



Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



## Contact us

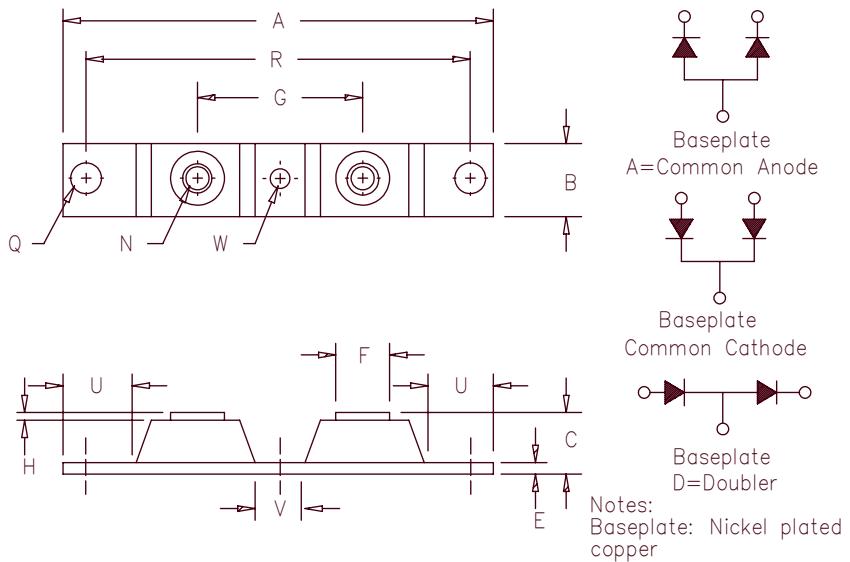
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# Ultrafast Recovery Modules

## UFT200, 201 & 202



Dim.		Inches	Millimeters		
Min.	Max.		Min.	Max.	Notes
A	---	3.630	---	92.20	
B	0.700	0.800	17.78	20.32	
C	---	0.630	---	16.00	
E	0.120	0.130	3.05	3.30	
F	0.490	0.510	12.45	12.95	
G	1.375	BSC	34.92	BSC	
H	0.010	---	0.25	---	
N	---	---	---	---	1/4-20
Q	0.275	0.290	6.99	7.37	Dia.
R	3.150	BSC	80.01	BSC	
U	0.600	---	15.24	---	
V	0.312	0.340	7.92	8.64	
W	0.180	0.195	4.57	4.95	Dia.

Microsemi Catalog Number	Working Reverse Voltage	Peak Reverse Voltage	Repetitive Peak Reverse Voltage
UFT20005*	50V	50V	50V
UFT20010*	100V	100V	100V
UFT20015*	150V	150V	150V
UFT20020*	200V	200V	200V
UFT20120*	300V	300V	300V
UFT20130*	400V	400V	400V
UFT20150*	500V	500V	500V
UFT20260*	600V	600V	600V
UFT20270*	700V	700V	700V
UFT20280*	800V	800V	800V

Add Suffix A for Common Anode, D for Doubler

- Ultra Fast Recovery
- 175°C Junction Temperature
- $V_{RRM}$  50 to 800 Volts
- High surge capacity
- 2 X 100 Amp current rating
- ROHS Compliant

### Electrical Characteristics

	UFT200	UFT201	UFT202	
Average forward current per pkg	$I_F(AV)$ 200A	200A	200A	Square Wave
Average forward current per leg	$I_F(AV)$ 100A	100A	100A	Square Wave
Case Temperature	T <sub>C</sub> 135°C	120°C	115°C	$R_{\theta JC} = 0.5^{\circ}\text{C}/\text{W}$
Maximum surge current per leg	$I_{FSM}$ 1500A	1400A	1200A	8.3ms, half sine, $T_J = 175^{\circ}\text{C}$
Max peak forward voltage per leg	$V_{FM}$ .975V	1.25V	1.35V	$I_{FM} = 100A; T_J = 25^{\circ}\text{C}^*$
Max reverse recovery time per leg	$t_{rr}$ 50ns	70ns	90ns	1/2A, 1A, 1/4A, $T_J = 25^{\circ}\text{C}$
Max peak reverse current per leg	$I_{RM}$ _____	6.0mA	_____	$V_{RRM}, T_J = 125^{\circ}\text{C}$
Max peak reverse current per leg	$I_{RM}$ _____	50μA	_____	$V_{RRM}, T_J = 25^{\circ}\text{C}$
Typical Junction capacitance	C <sub>J</sub> 575pF	300pF	275pF	$V_R = 10V, T_J = 25^{\circ}\text{C}$

