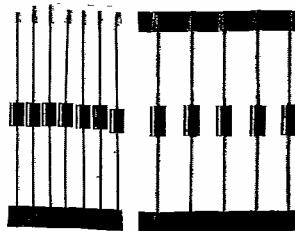


| V _{RSM} V _{RRM} | I _F RMS (maximum values for continuous operation) | |
|--------------------------------------|---|-----------|
| | 3 A | 6,7 A |
| V | I _{FAV} (sin. 180, T _{ref} = 105 °C, L = 10 mm) | |
| | 1,9 A | |
| 100 | SK 1 G 01 | SK 3 G 01 |
| 200 | SK 1 G 02 | SK 3 G 02 |
| 400 | SK 1 G 04 | SK 3 G 04 |
| 600 | SK 1 G 06 | SK 3 G 06 |
| 800 | SK 1 G 08 | SK 3 G 08 |
| 1000 | SK 1 G 10 | SK 3 G 10 |
| 1200 | SK 1 G 12 * | SK 3 G 12 |

Rectifier Diodes

SK 1 G T-01-1S

SK 3 G



| Symbol | Conditions | SK 1 G | SK 3 G |
|---------------------|---|---------------------------|---------------------------|
| I _{FAV} | T _{ref} = 130 °C; L = 10 mm; sin. 180 T _{amb} = 45 °C; sin. 180; p.c.b. 50 x 50 mm | 1,3 A 1,5 A | 3 A 2,1 A |
| I _{FSM} | T _{vj} = 25 °C; 10 ms | 58 A | 200 A |
| i ² t | T _{vj} = 175 °C; 10 ms | 50 A | 150 A |
| | T _{vj} = 25 °C; 8,3 . . . 10 ms | 16,8 A ² s | 200 A ² s |
| | T _{vj} = 175 °C; 8,3 . . . 10 ms | 12,5 A ² s | 110 A ² s |
| Q _{rr} | T _{vj} = 150 °C; - $\frac{di_F}{dt}$ = 10 $\frac{A}{\mu s}$; I _f = 10 A; V _R = 100 V; typ. | 15 μ C | 25 μ C |
| I _R | T _{vj} = 25 °C; V _R = V _{RRM} T _{vj} = 150 °C; V _R = V _{RRM} | 4 μ A 0,2 mA | 4 μ A 0,25 mA |
| V _F | T _{vj} = 25 °C; (I _f = ...); max | 1,1 V (1 A) | 1,1 V (3 A) |
| V _(TO) | T _{vj} = 175 °C | 0,85 V | 0,85 V |
| r _T | T _{vj} = 175 °C | 75 m Ω | 30 m Ω |
| C _j | V _R = 0; f = 1 MHz; typ. V _R = 4 V; f = 1 MHz; typ. | 45 pF 20 pF | 100 pF |
| R _{thjr} | L = 10 mm | 30 °C/W | 14 °C/W |
| R _{thja} | p.c.b. 50 x 50 mm | 75 °C/W | 60 °C/W |
| T _{vj} | | - 40 . . . + 175 °C | - 40 . . . + 175 °C |
| T _{stg} | | - 55 . . . + 175 °C | - 55 . . . + 175 °C |
| T _{solder} | max. 10 s, L = 9 mm | 280 °C | 280 °C |
| a | | 5 · 9,81 m/s ² | 5 · 9,81 m/s ² |
| w | approx. | 0,5 g | 1 g |
| Case | | E 33 | E 29 |

Features

- Axial lead diodes, taped
- Glass passivated silicon chip
- Void-free moulded plastic acc. to Underwriters Laboratory (UL) flammability classification 94 V-0
- Polarity: Band denotes cathode terminal
- Peak inverse voltage up to 1200 V
- High surge current of 200 A
- Available with formed leads on request

Typical Applications

- General purpose rectifier diodes for high quality requirement
- For printed circuit board mounting

