

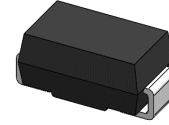
3A,20-60V Schottky Barrier Rectifiers

Features

- Low leakage current
- Schottky barrier diodes
- Low forward voltage drop
- Moisture sensitivity: level 1, per J-STD-020
- Halogen-free according to IEC 61249-2-21 definition
- High temperature soldering guaranteed: 260°C/10 seconds
- AEC-Q101 qualified



RoHS
COMPLIANT



SMA(DO-214AC)

Applications

For use in low voltage, high frequency inverters, free-wheeling and polarity protection application.

Maximum Ratings & Electrical Characteristics (T _A =25°C unless otherwise noted)							
Parameter	Symbol	ASK32A	ASK33A	ASK34A	ASK35A	ASK36A	Unit
Maximum repetitive peak reverse voltage	V _{RRM}	20	30	40	50	60	V
Maximum RMS voltage	V _{RMS}	14	21	28	35	42	V
Maximum DC blocking voltage	V _{DC}	20	30	40	50	60	V
Maximum average forward rectified current	I _{F(AV)}	3					A
Peak forward surge current, 8.3ms single half sine-wave superimposed on rated load per diode	I _{FSM}	100					A
Operating junction temperature range	T _J	-55 to +125			-55 to +150		°C
Storage temperature range	T _{STG}	-55 to +150					°C

Thermal-Mechanical Specifications (T _A =25°C unless otherwise noted)			
Parameter	Symbol	Typ	Unit
Thermal Resistance, Junction to Ambient	R _{θJA}	90	°C / W
Thermal Resistance, Junction to Case	R _{θJC}	20	°C / W
Thermal Resistance, Junction to Lead	R _{θJL}	25	°C / W



ASK32A thru ASK36A

GOOD-ARK Electronics

Electrical Specifications ($T_A=25^{\circ}\text{C}$ unless otherwise noted)

Parameter	Symbol	Test Conditions	ASK32A	ASK33A	ASK34A	ASK35A	ASK36A	Unit
Forward Drop Voltage	V_F	$I_F=3\text{A}$	0.50			0.70		V
Reverse leakage current @ V_R	I_R	$T_J=25^{\circ}\text{C}$	0.20			0.15		mA
		$T_J=125^{\circ}\text{C}$	10					
Typical junction capacitance	C_J	4.0 V 1 MHz	250					pF

Note:

1. Mounted on copper pad area of 0.2x0.2" (5.0 x 5.0mm) to each terminal.

Ratings and Characteristics Curves

($T_A = 25^\circ\text{C}$ unless otherwise noted)

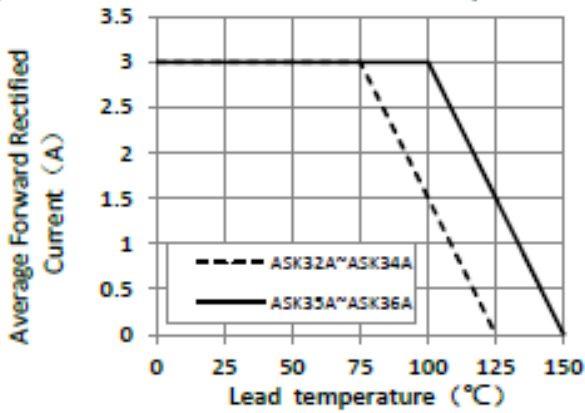


Figure 1. Forward Current Derating Curve

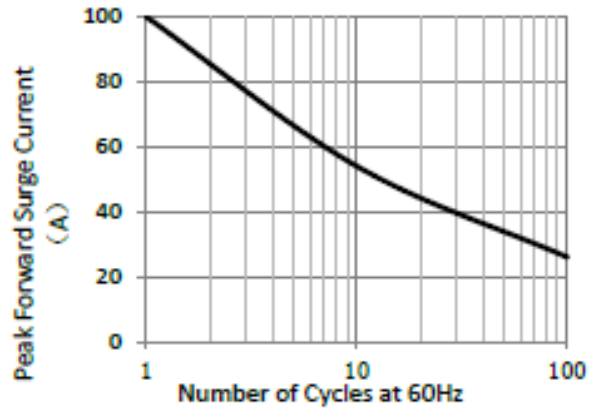


Figure 2. Maximum Non-Repetitive Peak Forward Surge Current

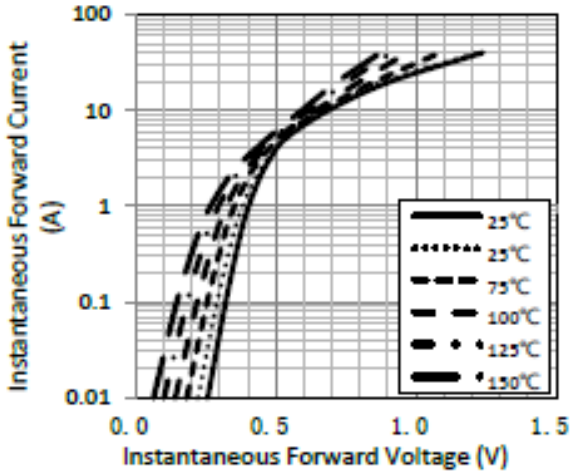


Figure 3. Typical Instantaneous Forward Characteristics (ASK32A thru ASK34A)

