

# SHINDENGEN

## Super Fast Recovery Rectifiers

Single

# DF20L60

## 600V 20A

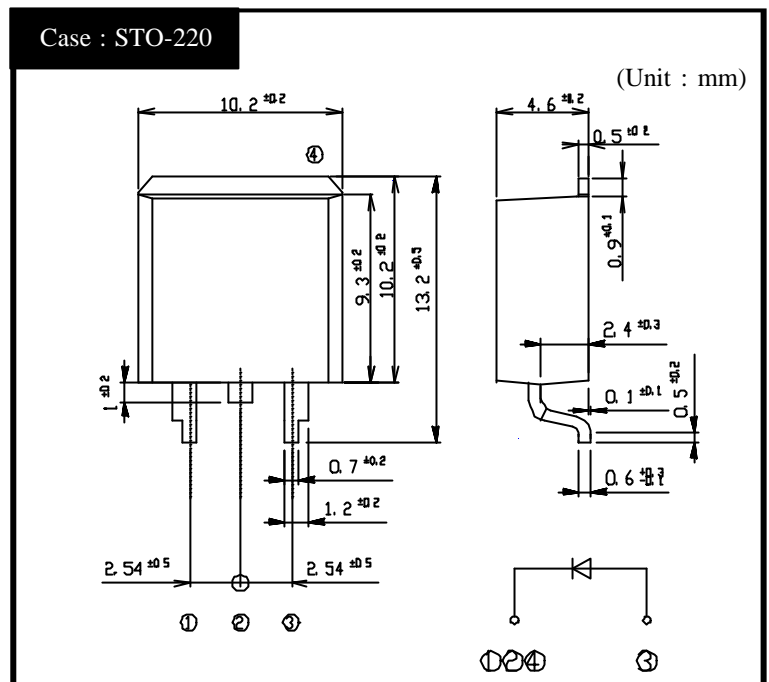
### FEATURES

SMT  
High Voltage  
trr70ns

### APPLICATION

PFC  
Switching power supply  
Free Wheel  
Home Appliances, Office Equipment,  
Factory Automation

### OUTLINE DIMENSIONS



### RATINGS

Absolute Maximum Ratings (If not specified Tc=25 )

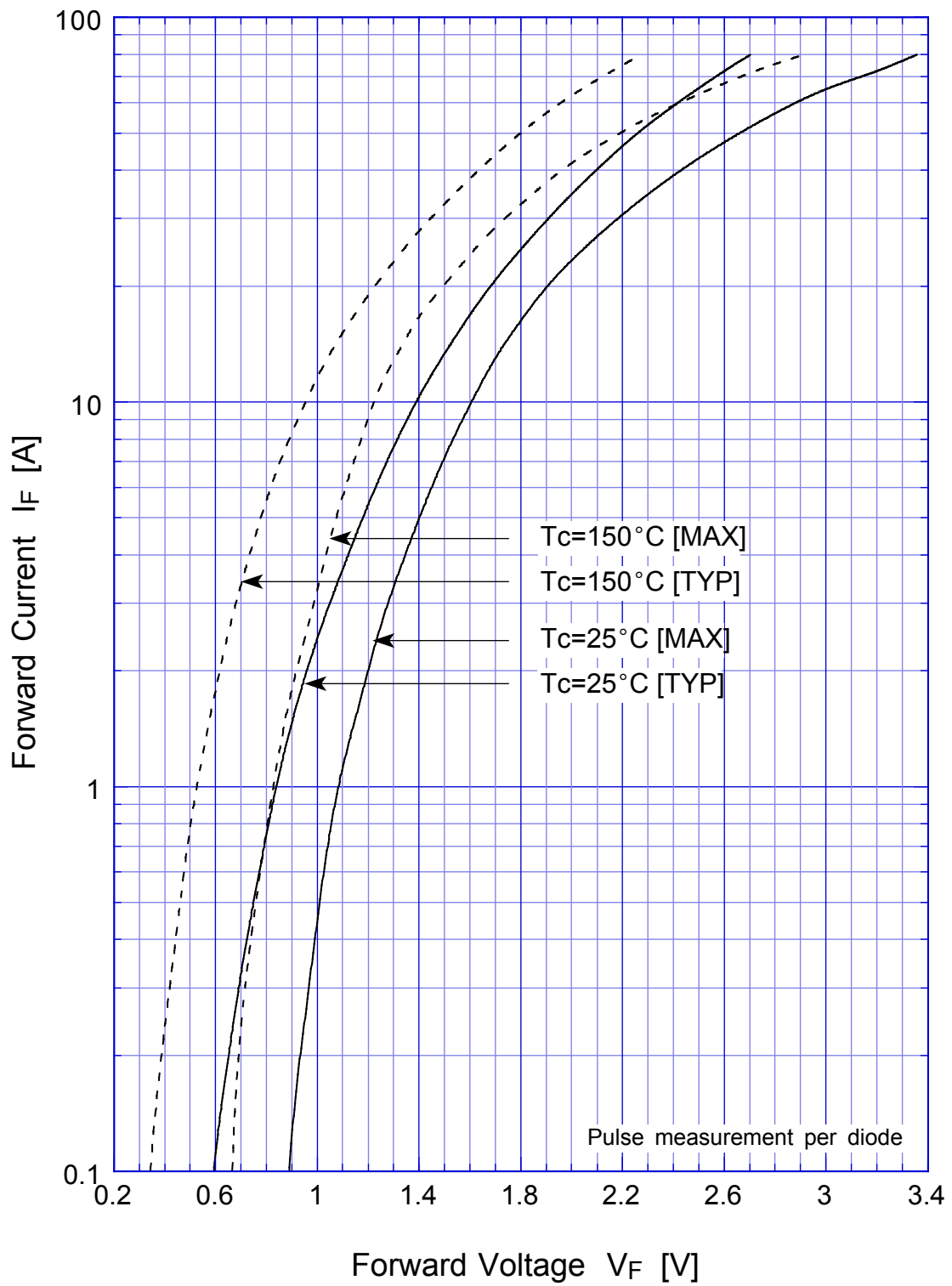
Item	Symbol	Conditions	Ratings	Unit
Storage Temperature	Tstg		-55 ~ 150	
Operating Junction Temperature	Tj		150	
Maximum Reverse Voltage	V <sub>RM</sub>		600	V
Average Rectified Forward Current	I <sub>O</sub>	50Hz sine wave, R-load, Tc=84	20	A
Peak Surge Forward Current	I <sub>FSM</sub>	50Hz sine wave, Non-repetitive 1 cycle peak value, Tj=25	170	A

