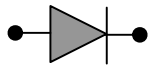
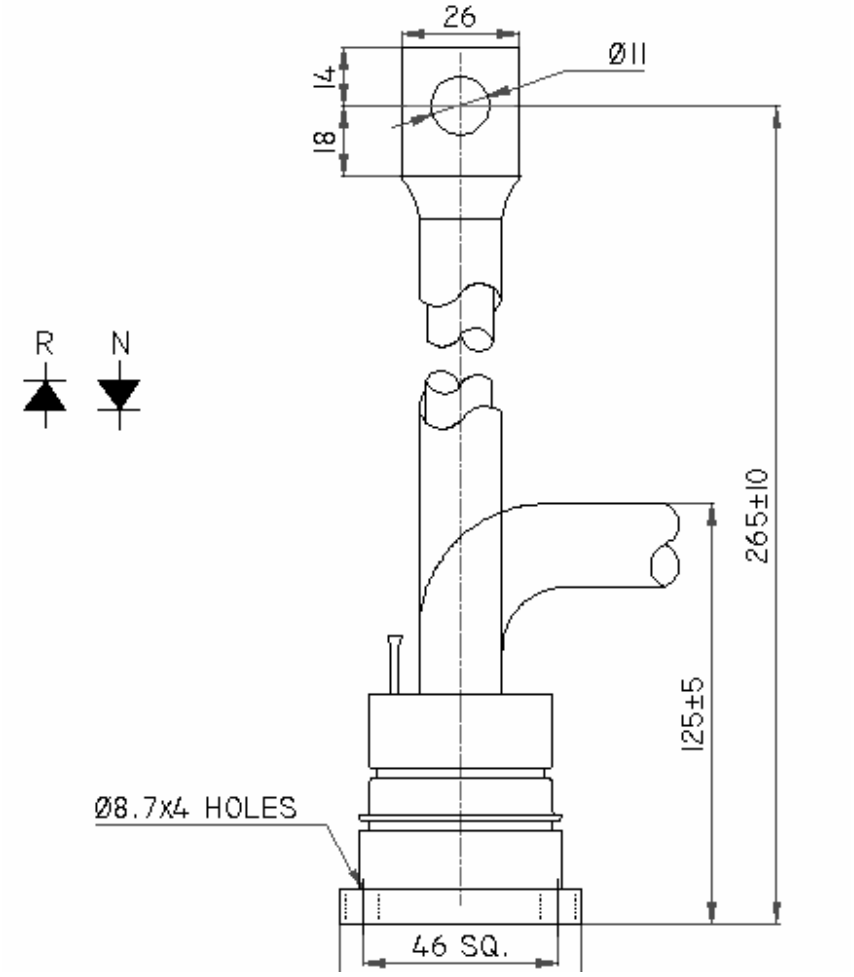
Rectifier Diode SXXHN/HR550