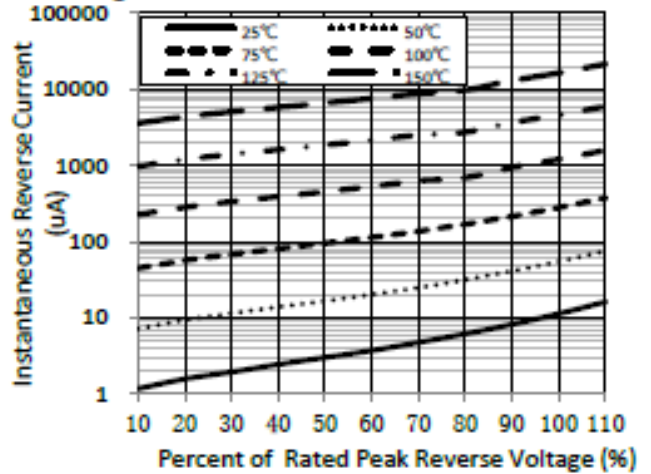


Figure 4. Typical Reverse Characteristics (ASK32A thru ASK34A)

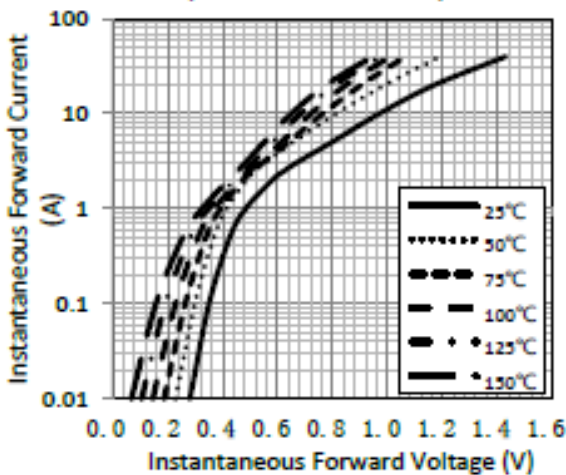


Figure 5. Typical Instantaneous Forward Characteristics (ASK35A thru ASK36A)

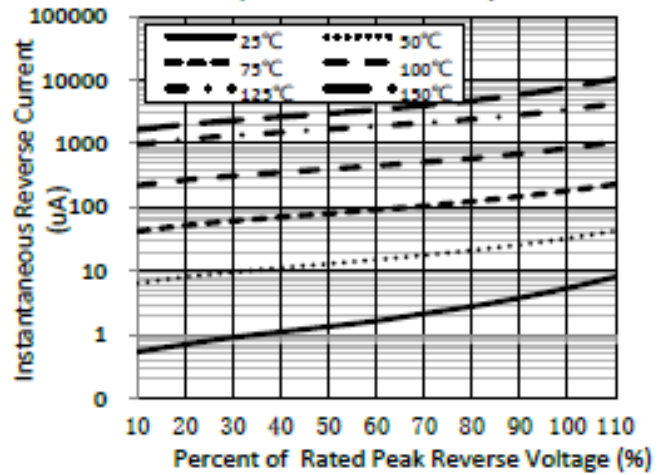
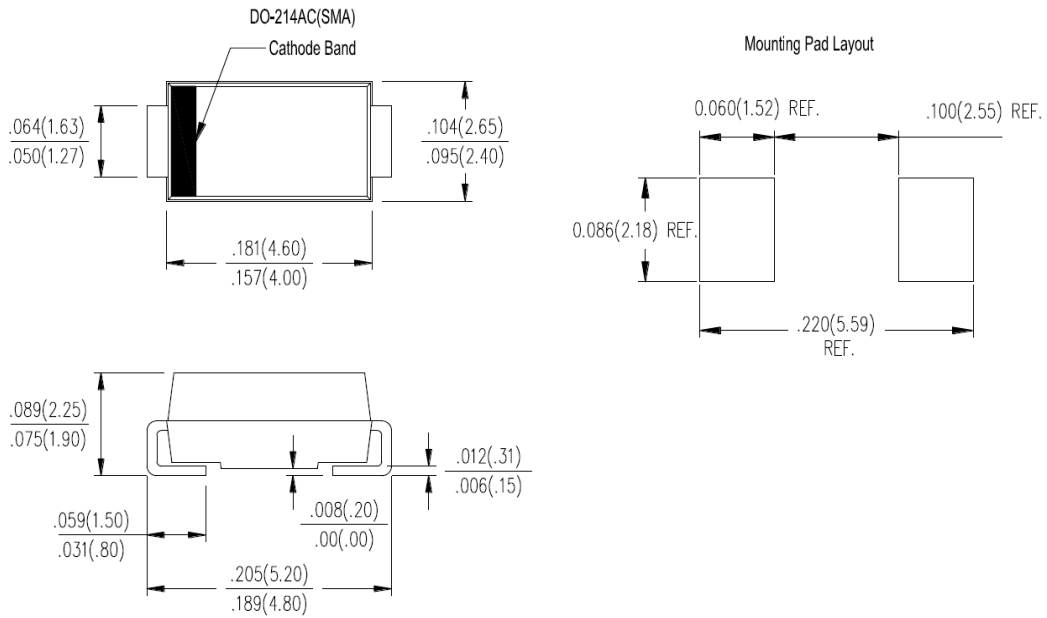


Figure 6. Typical Reverse Characteristics (ASK35A thru ASK36A)

Package Outline Dimensions

in inches (millimeters)

SMA (DO-214AC)



Revision History

Document Version	Date of release	Description of changes
Rev.A	2021.06.01	Released Datasheet
Rev.B	2023.10.24	Modify document format

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