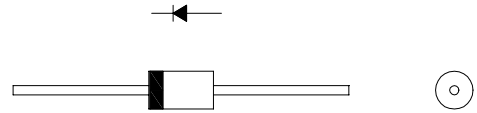


FRD Type: 30DF6

FEATURES

- * Super Fast Recovery
- * Low Forward Voltage Drop
- * Low Power Loss, High Efficiency
- * High Surge Capability
- * 100 Volts thru 600 Volts Types Available

OUTLINE DRAWING



Maximum Ratings

Apporox Net Weight:1.19g

Rating	Symbol	31DF6		Unit
Repetitive Peak Reverse Voltage	V_{RRM}	600		V
Non-repetitive Peak Reverse Voltage	V_{RSM}	700		V
Average Rectified Output Current	I_O	1.57	$T_a=25^{\circ}\text{C}$ *1	50Hz Half Sine Wave Resistive Load
		3.0	$T_l=119^{\circ}\text{C}$ (T_l :Lead Temperature)	
RMS Forward Current	$I_{F(RMS)}$	4.71		A
Surge Forward Current	I_{FSM}	120	50Hz Half Sine Wave, 1cycle, Non-repetitive	A
Operating JunctionTemperature Range	T_{jw}	- 40 to + 150		$^{\circ}\text{C}$
Storage Temperature Range	T_{stg}	- 40 to + 150		$^{\circ}\text{C}$

Electrical/Thermal • Characteristics

Characteristics	Symbol	Conditions	Min.	Typ.	Max.	Unit
Peak Reverse Current	I_{RM}	$T_j= 25^{\circ}\text{C}$, $V_{RM}= V_{RRM}$	-	-	10	μA
Peak Forward Voltage	V_{FM}	$T_j= 25^{\circ}\text{C}$, $I_{FM}= 3 \text{ A}$	-	-	1.25	V
Reverse Recovery Time	t_{rr}	$T_a= 25^{\circ}\text{C}$, $I_F=I_R=10\text{mA}$			400	ns
Thermal Resistance	$R_{th(j-a)}$	Junction to Ambient *1:Without Fin.	-	-	80	$^{\circ}\text{C/W}$
	$R_{th(j-l)}$	Junction to Lead			8	

*1: Without Fin or P.C. Board

30DF6 OUTLINE DRAWING (Dimensions in mm)

