

Application Note

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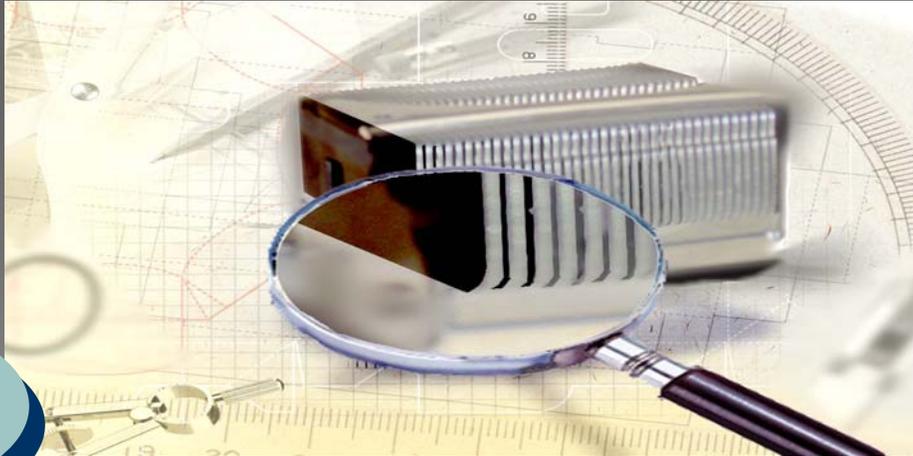


APPLICATION: **SKIVED** HEATSINKS

Overview

As the heat production of semiconductors increase, and packaging size continues to shrink, engineers reach for new solutions to thermal management. Skived heatsinks are the latest technology for air-cooled heatsinks, and one of ThermTec's latest product offerings.

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Skiving Features

Skived heatsinks have unique features:

- ◆ The highest fin aspect ratio of up to 100:1
- ◆ The maximum dissipation surface area
- ◆ Optimum volume/weight ratio
- ◆ One-piece design without heat insulating material like brazed heatsinks
- ◆ The ability to use dual-materials for enhanced thermal properties

Application

Skived heatsinks are used where heat, size, and weight create a problem. It can also deal with space constraints effectively. Typical Applications:

- ◆ Audio equipment
- ◆ Communication equipment
- ◆ DC Converters
- ◆ BGAs
- ◆ Computer-Microprocessor, RAM and VGA coolers
- ◆ Other misc. Applications

ThermTec Solution

Skive means to cut in thin layers, and that is how the heatsinks are made. To make fins thinner and denser than can be extruded, equipment was invented to skive thin slices of aluminum and stand them up while still attached to the main body. These thin slices create the fins for the heatsink and supply it's great heat dissipation characteristics. Skiving creates the greatest amount of surface area per pound and size, which equates to super high efficiency.

ThermTec has one of the premier plants for producing skived heatsinks. With CNC machining and milling capabilities, along with in-house finishing, we can offer a complete custom product ready to install. This highly automated plant has the experience and technology to offer a superior product with great value.

About ThermTec

ThermTec provides custom solutions in metal, whether it is an aluminum extrusion, stamped and formed metal, busbar, or insulated metal substrate. With three plants and over 500,000 square feet of combined manufacturing capability, ThermTec has the ability to cut costs from products while maintaining the highest quality and on time delivery.

ThermTec is a Segue company with worldwide headquarter in Los Angeles and operations in Asia. www.SegueElectronics.com

