TAB 6 - FAQS

THREADED INSERT FAQS

What is a Threaded Insert?
Groov-Pin threaded inserts are cylindrical, metal bushings with features on the outside which lock them into a plastic or metal base material to anchor your fasteners. They provide high-quality, permanent, wear-resistant internal threads and are designed to be installed in molded or drilled holes in one simple step. While each style performs in a range of materials, they are generally classified by method of installation: thread-cutting, thread-forming, push-in, or ultrasound.

Why do I need a Threaded Insert?
Threaded inserts are designed to improve the strength of assemblies by distributing forces from the fastener over a larger area in the base material, thus increasing their load-bearing capability. For metals such as aluminum, this means full utilization of high-tensile-strength fasteners. In plastics, threaded inserts avoid wear and cold-flow problems encountered with thread-forming screws. Threaded inserts offer both engineering and cost economies.

How do I choose which type of Threaded Insert to use?
Regular length inserts can be used to maximize pull-out strength, while medium or short inserts are used in applications where less strength is required or when space is constrained.

What materials are Groov-Pin Threaded Inserts made from?
Groov-Pin threaded inserts are made from stainless steel, steel, and brass.

Tap-Lok Threaded Inserts
- Hole Series - stainless steel and steel
- Slotted Series - stainless steel and steel
- Coarse Series - brass
- Wood Series - brass

Speedserts
- Stainless steel

Barb-Sert
- Brass

What is the recommended hole size?
The hole size will depend on the size and type of threaded insert that you are using. See our threaded insert guide for the appropriate hole size for each insert.

Example: 10-32 Speedsert going into aluminum has a recommended hole size of .263

How deep does a hole have to be to use Groov-Pin Threaded Inserts?
A hole should be 1.2 times the insert length.

Can I use a cored hole instead of a drilled hole?
Yes, as long as the draft angle of the cored hole is not too great. If the Threaded Insert cannot be installed flush with the base material, then you have to reduce the angle until the insert can be installed flush.

How do I install Tap-Loks and Speedserts?
You can install Tap-Lok threaded inserts and Speedserts with our "production" or "hand" tool.

Production Tool:	**Hand Tool:**
Attach our production tool to a drill press with a tapping head. Thread the insert onto the nose of the tool. Bring down the drill press, turning the insert into the base material. Once the insert is flush with the base material, the clutch in the tapping head will reverse, leaving the insert installed.	Attach the hand tool to a drill press or power tool. Thread the insert onto the stud of the tool until it contacts the nut. Turn the insert into the base material until it is flush making sure to keep the tool perpendicular with the work. Hold the stud against rotation and loosen the nut with a wrench. Unscrew the stud from the insert.

What is the pull-out resistance of Groov-Pin Threaded Inserts?
Pull-out resistance depends on the type and size of the insert as well as the base material. See our threaded insert guide for the performance data for each series of threaded inserts installed in various materials.

Example: The pull-out resistance for a 10-32 Speedsert in aluminum is 2,250 lbs.

Can you manufacture a special version of any of your Threaded Inserts?
Yes, this can be arranged after speaking to one of our sales representatives. Contact our sales team to get started.