



## Silicon Rectifier Cells

with polysiloxan passivation

AG 3A ... AG3M

Forward Current: 3 A

Reverse Voltage: 50 to 1000 V

Publish Data

### Features

### Mechanical Data

- Weight approx. 0.3g
- <sup>2)</sup>  $I_F = 3A$ ,  $T_j = 25^\circ C$

Type	Repetitive peak reverse voltage $V_{RRM}$ V	Surge peak reverse voltage $V_{RSM}$ V	Max. reverse recovery time $I_F = A$ $I_R = A$ $I_{RR} = A$ $t_{rr}$ ns	Max. forward voltage $V_F^{2)}$
AG 3A	50	80	/	<1,2
AG 3B	100	130	/	<1,2
AG 3D	200	250	/	<1,2
AG 3G	400	450	/	<1,2
AG 3J	600	700	/	<1,2
AG 3K	800	1000	/	<1,2
AG 3M	1000	1300	/	<1,2

### Absolute Maximum Ratings

$T_c = 25^\circ C$  unless otherwise specified

Symbol	Conditions	Values	Units
$I_{FAV}$	Max. averaged fwd. current, R-load, $T_A = 100^\circ C$ <sup>1)</sup>	3	A
$I_{FRM}$	Repetitive peak forward current $f > 15 Hz$ <sup>1)</sup>	30	A
$I_{FSM}$	Peak forward surge current 50 Hz half sinus-wave <sup>3)</sup>	150	A
$i^2t$	Rating for fusing, $t < 10 ms$ <sup>3)</sup>	110	A <sup>2</sup> s
$R_{thA}$	Max. thermal resistance junction to ambient <sup>1)</sup>		K/W
$R_{thT}$	Max. thermal resistance junction to terminals <sup>1)</sup>		K/W
$T_j$	Operating junction temperature	-50 ... +150°C	°C
$T_s$	Storage temperature	-50 ... +150°C	°C

### Characteristics

$T_c = 25^\circ C$  unless otherwise specified

Symbol	Conditions	Values	Units
$I_R$	Maximum leakage current, $T_j = 25^\circ C$ ; $V_R = V_{RRM}$	10	$\mu A$
	$T_j = 100^\circ C$ ; $V_R = V_{RRM}$	1	mA
$C_j$	Typical junction capacitance (at MHz and applied reverse voltage of V)		pF
$Q_{rr}$	Reverse recovery charge ( $U_R = V$ ; $I_F = A$ ; $di_F/dt = A/ms$ )		$\mu C$
$E_{RSM}$	Non repetitive peak reverse avalanche energy ( $I_R = mA$ ; $T_j = ^\circ C$ ; inductive load switched off)		mJ



