

Process

Vacuum molding **Compression Molding Thermal Forming Rapid Prototype Tooling SMC Molds Electrical Engineering Automation Machines Bypass Trim Tools** Waterjet Trimming **Pour Molds Inspection Fixtures**

Our Specialization



Hood, Dash, Tunnels, Cowls Absorbers **Trunk and carpet system Headliners Package Trays Engine cover SMC Floor and Kick Plates** Heatshield **Battery Wrap Wheelhouse Liners** Load floor **Poke Yoke**



Design Capabilities

Product Development
Part Design Modification
Complete Tooling Design
Engineering and Tooling Modification
Data translation and CNC Programming
Surface and Solid Modelling
Detail Drawings with BOM

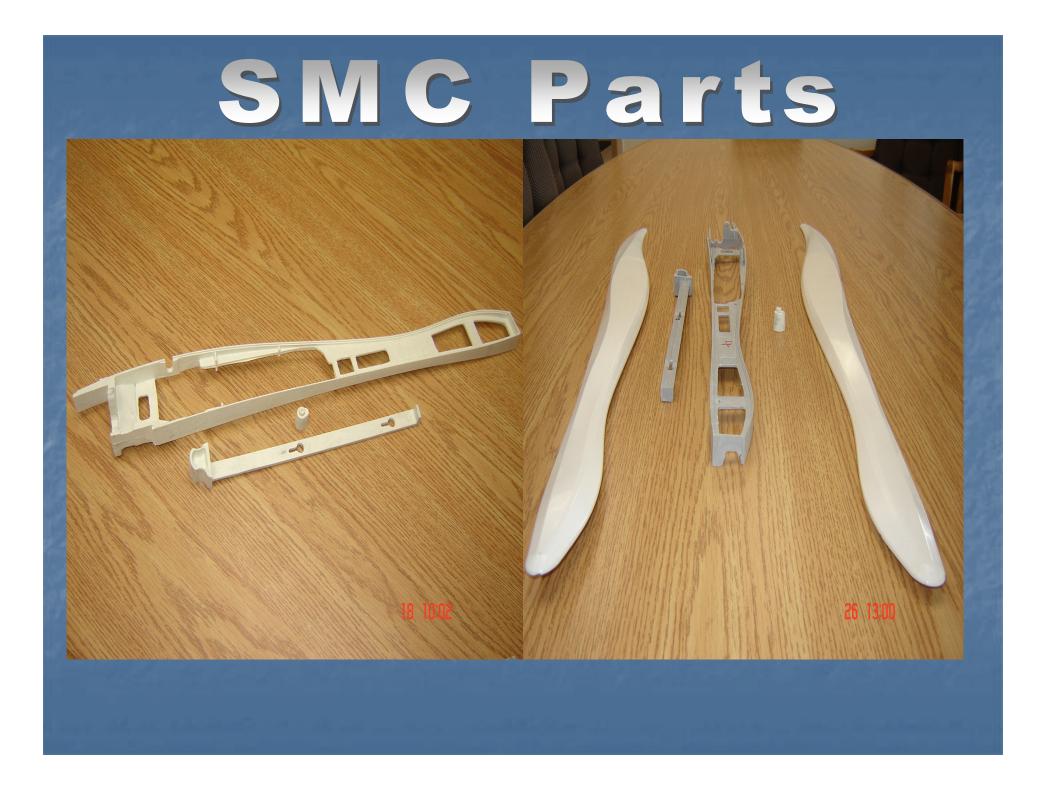
Electric Coil & Split-Cartridge Heaters













* Tool size 65" X 57" X 8" *Trimming Fixture with suction cups.