Electrical Characteristics (If not specified Tc=25 )

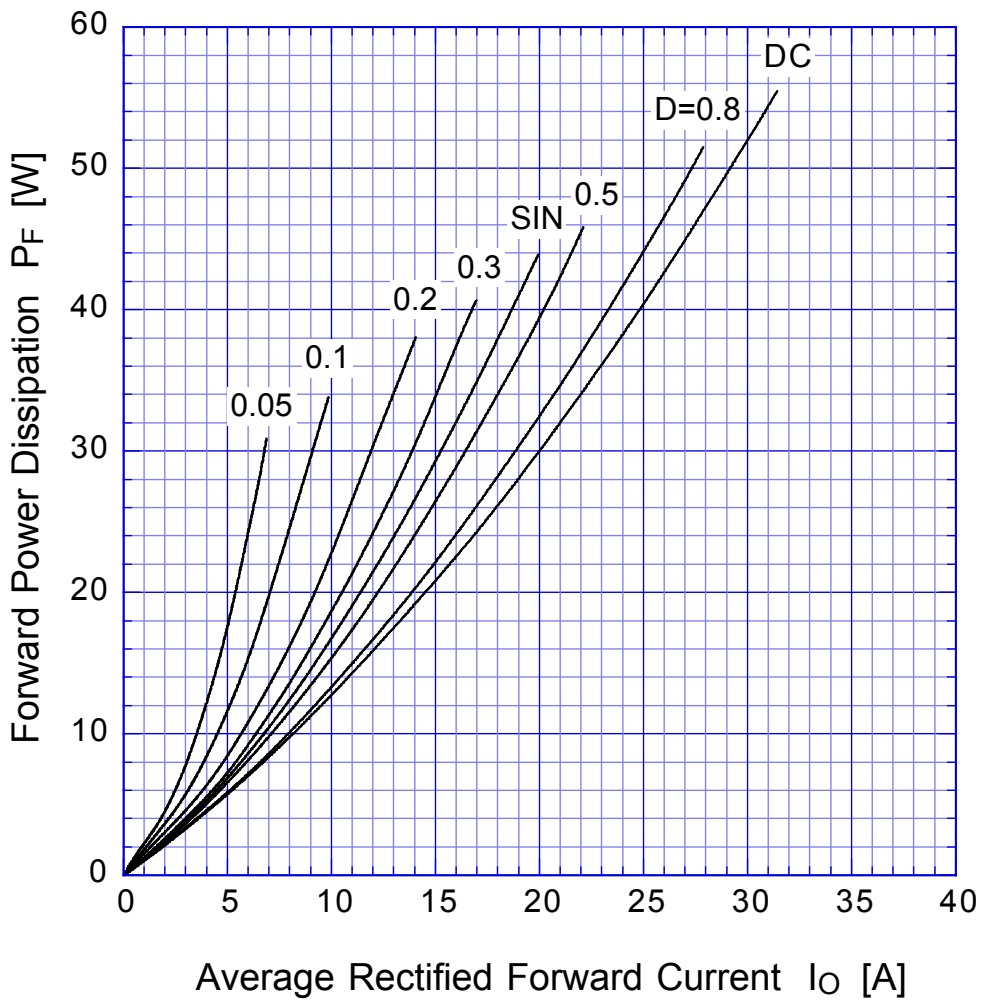
Item	Symbol	Conditions	Ratings	Unit
Forward Voltage	V <sub>F</sub>	I <sub>F</sub> =20A, Pulse measurement	Max.1.9	V
Reverse Current	I <sub>R</sub>	V <sub>R</sub> =V <sub>RM</sub> , Pulse measurement	Max.25	μA
Reverse Recovery Time	t <sub>rr</sub>	I <sub>F</sub> =0.5A, I <sub>R</sub> =1A	Max.70	ns
Thermal Resistance	θ <sub>JC</sub>	junction to case	Max.1.5	/W

