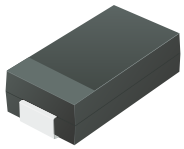
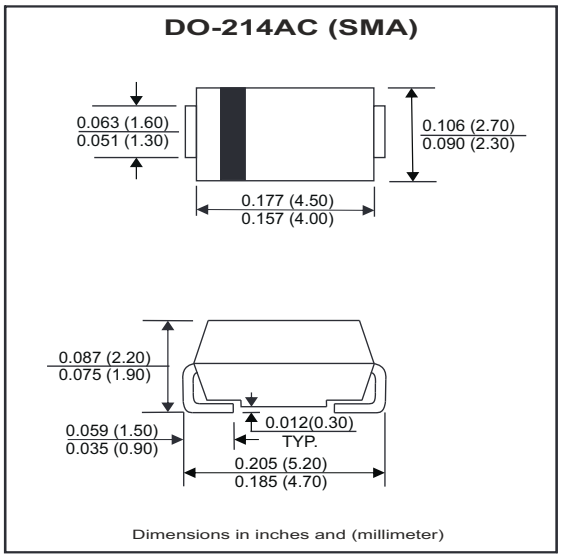
SS34-HF Thru. SS320-HF

Reverse Voltage: 40 to 200 Volts
Forward Current: 3.0 Amp
RoHS Device
Halogen Free





Features

- Metal silicon junction, majority carrier conduction
- For surface mounted applications
- Low power loss, high efficiency
- High forward surge current capability
- For use in low voltage, high frequency inverters, free wheeling, and polarity protection applications

Mechanical data

- Case: SMA
- Terminals: Solderable per MIL-STD-750, Method 2026
- Approx. Weight: 60mg / 0.0021oz

Maximum Ratings and Electrical Characteristics

Ratings at 25 °C ambient temperature unless otherwise specified.
Single phase, half wave, 60Hz resistive or inductive load, for capacitive load, derate by 20 %

Parameter	Symbols	SS34	SS36	SS310	SS315	SS320	Units
Maximum repetitive peak reverse voltage	V_{RRM}	40	60	100	150	200	V
Maximum RMS voltage	V_{RMS}	28	42	70	105	140	V
Maximum DC blocking voltage	V_{DC}	40	60	100	150	200	V
Maximum average forward rectified current	$I_{F(AV)}$	3.0					A
Peak forward surge current, 8.3ms single half sine-wave superimposed on rated load (JEDEC method)	I_{FSM}	80					A
Max instantaneous forward voltage at 3 A	V_F	0.55	0.70	0.85	0.95		V
Maximum DC reverse current T_j = 25°C at rated DC reverse voltage T_j = 100°C	I_R	0.5 5		0.3 3			mA
Typical junction capacitance (Note 1)	C_j	450		400			pF
Typical thermal resistance (Note 2)	$R_{\theta JA}$	70					°C/W
Operating junction temperature range	T_j	-55 ~ +125					°C
Storage temperature range	T_{stg}	-55 ~ +150					°C

Notes: 1. Measured at 1 MHz and applied reverse voltage of 4 V D.C
2. P.C.B. mounted with 2.0" X 2.0" (5 X 5 cm) copper pad areas.

Rating and Characteristic Curves (SS34-HF Thru. SS320-HF)

