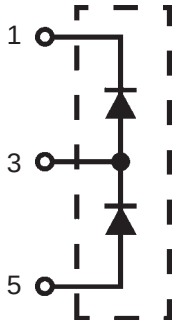
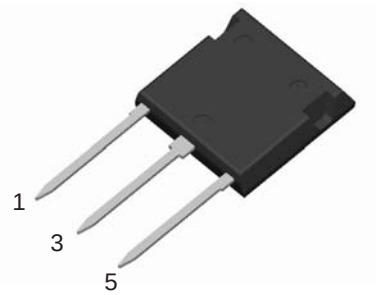
Dual Power Schottky Diode

in ISOPLUS i4-PAC™

FSS 100-008A

V_{RRM} = 80 V
V_F = 0.9 V
$I_{F(AV)M}$ = 90 A





Diodes

Symbol	Conditions		Maximum Ratings	
V_{RRM}			80	V
I_{FAV}	T_C = 90°C; sine 180°		85	A
$I_{F(AV)M}$	T_C = 90°C; d = 0.5 rectangular		90	A
P_{tot}	T_C = 25°C	(per diode)	100	W

Symbol	Conditions	Characteristic Values (T_{VJ} = 25°C, unless otherwise specified) min.	typ.	max.	
V_F	I_F = 75 A; T_{VJ} = 25°C		0.9	1.0	V
	T_{VJ} = 125°C		0.8		V
I_R	$V_R = V_{RRM}$; T_{VJ} = 25°C			2	mA
	T_{VJ} = 125°C		2.5		mA
R_{thJC}	(per diode)			1.4	K/W

Features

- Schottky diodes
  - very low forward voltage
  - extremely fast switching
  - blocking capability optimized for elevated temperature
- ISOPLUS i4-PAC™ package
  - DCB isolated back surface
  - enlarged creepage towards heatsink
  - application friendly pinout
  - low inductive current path
  - high reliability
  - industry standard outline

Applications

- for use in
  - automotive drives and converters
  - hand held tools
  - low voltage power supplies
  - battery chargers
  - solar converters
- operating
  - as free wheeling diode of choppers for supply of motors or transformers
  - as high frequency secondary rectifier
  - anti paralleled to MOSFETs complementing their intrinsic body diode

Recommended replacement:
DSSS 35-008AR

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.

20070605a

Component

Symbol	Conditions	Maximum Ratings	
T_{VJ}		-55...+175	°C
T_{stg}		-55...+125	°C
V_{ISOL}	$I_{ISOL} \leq 1$ mA; 50/60 Hz	2500	V~
F_C	mounting force with clip	20...120	N

Symbol	Conditions	Characteristic Values min.	typ.	max.	
C_P	coupling capacity between shorted pins and mounting tab in the case		40		pF
d_S, d_A	pin - pin	5.5			mm
d_S, d_A	pin - backside metal	5.5			mm
R_{thCH}	with heatsink compound		0.15		K/W
Weight			9		g

Dimensions in mm (1 mm = 0.0394")