# DF20L60

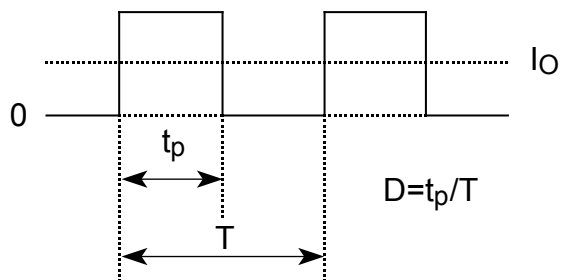
## Forward Voltage



# DF20L60 Forward Power Dissipation

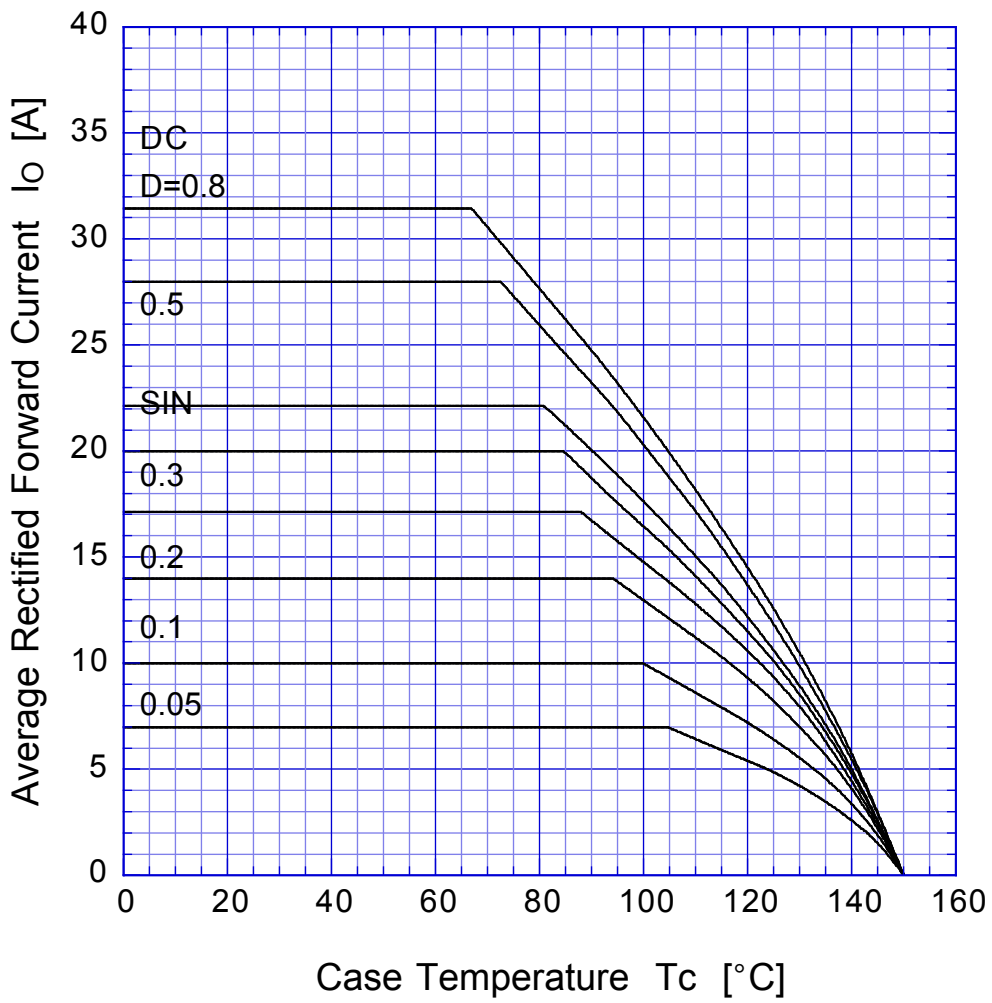


$T_j = T_{jmax}$