\*Pulse test: Pulse width 300μsec, Duty cycle 2%

### Thermal and Mechanical Characteristics

Storage temp range	T <sub>STG</sub>	-55°C to 175°C
Operating junction temp range	T <sub>J</sub>	-55°C to 175°C
Max thermal resistance per leg	R <sub>θJC</sub>	0.5°C/W Junction to case
Max thermal resistance per pkg	R <sub>θJC</sub>	0.25°C/W Junction to case
Typical thermal resistance	R <sub>θCS</sub>	0.08°C/W Case to sink
Terminal Torque		35–50 inch pounds
Mounting base torque – (outside holes)		30–40 inch pounds
Mounting base torque – (center hole)		8–10 inch pounds
center bolt must be torqued first		
Weight		2.8 ounces (75 grams) typical

# UFT200

Figure 1  
Typical Forward Characteristics – Per Leg

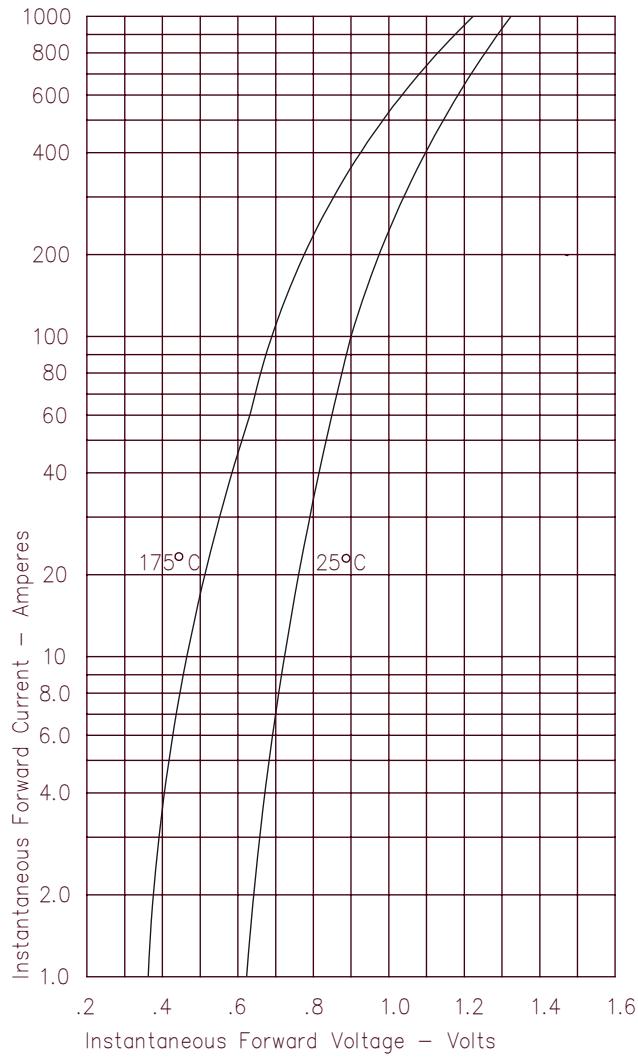


Figure 2  
Typical Reverse Characteristics – Per Leg

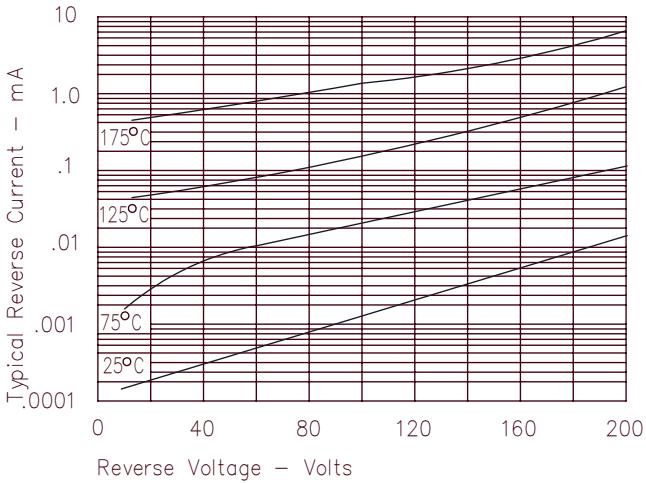


Figure 3  
Typical Junction Capacitance – Per Leg

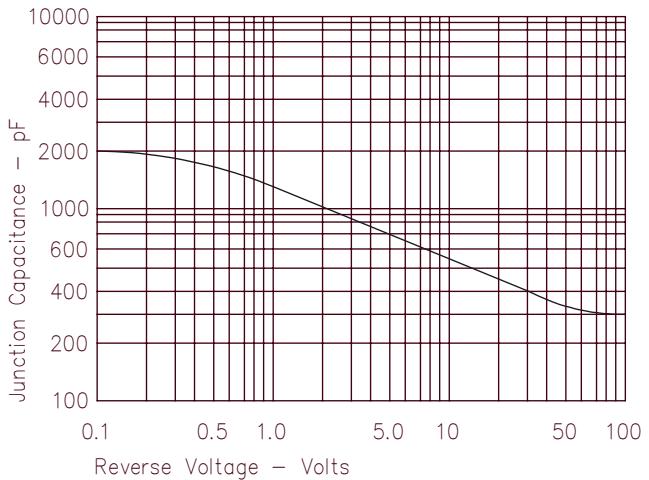


Figure 4  
Forward Current Derating – Per Leg

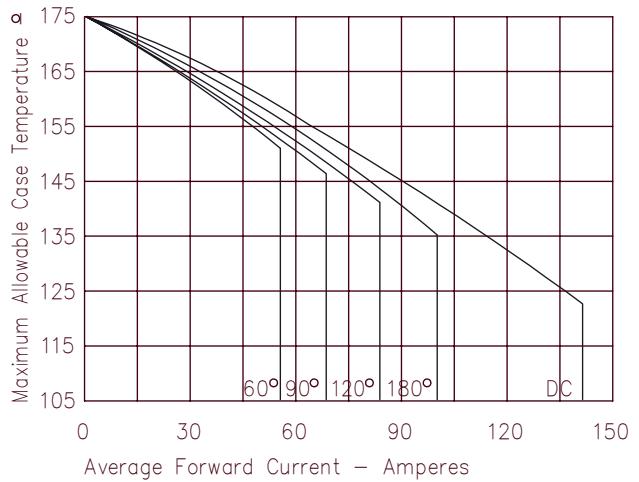
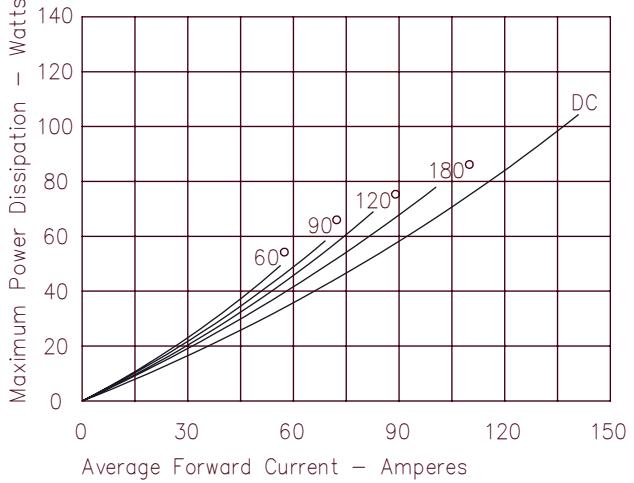