* Available in limited quantities

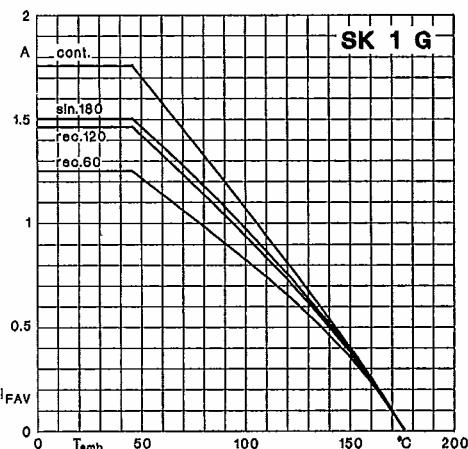


Fig. 4 Rated forward current vs. ambient temperature

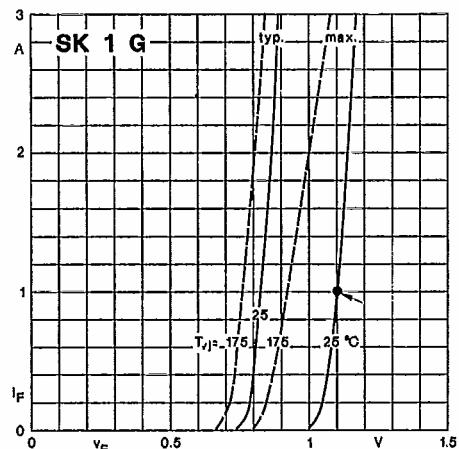


Fig. 6 a Forward characteristics

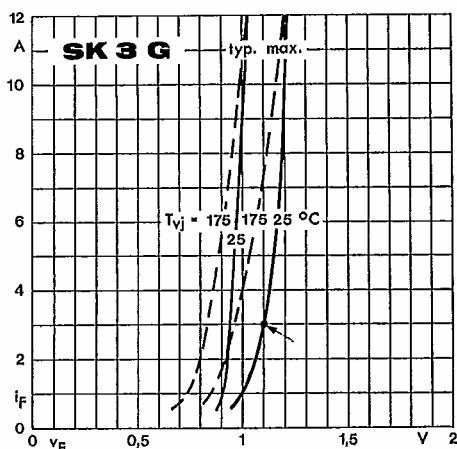


Fig. 6 b Forward characteristics

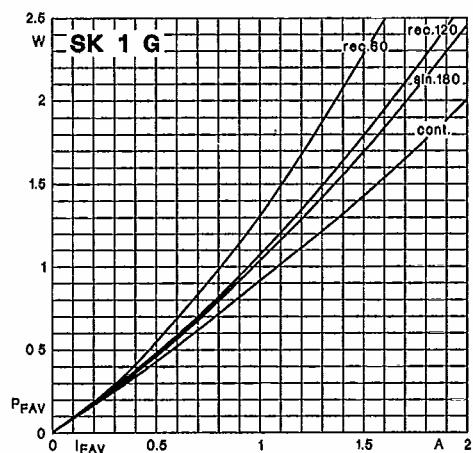