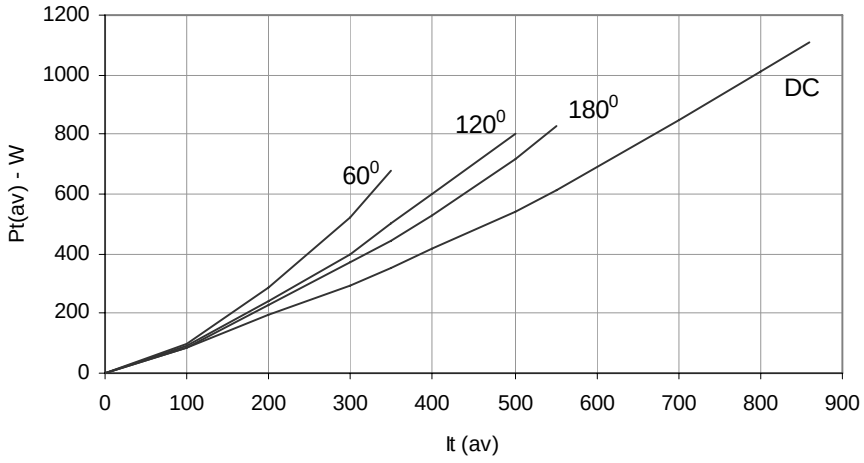


Symbol	Characteristics	Conditions	T_J(^{0}C)	Value	Unit
BLOCKING PARAMETERS					
V_{RRM}	Repetitive peak reverse voltage		160	200-1800	V
I_{RRM}	Repetitive peak reverse current	V = V_{RRM}	160	40	mA
CONDUCTING PARAMETERS					
$I_{F(AV)}$	Average on-state current	180 sine, 50H$_Z$, T_C = 100^{0}C		550	A
I_{RMS}	RMS on-state current			865	A
I_{FSM}	Non repetitive peak surge on-state current	Sine wave, 10mS without reverse voltage	160	12500	A
I^2t	Permissible surge energy			781	kA^2S
V_{FM}	Peak on-state voltage drop	On-state current = 1500A	160	1.65	V
V_0	Typical forward conduction Threshold voltage		160	0.85	V
r_0	Typical forward slope resistance		160	0.50	mΩ
THERMAL & MECHANICAL PARAMETERS					
$R_{TH\ (J-C)}$	Thermal impedance, 180^0 conduction, Sine	Junction to case		0.072	^{0}C/W
$R_{TH\ (C-HK)}$	Thermal impedance	Case to heatsink		0.02	^{0}C/W
T_J	Maximum Permissible junction temperature			160	^{0}C
T_{STG}	Storage temperature range			-40 – 160	^{0}C
F	Mounting Torque			20	NM
W	Weight			875	gms

