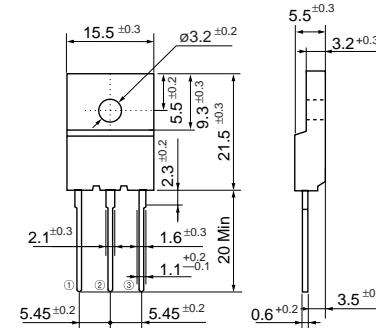


ESAD39M(C,N,D) (10A) (400V to 600V / 10A)

FAST RECOVERY DIODE

■ Outline drawings, mm



JEDEC	—
EIAJ	—

■ Features

- Insulated package by fully molding
- Super high speed switching
- Low VF in turn on
- High reliability

■ Applications

- High speed power switching

■ Maximum ratings and characteristics

- Absolute maximum ratings

Item	Symbol	Conditions	Rating		Unit
			-04	-06	
Repetitive peak reverse voltage	V _{RRM}		400	600	V
Non-repetitive peak reverse voltage	V _{RSM}		400	600	V
Isolating voltage	V _{iso}	Terminals-to-case, AC. 1min.	1500		V
Average output current	I _o	Square wave, duty=1/2, T _c =85°C	10*		A
Surge current	I _{FSM}	Sine wave 10ms	50		A
Operating junction temperature	T _j		-40 to +150		°C
Storage temperature	T _{stg}		-40 to +150		°C

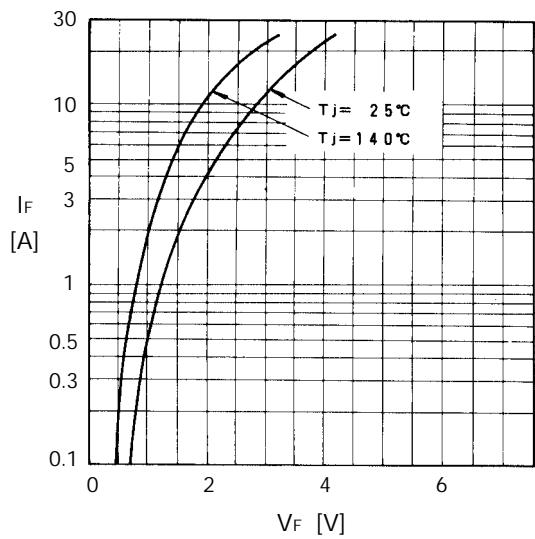
* Average forward current of centertap full wave connection

- Electrical characteristics (Ta=25°C Unless otherwise specified)

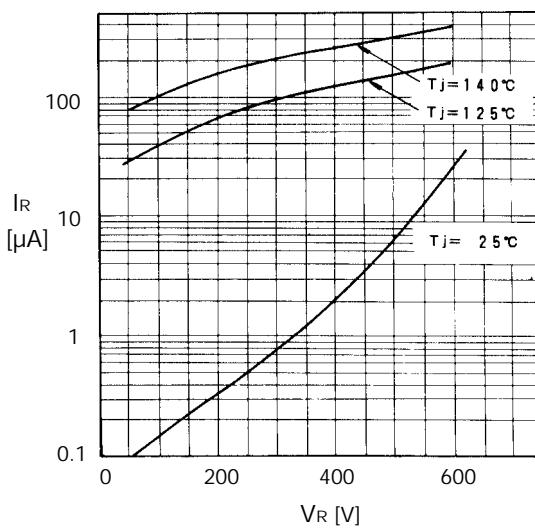
Item	Symbol	Conditions	Max.	Unit
Forward voltage drop	V _{FM}	I _{FM} =4A	2.5	V
Reverse current	I _{RRM}	V _R =V _{RRM}	100	µA
Reverse recovery time	t _{rr}	I _f =0.1A, I _r =0.2A, I _{rec} =0.05A	50	ns
Thermal resistance	R _{th(j-c)}	Junction to case	2.5	°C/W

