



SEMiX® 1s

Rectifier Diode Module

SEMiX 191KD

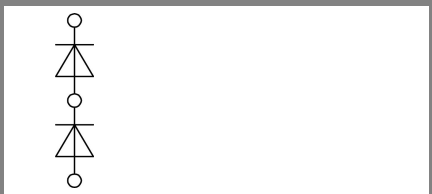
Preliminary Data

Features

- Terminal height 17 mm
- Chips soldered directly to isolated substrate

Typical Applications

- Input Bridge Rectifier for
- AC/DC motor control
- power supply



KD

V_{RSM} V	V_{RRM} V	$I_{FRMS} = 285\text{ A}$ (maximum value for continuous operation) $I_{FAV} = 190\text{ A}$ (sin. 180; $T_c = 85\text{ °C}$)		
1700	1600	SEMiX 191KD16s		

Symbol	Conditions	Values	Units
I_{FAV}	sin. 180; $T_c = 85\text{ (100) °C}$	190 (145)	A
I_{FSM}	$T_{vj} = 25\text{ °C}; 10\text{ ms}$ $T_{vj} = 130\text{ °C}; 10\text{ ms}$	6000 5000	A A
i^2t	$T_{vj} = 25\text{ °C}; 8,3 \dots 10\text{ ms}$ $T_{vj} = 130\text{ °C}; 8,3 \dots 10\text{ ms}$	180000 125000	A²s A²s
V_F	$T_{vj} = 25\text{ °C}; I_F = 500\text{ A}$	max. 1,5	V
$V_{(TO)}$	$T_{vj} = 130\text{ °C}$	max. 0,85	V
r_T	$T_{vj} = 130\text{ °C}$	max. 0,95	mΩ
I_{RD}	$T_{vj} = 130\text{ °C}; V_{RD} = V_{RRM}$	max. 12	mA
$R_{th(j-c)}$	per diode	0,18	K/W
$R_{th(c-s)}$	per module	0,075	K/W
T_{vj}		- 40 ... + 130	°C
T_{stg}		- 40 ... + 125	°C
V_{isol}	AC, 50Hz.; rms; 1s/1min	4800 / 4000	V~
M_s	(min./max.)	3/5	Nm
M_t	(min./max.)	2,5/5	Nm
a		5 * 9,81	m/s²
m	approx.	145	g
Case	SEMiX 1s		

