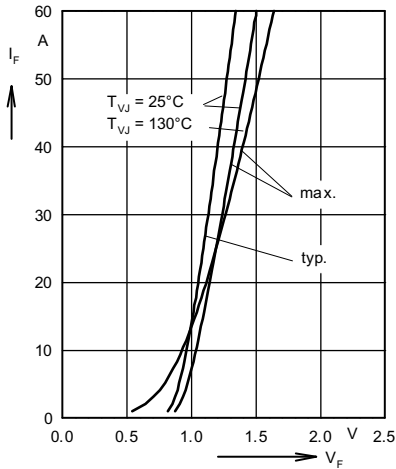


Fig. 1 Forward current versus voltage drop per diode

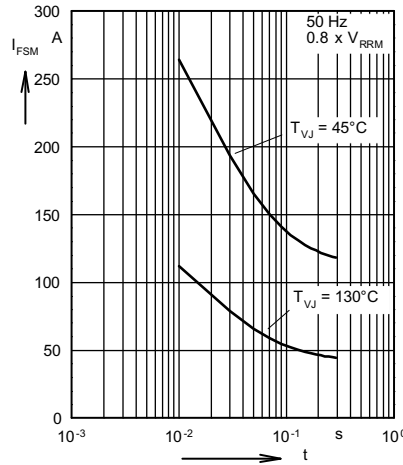


Fig. 2 Surge overload current per diode
I_{FSM}: Crest value. t: duration

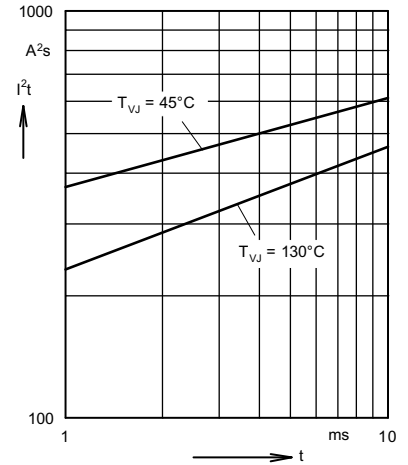


Fig. 3 I²t versus time
(1-10 ms) per diode

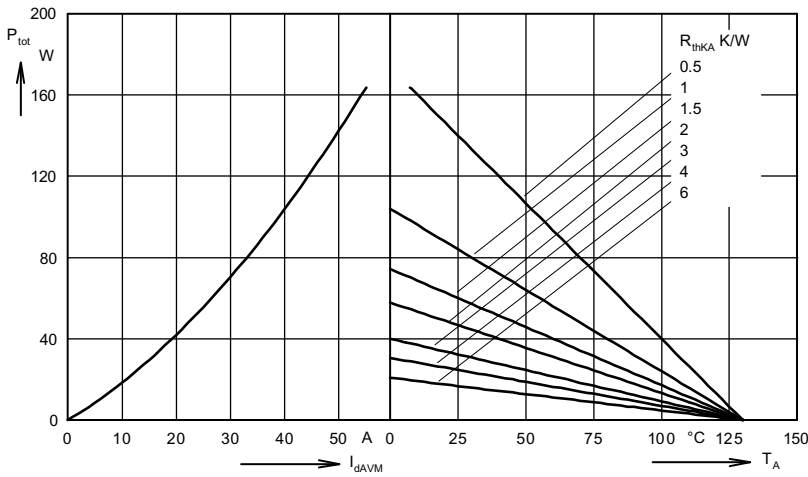


Fig. 4 Power dissipation versus direct output current and ambient temperature

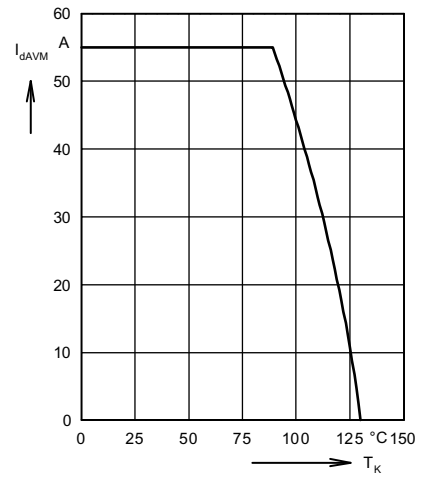


Fig. 5 Maximum forward current at case temperature

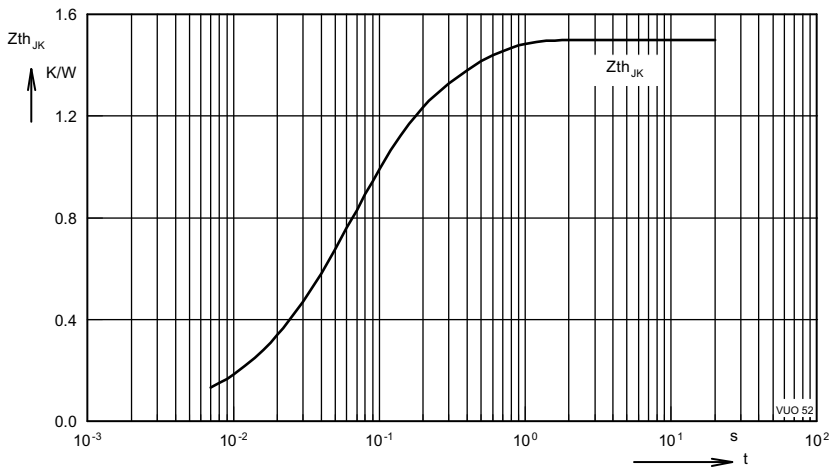


Fig. 6 Transient thermal impedance per diode

Constants for Z_{thJC} calculation:

i	R _{thi} (K/W)	t _i (s)
1	0.005	0.008
2	0.2	0.05
3	0.845	0.06
4	0.45	0.3