Fig.1 - Forward Current Derating Curve

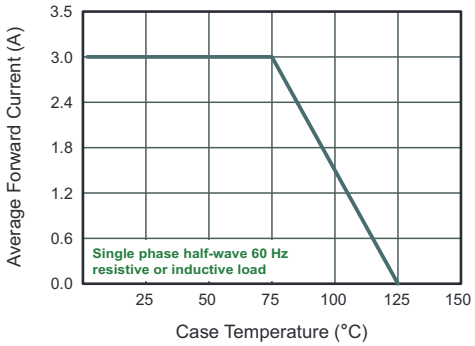


Fig.2 - Typical Reverse Characteristics

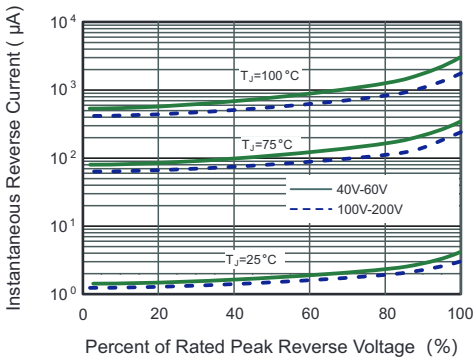


Fig.3 - Typical Forward Characteristic

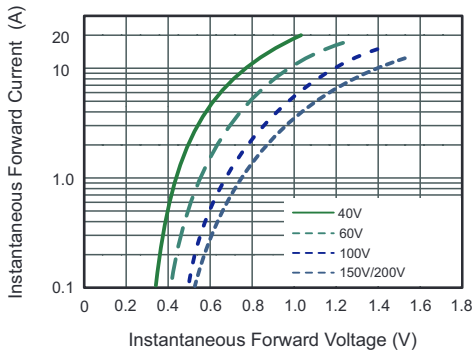


Fig.4 - Typical Junction Capacitance

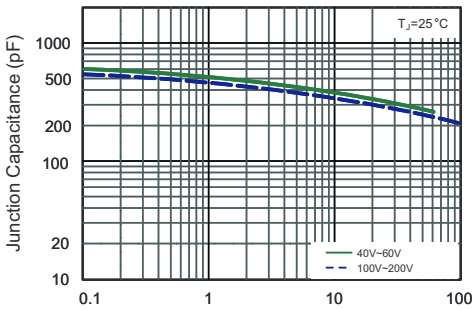


Fig.5 - Maximum Non-Repetitive Peak Forward Surge Current

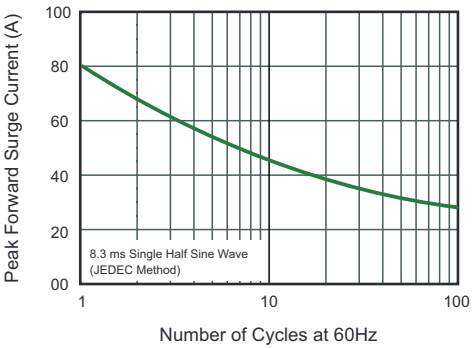
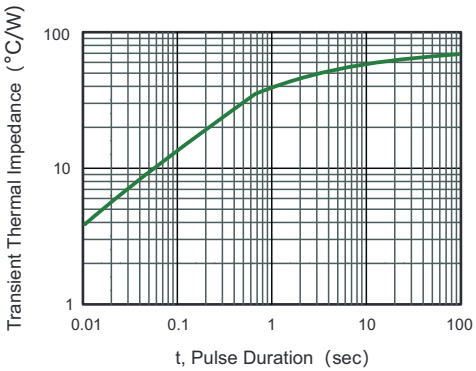
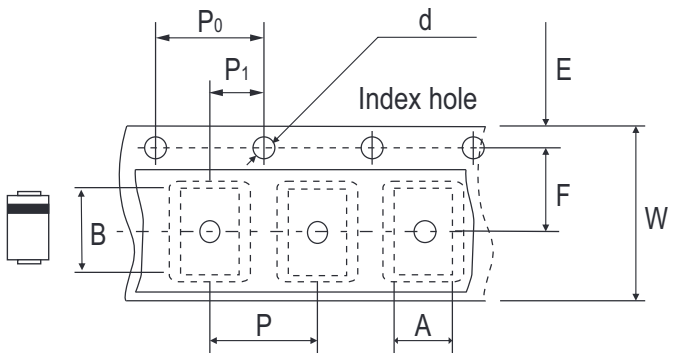
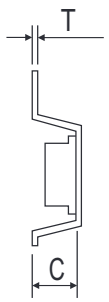


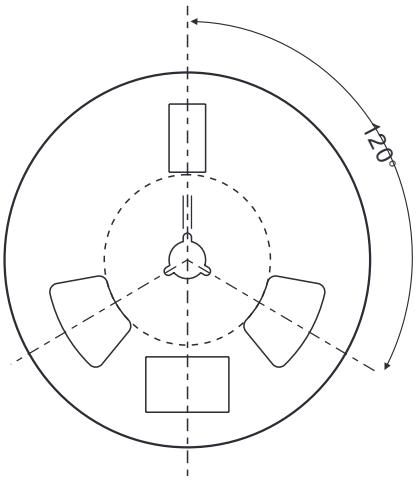
Fig.5 - Typical Transient Thermal Impedance