# DF20L60

# Derating Curve

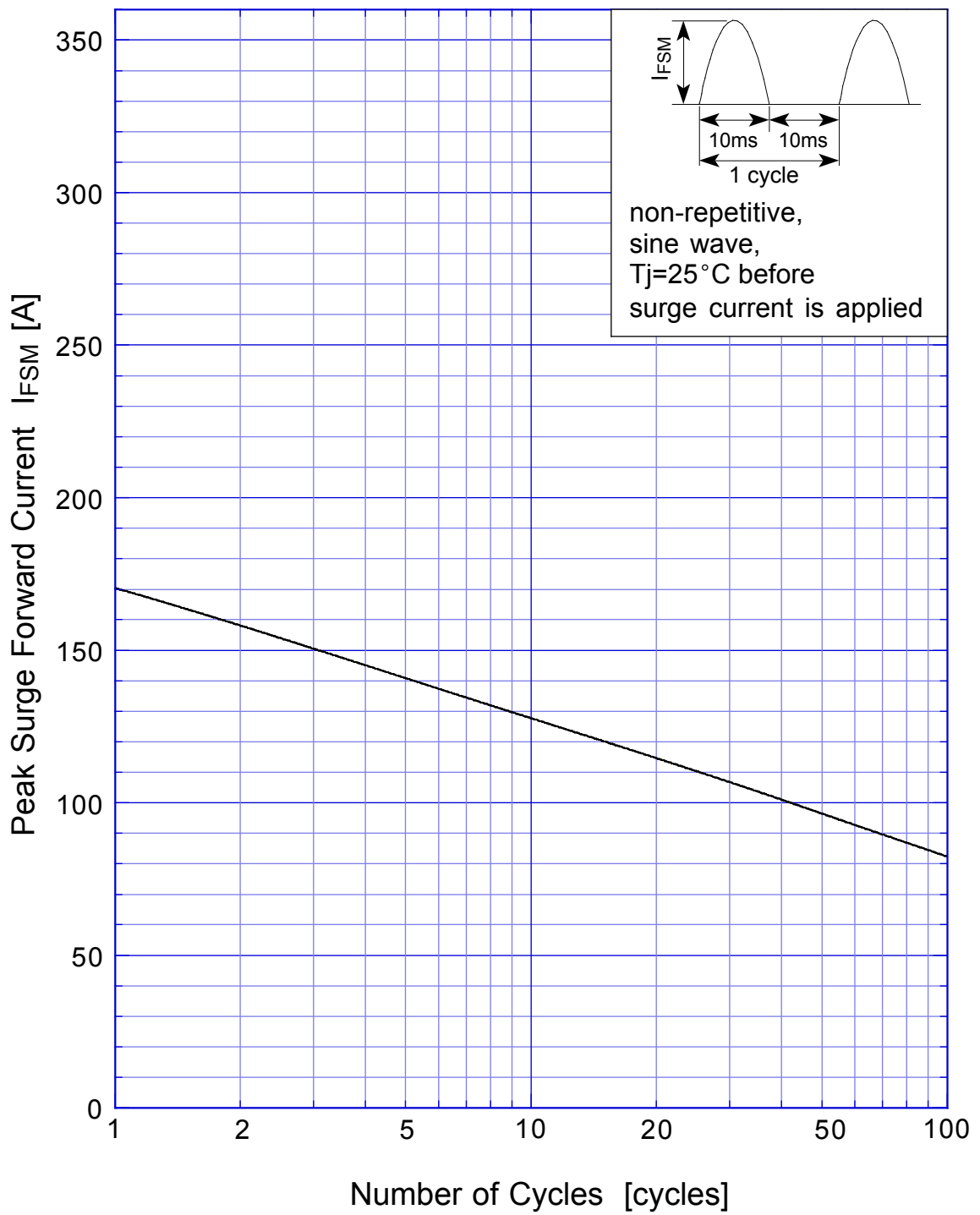


$$V_R = V_{RM}$$



# DF20L60

## Peak Surge Forward Capability



# DF20L60 Junction Capacitance