Fig. 8 Power dissipation vs. forward current

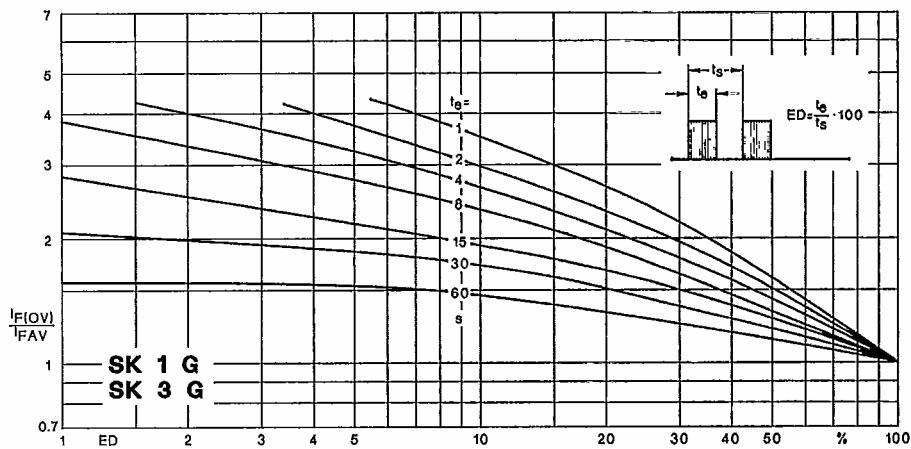
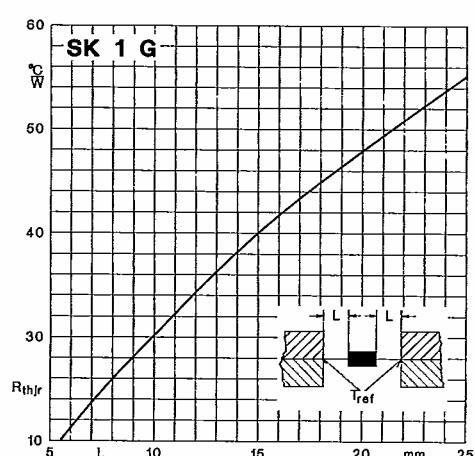
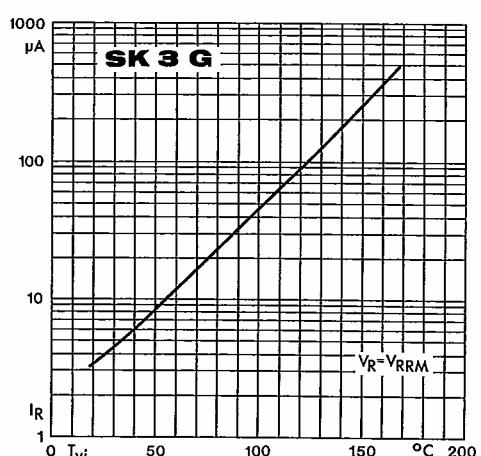
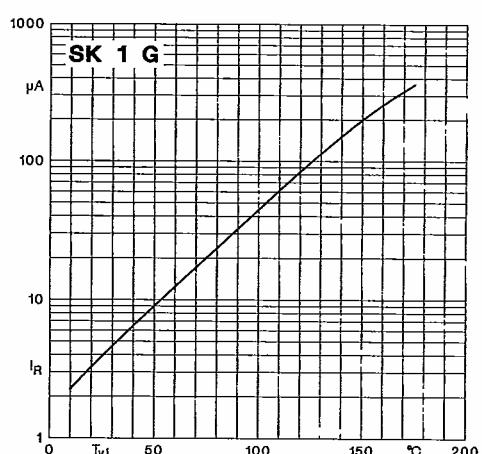
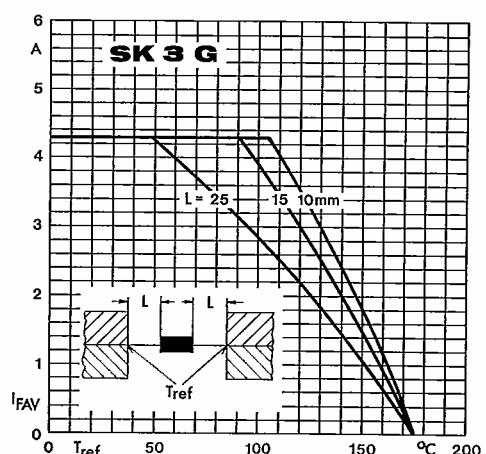
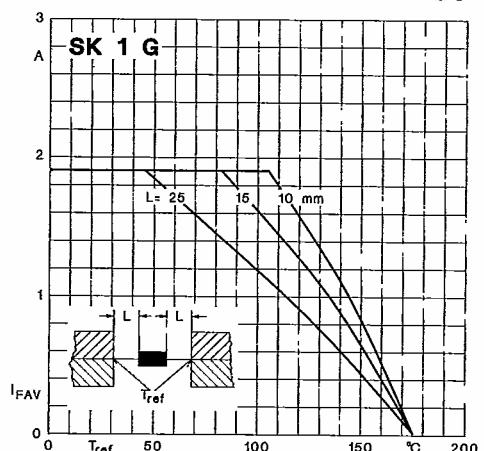
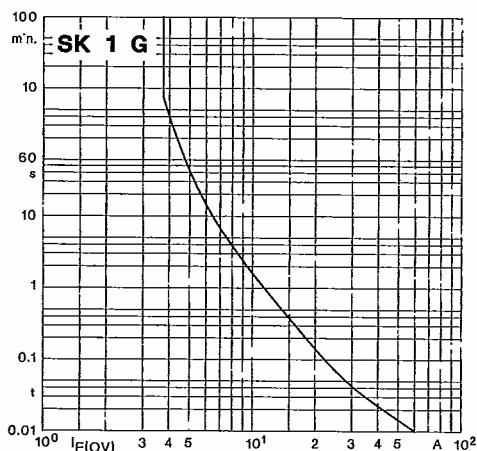