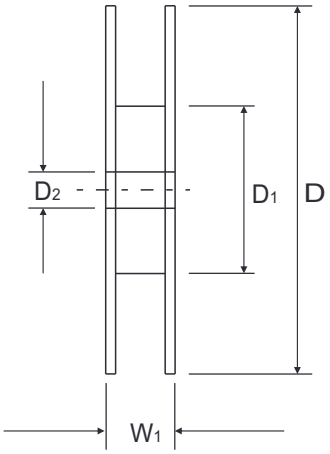


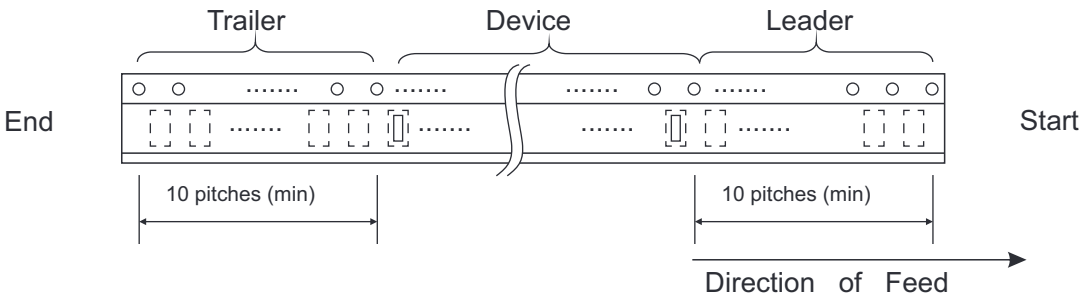
Reel Taping Specification









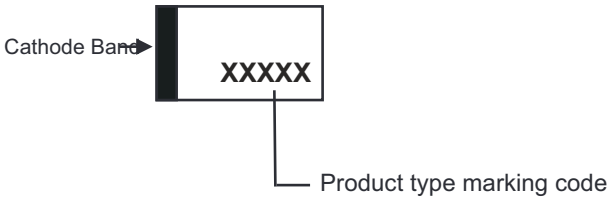


	SYMBOL	A	B	C	d	D	D1	D2
DO-214AC (SMA)	(mm)	2.70 ± 0.10	5.30 ± 0.10	2.66 ± 0.10	1.50 ± 0.10	330 ± 2.00	50.0 MIN.	13.50 ± 0.50
	(inch)	0.106 ± 0.004	0.209 ± 0.004	0.105 ± 0.004	0.059 ± 0.004	12.99 ± 0.079	1.969 MIN.	0.531 ± 0.020

	SYMBOL	E	F	P	P0	P1	T	W	W1
DO-214AC (SMA)	(mm)	1.75 ± 0.10	5.50 ± 0.10	4.00 ± 0.10	4.00 ± 0.10	2.00 ± 0.10	0.60 ± 0.10	12.0 ± 0.30	18.4 ± 1.00
	(inch)	0.069 ± 0.004	0.217 ± 0.004	0.157± 0.004	0.157 ± 0.004	0.079 ± 0.004	0.024± 0.004	0.472 ±0.012	0.724 ± 0.040

Marking Code

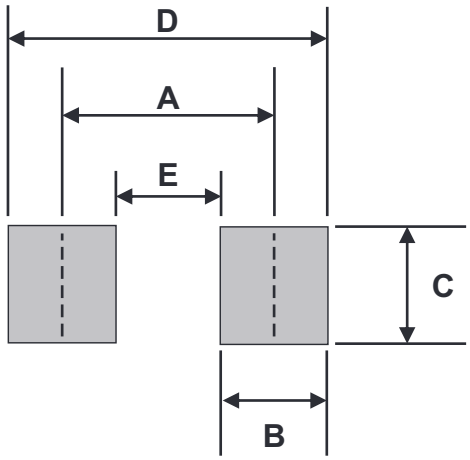
Part Number	Marking Code
SS34-HF	SS34
SS36-HF	SS36
SS310-HF	SS310
SS315-HF	SS315
SS320-HF	SS320



xxxxx = Product type marking code

Suggested PAD Layout

SIZE	DO-214AC (SMA)	
	(mm)	(inch)
A	4.00	0.157
B	2.50	0.100
C	1.80	0.071
D	6.50	0.256
E	1.50	0.060



Standard Packaging

Case Type	REEL PACK	
	REEL (pcs)	Reel Size (inch)
DO-214AC (SMA)	5,000	13