Water Jet Fixture





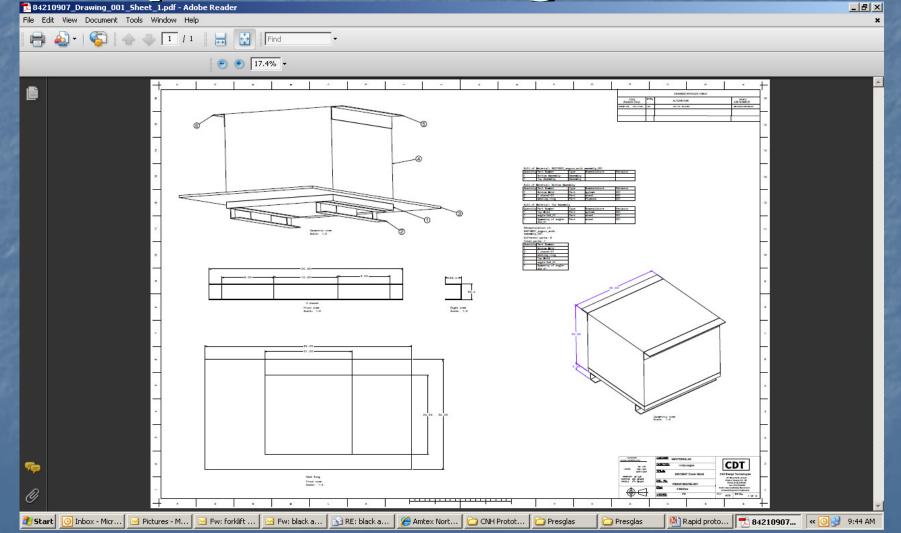


Composite Tooling

*Accurate tooling *Manufactures functional parts *Prototype Tooling *Low volume tooling *Low cost tooling ***Fiberglass Infusion models**



Composite Tooling





Composite vacuum & laminator mould





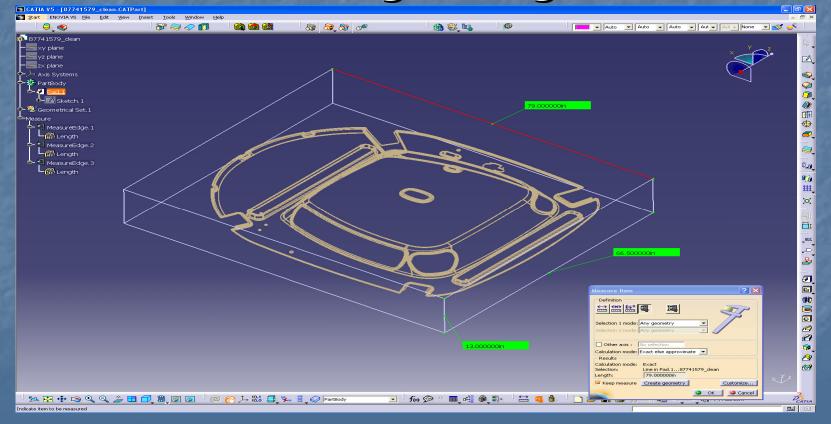
Composite Tooling

ABS Vacuum mould





Design Stage





Composite Compression Mould

* Tool size 79" X 70" X 17"

* Mould locators to Locate XYZ

*The mould was heated up to 350 C





Composite Compression mould





*The trim lines, cutouts & holes were machined on the mould to facilitate hand trimming.

*Pinch Thicknes 6mm +/- 2 mm

*None compressed areas 15 MM Thick

Hand Trimming



Trimmed Headliner

*Trim line tolerance +/- 3mm





Fender Vacuum Mould & Laminator



* Tool size 65" X 57" X 21"



Laminating TPO Vinyl

*Bladder laminating



Moulded & Trimmed Part

*Compression moulded part. *Pinch Thickness 3mm +/- 2mm

* Moulded temperature 350 F



Finished Parts





Composite Vacuum Mould

* Tool size 65" X 57" X 8"

***Vacuum Mould for a Headliner.**

*Built with cooling lines.

*Clamping ledge on two sides.





Composite vacuum & laminator mould



*Parts size 46" x15"X 8" (H) & 8" X 8" x 4" (H)

*Infusions model parts.

* Part Thickness 1/8"



Full size functional part models



* Tool size 60" X 55" X 8"
*Tooling Retro engineering
*Vacuum Mould with cooling lines





Composite vacuum & laminator mould



Rapid Prototype Tooling

Rapid Prototype Tooling



Production line Feed