Fig. 9 Rated overload current vs. duty cycle



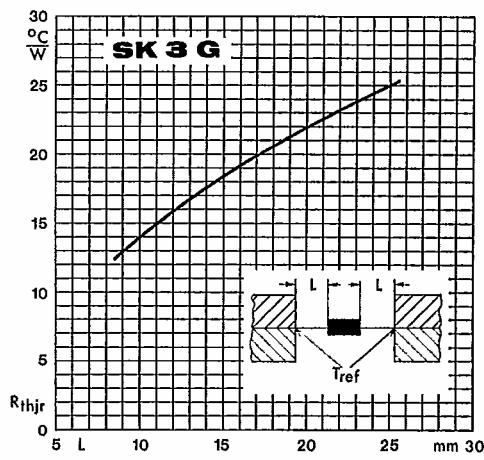
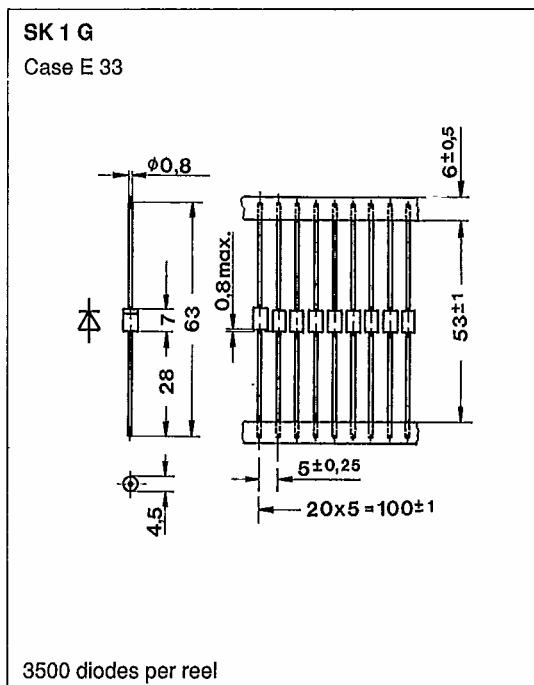
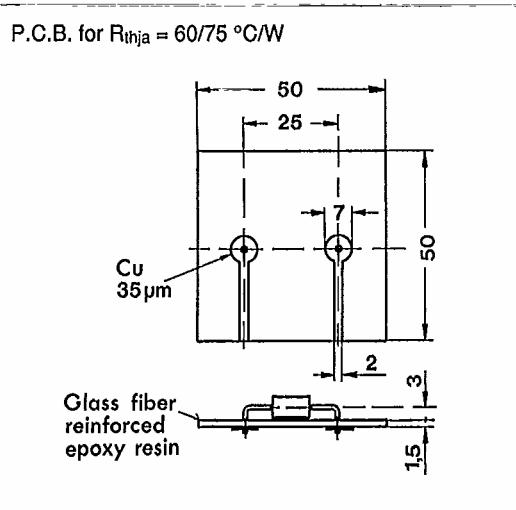
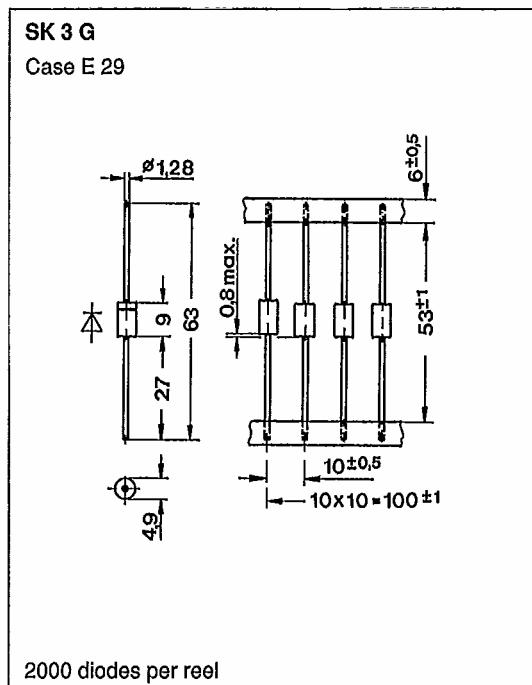


Fig. 16 b Thermal resistance vs. lead length



Reel dimensions page B 8 – 2

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