Figure 5  
Maximum Forward Power Dissipation – Per Leg



# UFT201

Figure 1  
Typical Forward Characteristics – Per Leg

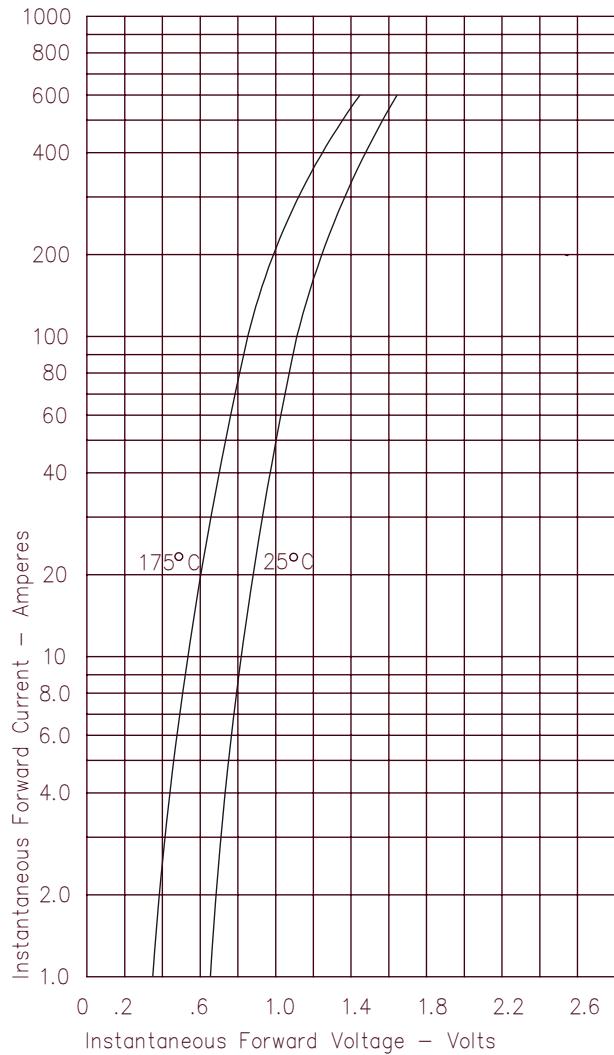


Figure 2  
Typical Reverse Characteristics – Per Leg

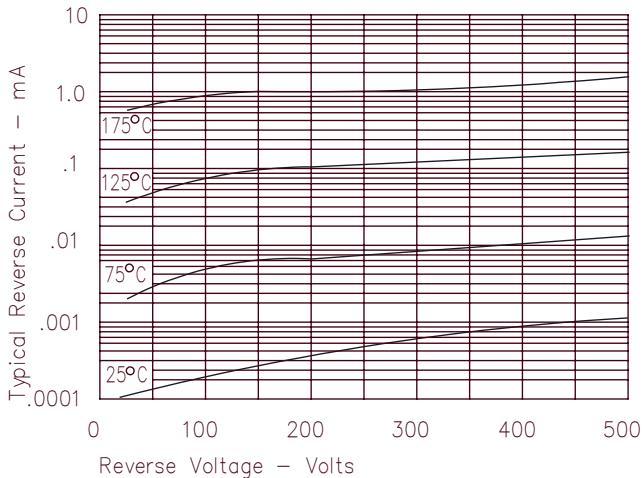


