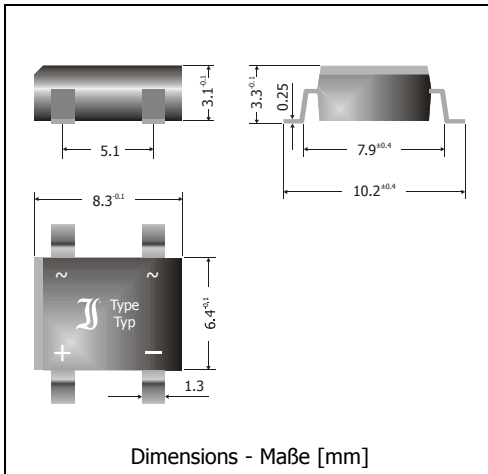


CS10S ... CS50S

Surface Mount Schottky-Bridge-Rectifiers
Schottky-Brückengleichrichter für die Oberflächenmontage

Version 2006-10-24



Nominal current Nennstrom	1 A
Alternating input voltage Eingangswchelspannung	10...50 V
Plastic case SO-DIL Kunststoffgehäuse SO-DIL	8.3 x 6.4 x 3.1 [mm]
Weight approx. – Gewicht ca.	0.4 g
Plastic material has UL classification 94V-0 Gehäusematerial UL94V-0 klassifiziert	
Standard packaging taped and reeled Standard Lieferform gegurtet auf Rolle	



Recognized Product – Underwriters Laboratories Inc.® File E175067
 Anerkanntes Produkt – Underwriters Laboratories Inc.® Nr. E175067

Maximum ratings and characteristics**Grenz- und Kennwerte**

Type Typ	Max. alternating input voltage Max. Eingangswchelspannung V_{VRMS} [V]	Repetitive peak reverse voltage Period. Spitzensperrspannung V_{RRM} [V]	Forward voltage Durchlass-Spannung V_F [V] ^{1,2)}
CS10S	10	20	< 0.50
CS20S	20	40	< 0.50
CS30S	30	60	< 0.70
CS40S	40	80	< 0.79
CS50S	50	100	< 0.79

Repetitive peak forward current Periodischer Spitzenstrom	$f > 15$ Hz	I_{FRM}	10 A ³⁾
Peak forward surge current, 50/60 Hz half sine-wave Stoßstrom für eine 50/60 Hz Sinus-Halbwell	$T_A = 25^\circ\text{C}$	I_{FSM}	40/44 A
Rating for fusing, $t < 10$ ms Grenzlastintegral, $t < 10$ ms	$T_A = 25^\circ\text{C}$	i^2t	8 A ² s
Operating junction temperature – Sperrschichttemperatur		T_j	-50...+150°C
Storage temperature – Lagerungstemperatur		T_s	-50...+150°C

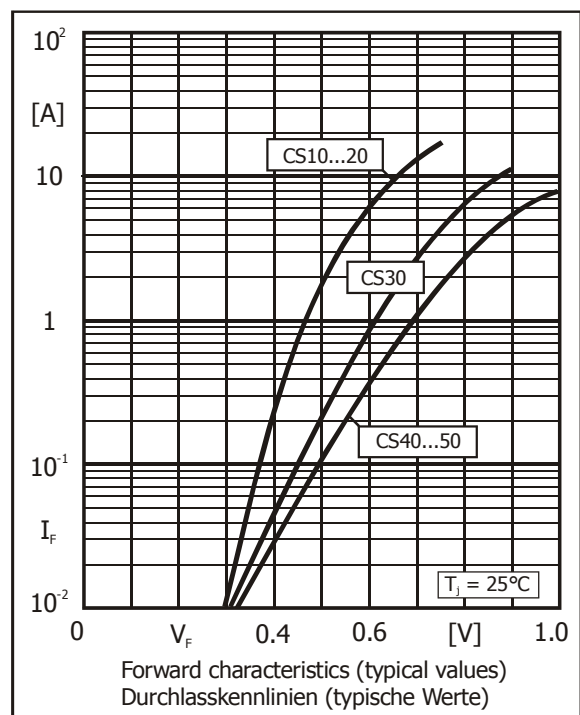
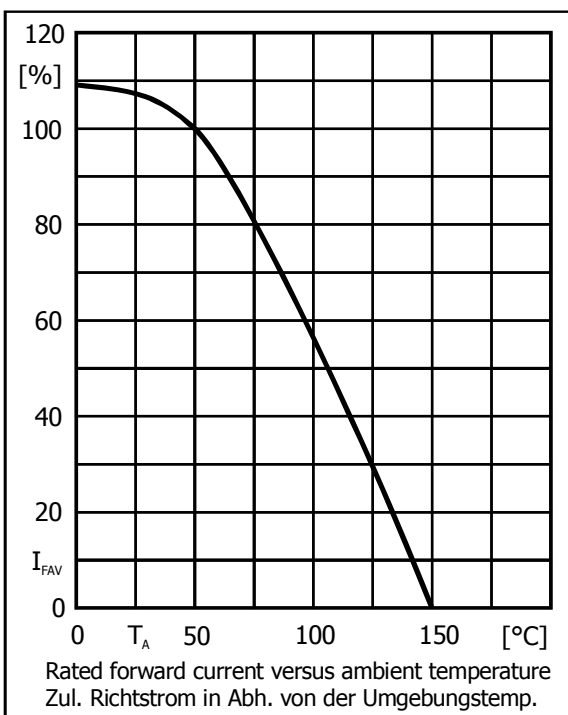
1 $I_F = 1$ A, $T_j = 25^\circ\text{C}$

2 Valid for one branch – Gültig für einen Brückenzweig

3 Max. temperature of the terminals $T_T = 100^\circ\text{C}$ – Max. Temperatur der Anschlüsse $T_T = 100^\circ\text{C}$

Characteristics
Kenwerte

Max. average forward rectified current Dauergrenzstrom	$T_A = 50^\circ\text{C}$	R-load C-load	I_{FAV} I_{FAV}	1.0 A ¹⁾ 0.8 A ¹⁾
Leakage current Sperrstrom	$T_j = 25^\circ\text{C}$ $T_j = 100^\circ\text{C}$	$V_R = V_{RRM}$ $V_R = V_{RRM}$	I_R I_R	< 0.5 mA < 5.0 mA
Thermal resistance junction to ambient air Wärmewiderstand Sperrschicht – umgebende Luft			R_{thA}	< 60 K/W ¹⁾



1 Mounted on P.C. Board with 25 mm² copper pads at each terminal
Montage auf Leiterplatte mit 25 mm² Kupferbelag (Lötpad) an jedem Anschluss