

MTS35.16BY

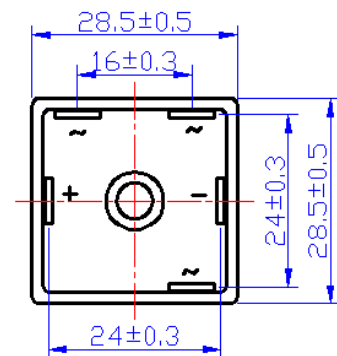
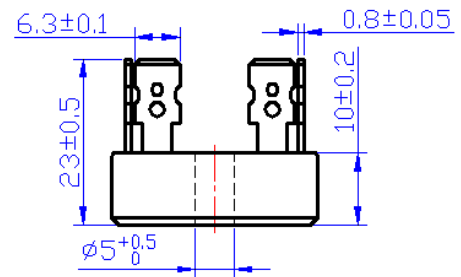
3PH POWER RECTIFIER BRIDGE 35A 1600V

Feature

- Glass-passivated chip ensures high stability
- Low forward voltage drop
- Isolation voltage 2500V ~
- Small volume, light weight
- Low thermal resistance, high heat-conductivity, low temperature rise

Application

- Power supply for DC power device
- Input rectifier for PWM converter
- DC motor
- Rectifying device for frequency convertors with power under/and 2.2KW



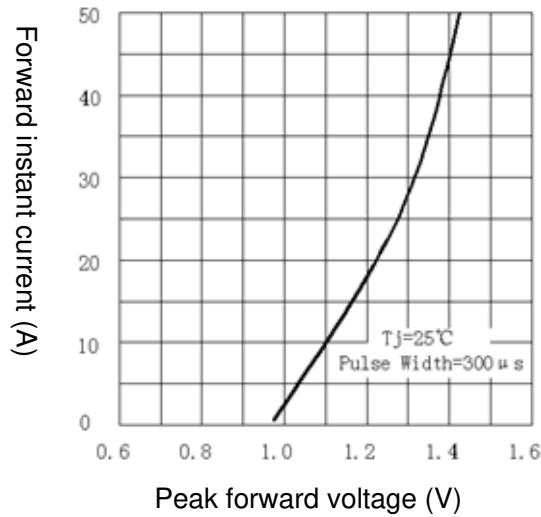
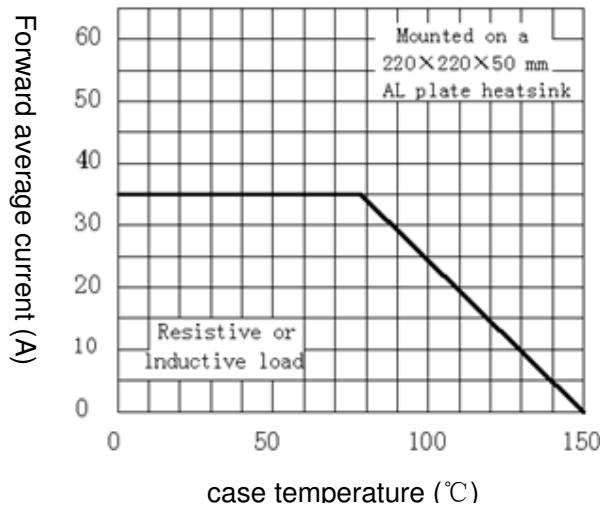
■ Maximum value

Symbol	Parameter	MTS35.16BY	Unit
V_{RRM}	Reverse peak repetitive voltage	1600	V
V_{RSM}	Reverse peak non-repetitive voltage	1700	V

Symbol	Parameter	Test condition	Rating	Unit
$I_F (AV)$	Forward average current	$T_C=78^\circ\text{C}$	35	A
I_{FSM}	Forward surge current	sine wave 50Hz, $t=10\text{ms}$, $T_j=25^\circ\text{C}$	400	A
I^2t	I^2t value		800	A^2S
V_{ISO}	Isolation voltage	50Hz, R.M.S, $t=1\text{min}$, $I_{so}:1\text{mA}(\text{max})$	2500	V
T_j	Operating junction temperature		-40 to +150	$^\circ\text{C}$
T_{jm}	Rated junction temperature		150	$^\circ\text{C}$
T_{stg}	Storage temperature		-40 to +125	$^\circ\text{C}$
M_d	Mounting torque M5		2	$\text{N}\cdot\text{m}$
W_t	Weight		21	g

■ Electrical characteristics

Symbol	Parameter	Test condition	Max value	Unit
I_{RRM}	Peak reverse repetitive current	$V_R=V_{RRM}$, $T_j=25^\circ\text{C}$	5	μA
		$V_R=V_{RRM}$, $T_j=150^\circ\text{C}$	3	mA
V_{FM}	Peak forward voltage	$I_{FM}=17.5\text{A}$, $T_j=25^\circ\text{C}$	1.18	V
$R_{th(j-c)}$	Thermal impedance (junction-case)	Single-sided heat dissipation	0.9	$^\circ\text{C}/\text{W}$

Forward characteristics curve

Case temperature vs forward average current

Forward surge current vs cycles