Figure 3  
Typical Junction Capacitance – Per Leg

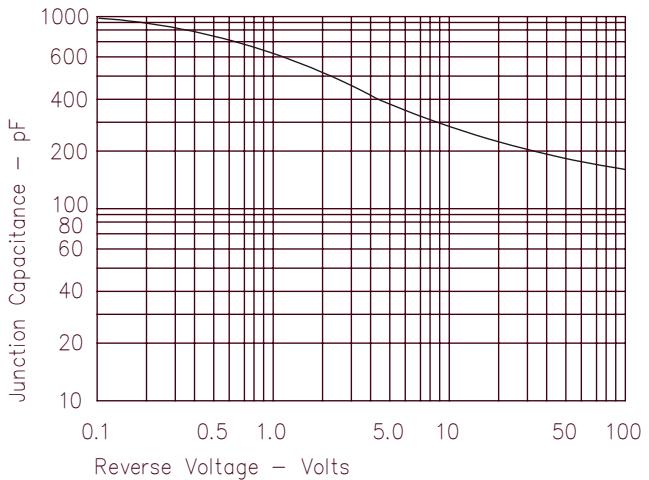


Figure 4  
Forward Current Derating – Per Leg

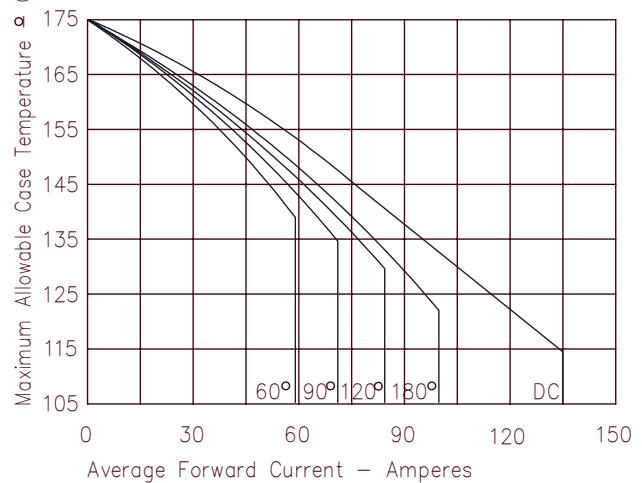
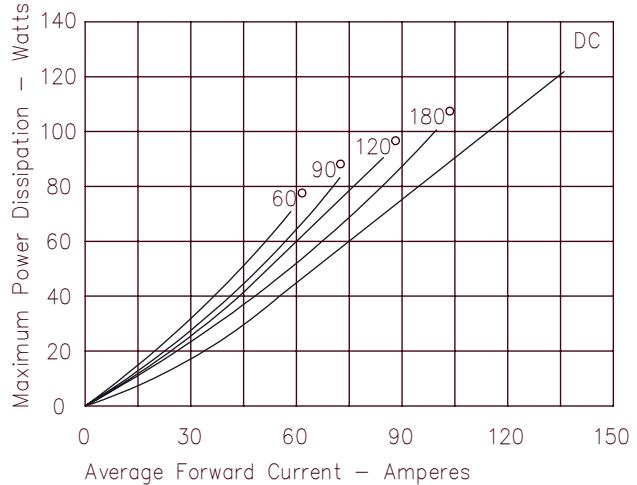