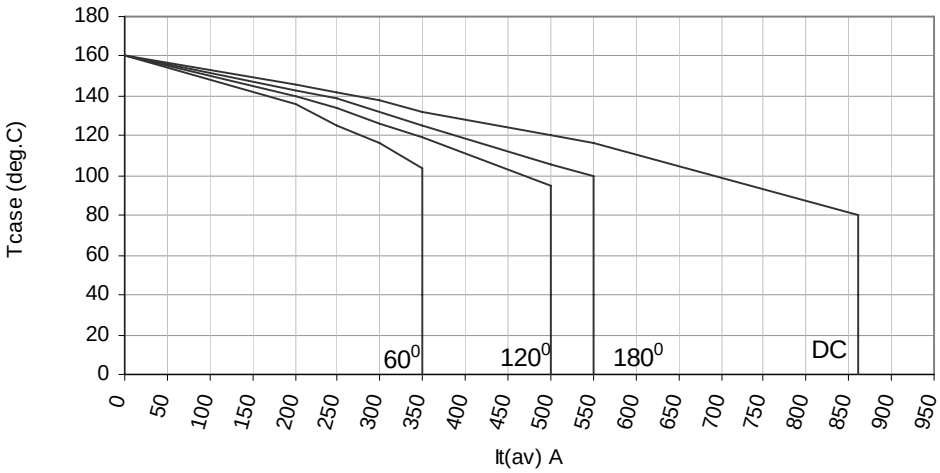


All dimensions in mm

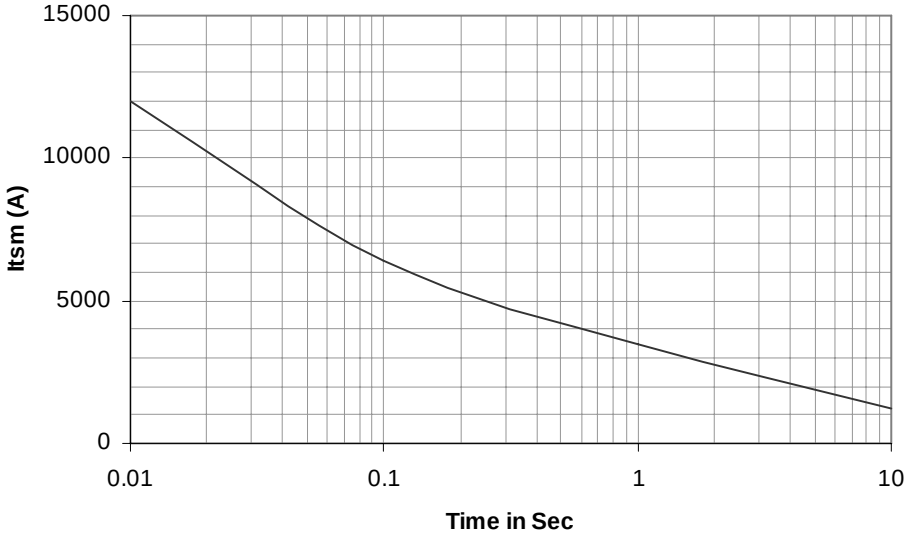
On State Power Loss



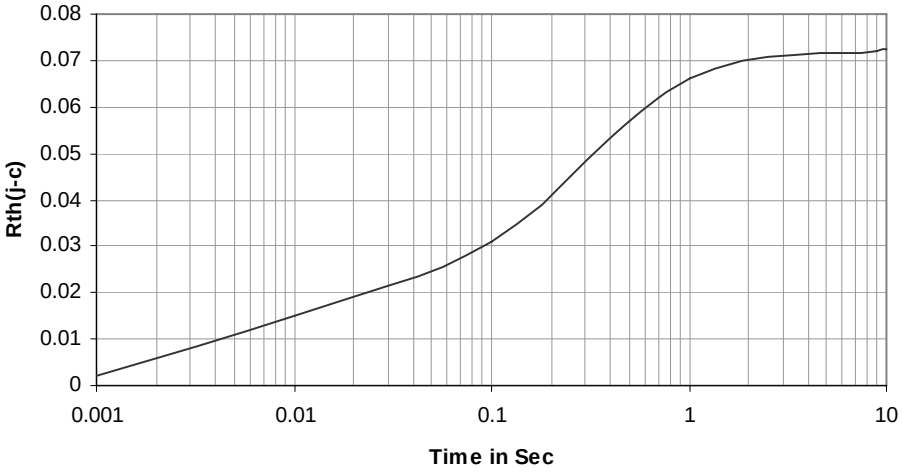
Maximum Permissible Case Temp



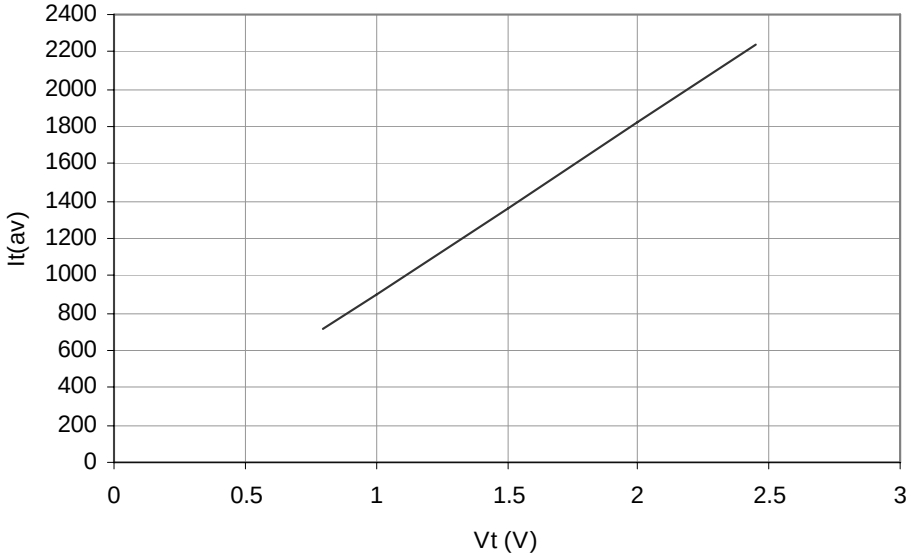
Max non repetitive Surge Current

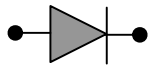


Transient Thermal Impedance Junction to Case



On State Characteristics





Ordering Information: -

S	XX	HN / HR	550
Hirect make Rectifier Diode	V_{RRM} = XX * 100 e.g.12 * 100 =1200V	HN – Normal Polarity HR – Reverse Polarity	$I_{F(AV)}$ = 550A

Hind Rectifiers Ltd reserves the right to change the specifications without notice.

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