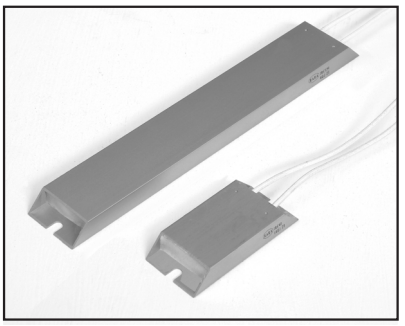
Compact Type Metal Clad Wire Wound Resistors

The IRC(C=Compact type) models are compact wire wound, metal clad resistors. These models have an extruded aluminum housing providing strong and rugged protection. These models are available with flying leads. The most common applications for these models are: Motor drives, braking and snubber applications and power sources for industrial equipment



GENERAL SPECIFICATIONS

Model	*Power Rating [W]		Resistance Range[Ω]		Resistance Tolerance [%]
	On Heat Sink	In Free Air	Inductive	Non-Inductive	
IRC 40	40W	32W	0.5 ~ 360	2 ~ 240	D [±0.5] F [±1] G [±2] J [±5] K [±10]
IRC 60	60W	40W	0.5 ~ 900	5 ~ 540	
IRC 70	70W	50W	0.5 ~1.2K	6 ~ 1.2K	
IRC 80	80W	55W	0.5 ~1.8K	0.5 ~ 300	
IRC 100	100W	60W	1.0 ~2.2K	1.0 ~ 350	
IRC 120	120W	65W	1.0 ~2.6K	1.0 ~ 350	
IRC 150	150W	70W	1.0 ~3.5K	1.0 ~ 500	

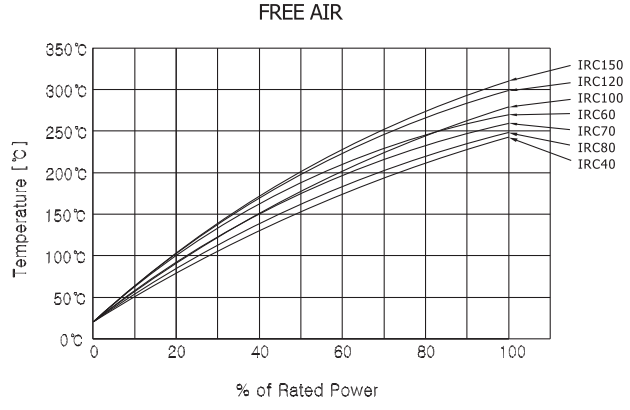
* IRC40-120 on heat sink size[mm] : Al 200×200×3mm , IRC150 on heat sink size : Al 400×400×3mm

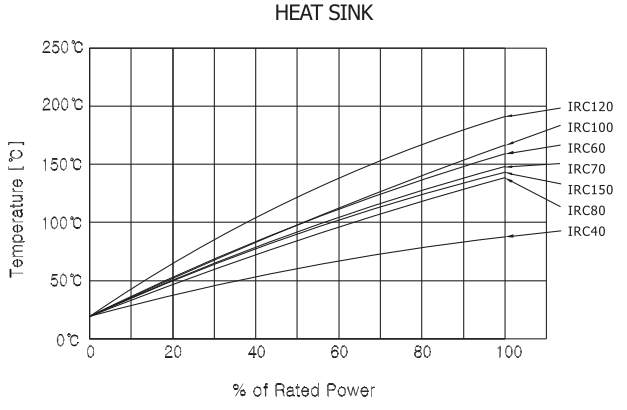
CHARACTERISTICS

Values in [ ] mean change in Ω after test

Operation Temperature Range		-55℃ ~ +200℃
Insulation Resistance		20MΩ minimum
Dielectric Withstanding Voltage		AC 1500V, 2000V, 2500V for 1minute; Maximum leakage current : 2mA
Temperature Coefficient		±260 ppm/℃ maximum
Short Time Overload	±[2%+0.05Ω]	10 x Power rating, 5seconds
Thermal Shock	±[2%+0.05Ω]	Power rating 30 minutes, -25℃ 15minutes
Moisture Resistance	±[3%+0.05Ω]	40℃, 95% RH, DC100V case to terminal, 500 hours
Vibration	±[1%+0.05Ω]	10Hz-55Hz-10Hz(1minute) 2hours each direction
Moisture Load Life	±[3%+0.05Ω]	40℃, 95% RH, 0.1 x Power rating 90 minutes on, 30minutes off, 500hours
Load Life	±[5%+0.05Ω]	Power rating 90 minutes on, 30minutes off, 500hours

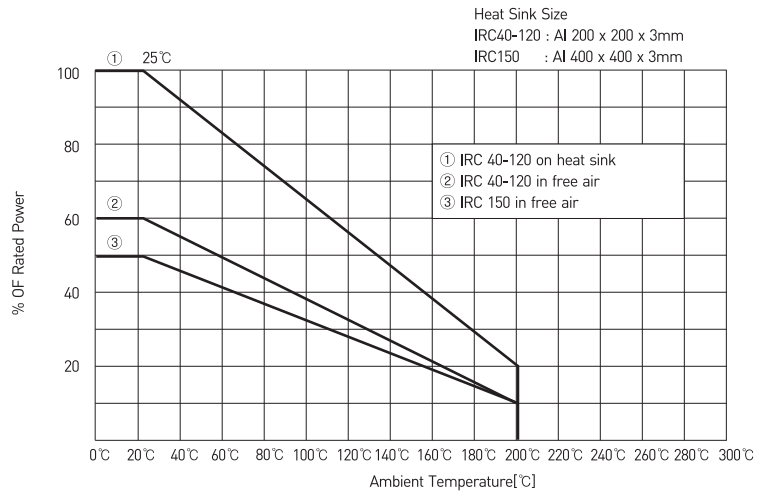
SURFACE TEMPERATURE INCREASE VERSUS POWER LOAD





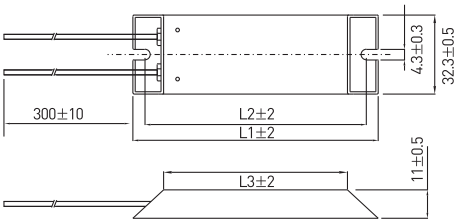
Tel: 82-32-817-4325 Fax: 82-32-817-4329

DERATING CURVES



DIMENSIONS [mm]

Model	Dimensoins[mm]		
	L1±2	L2±2	L3±2
IRC40	75	65.3	50
IRC60	100	90.3	75
IRC70	112	102.3	87
IRC80	150	140.3	125
IRC100	165	155.3	140
IRC120	182	172.3	157
IRC150	210	200.3	185



FLYING LEADS

Model	1.25㎟
IRC40	0.2Ω ~ 360Ω
IRC60	0.5Ω ~ 900Ω
IRC70	0.5Ω ~ 1.2KΩ
IRC80	0.5Ω ~ 1.8KΩ
IRC100	1.0Ω ~ 2.2KΩ
IRC120	1.0Ω ~ 2.6KΩ
IRC150	1.0Ω ~ 3.5KΩ

ORDERING PROCEDURE EXAMPLE