Figure 5  
Maximum Forward Power Dissipation – Per Leg



# UFT202

Figure 1  
Typical Forward Characteristics – Per Leg

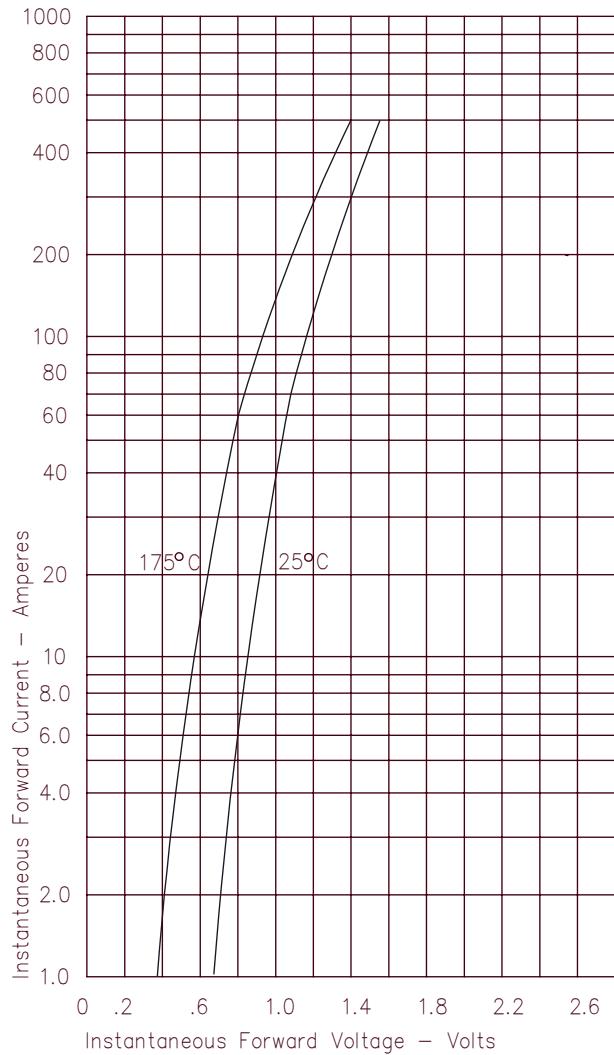


Figure 2  
Typical Reverse Characteristics – Per Leg

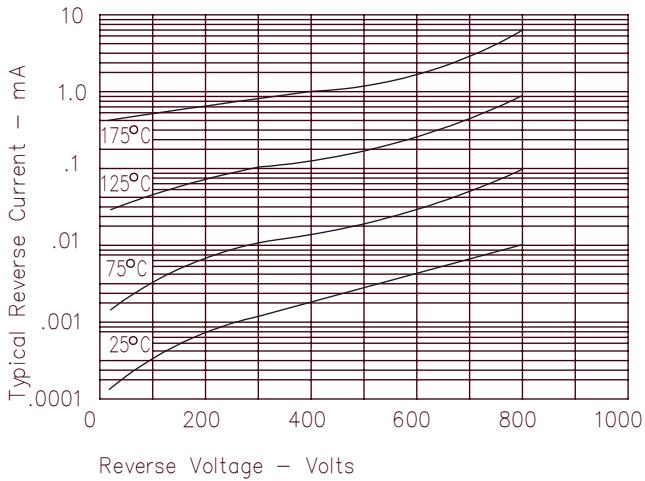


Figure 3  
Typical Junction Capacitance – Per Leg

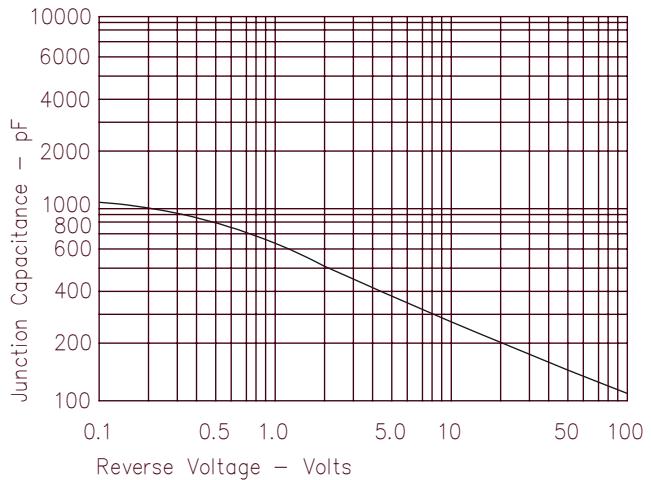


Figure 4  
Forward Current Derating – Per Leg

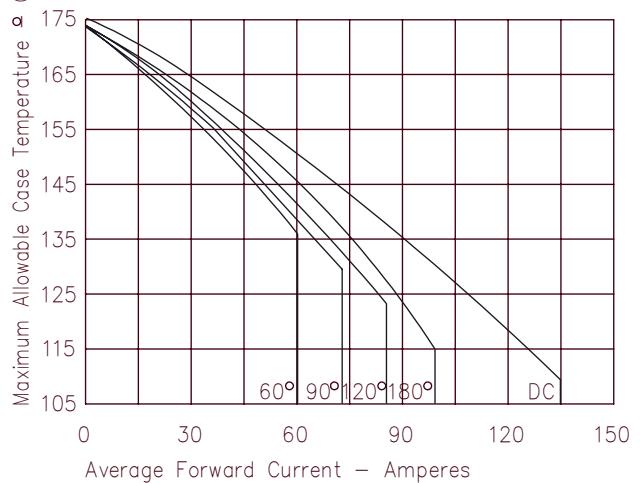


Figure 5  
Maximum Forward Power Dissipation – Per Leg