■ Characteristics

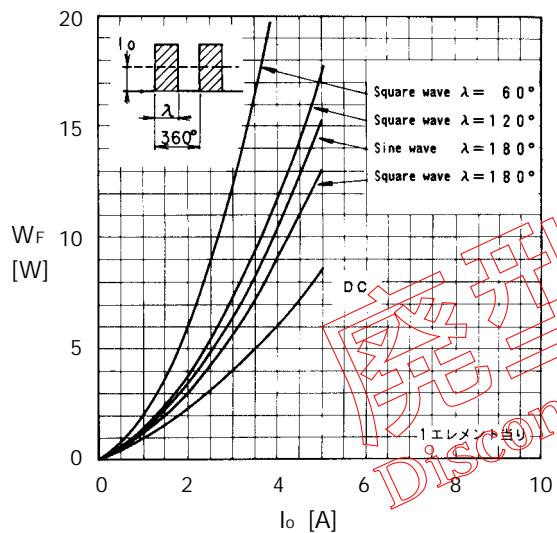
Forward characteristics



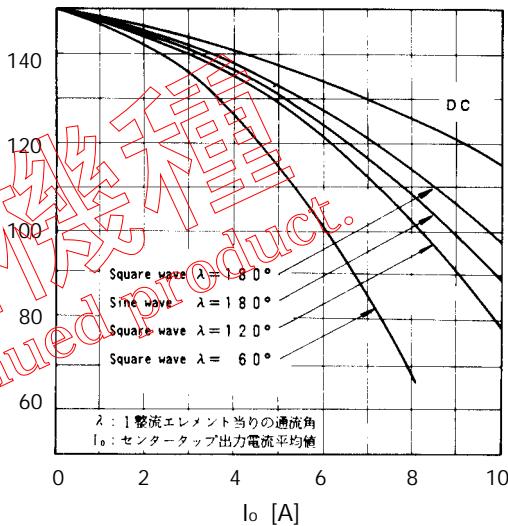
Reverse characteristics



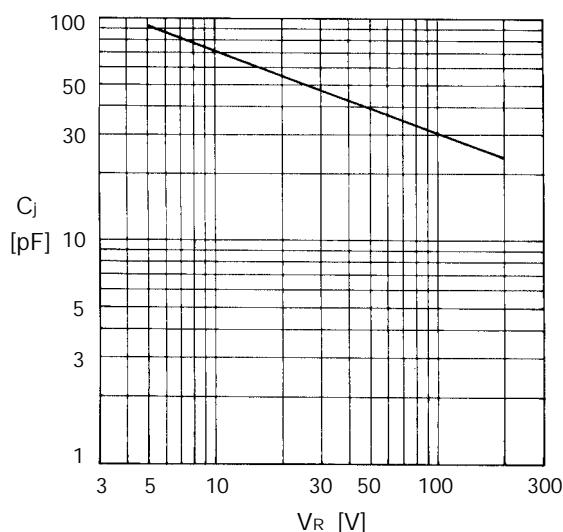
Forward power dissipation



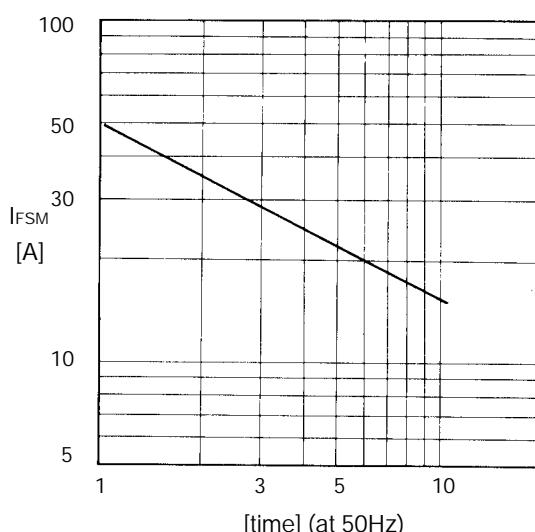
Output current-case temperature



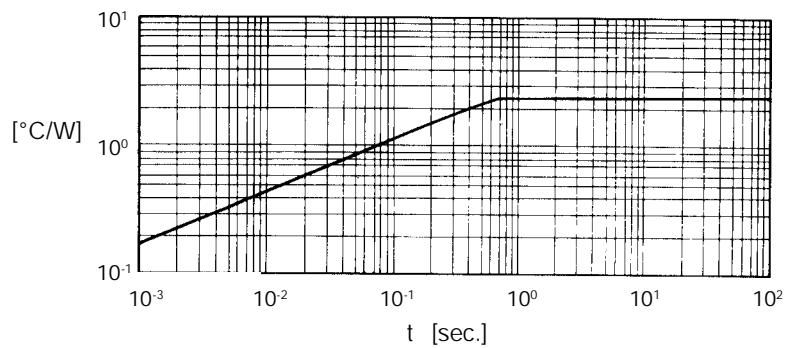
Junction capacitance characteristics



Surge capability



Transient thermal impedance



密型板式
Discontinued product.