



DIY Cold Plates

High-Performance IGBT Cold Plates

The DIY family of high-performance cold plates provides engineers with the freedom to drill holes to match the specific connection points of the devices being cooled such as IGBT, MOSFET, or other power electronics. Each cold plate has an etched “no drill zone” to provide a visual guide.

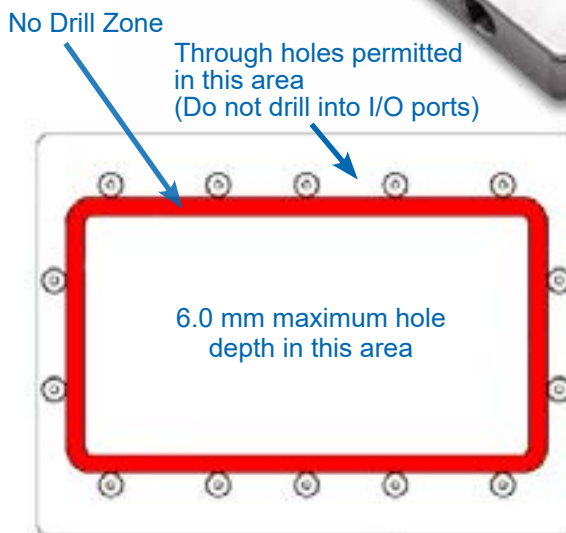
Outside of the “no drill zone,” through holes can be drilled at any point. (Avoid drilling into the I/O ports.) Inside the “no drill zone” holes can only be drilled to a depth of 6 mm to avoid damaging the internal fin field. (See example on right).

FEATURES AND BENEFITS

- » More than 30% improvement in thermal performance compared to commercially available cold plates
- » Compatible with industry accepted coolants
- » 1/4 NPT threaded input and output
- » Low pressure drop
- » Maximum pressure: 60 psi
- » Provides same performance as standard ATS cold plates, but without pre-drilled holes
- » Material: Aluminum 6061-T6 (may be machined with standard shop equipment)
- » Once design is complete, ATS can produce cold plates with specific hole pattern



**Image for illustration purposes only*



ATS COLD PLATES

- » **Innovative Technology**
Superior heat transfer, flexible design platform
- » **Compact Design**
Designed to be used with standard IGBT and other power electronics applications
- » **Easy Connections**
Industry standard threaded hole sizes allows for hassle-free connection options
- » **Safe & Reliable**
Leak Free (100% tested:100 psi)
- » **Custom Options**
Choose from various options, i.e; fitting types, material types, device mounting and more. Contact ATS for additional information.

» **Customization Available!**
ATS will customize any of the cold plates to fit into your application

ATS DIY Cold Plate Family

(Flow Rate: 4 L/min)

Part Number	Dimensions* (L x W x H)	Weight (grams)	ΔT @ 1kW between the cold plate base and inlet fluid temperature
ATS-CP-1000-DIY	202 x 130 x 20	1,200	5.50°C
ATS-CP-1001-DIY	198 x 147 x 20	1,340	5.00°C
ATS-CP-1002-DIY	162 x 136 x 20	1,102	7.00°C
ATS-CP-1003-DIY	162 x 147 x 20	1,102	6.80°C
ATS-CP-1004-DIY	162 x 172 x 20	1,280	5.90°C

APPLICATIONS:

Automotive Industry, Uninterruptible Power Supplies, Wind Turbines, Photovoltaic Inverters, Power Electronics, Induction Heaters, Motor Devices, Utility Vehicles, Anywhere power devices are used

COLD PLATE KEEP-OUT AREA

