Polymer**shapes**

Aerospace

LIGHTWEIGHT | COMPLIANT | HIGH PERFORMANCE

There are a variety of reasons for using plastics in aerospace applications, particularly airplanes. Plastics are lightweight compared to metal, corrosion resistant, easy to fabricate, and offer a broad range of design flexibility in terms of color, texture, and pattern.

Plastic parts can last longer and require less maintenance, also coming in grades that are fully Flame, Smoke, Toxicity and Heat Release compliant.

As an approved OEM supplier, **Polymershapes** is equipped with the industry's largest distribution network, in-house expertise, and a focus on service. Contact us today to learn more!

COMMON APPLICATIONS

- Beverage Carts
- Cargo Containers
- Cockpit Visors
- Counter Backsplashes
- Dashboard Enclosures
- Radomes/Nose Cones
- Mirrors
- Trays and Tray Tables
- Toilets
- Ceiling, Flooring, Wall Panels and Partitions
- Luggage Compartments
- Light Lenses
- Signage
- Video Bezels
- Various Seating Parts
- Window Reveals, Shades and Dust Panes

Clear Applications

Polycarbonate

- Uncoated: LEXAN™ 9600, F2100, & F2000A
- Coated: LEXAN™ MARGARD™ MRAC Mar-resistant, FMRAC Formable Mar-resistant, FMR604 Formable 2

Mil Spec Acrylics

- Roehm cast acrylics
- Polycast acrylics

Thin-Gauge

- LEXAN™ FR60 and FR63 flame-resistant films
- PVDF Films for Lamination

Cabin Dividers

- Boltaron® 4350
- Jet Panel™ made with fully-compliant KYDEX® Clear FST
- Available in clear and custom colors

Window Shades

- LEXAN™ F5000
- Boltaron® 6800, 8800, 9200, 9230, 9250
- Custom lamination options available

Engineering Plastics

High Temperature

- PI (Duratron®), PBI (Celazole®), PAI (Torlon®), PEEK, ULTEM™

Chemical Resistance

- PEEK, PPS, PTFE, PVDF, NORYL

Bearing / Wear

- Nylon, Delrin®, UHMW, PET

Aerospace Compliant Foam Grades

- ULTEM™ Foam
- Thermosets – Glass, Canvas, Linen, etc.
- Thermoplastic Composites

Lightweighting, Aesthetics & Compliance

Fire-rated Sheet**

- Boltaron® 4330 High Impact
- Boltaron® 4350 Translucent with a Texture or Print
- Boltaron® 4351 Translucent Rigid Alloy
- Boltaron® 4355 Clear
- Boltaron® 4800 Low Smoke
- Boltaron® 4430 Opal
- Royalite® R57
- Royalite® R52

Flame/Smoke/Toxicity***

- LEXAN™ F6000
- LEXAN™ F6L300 (F6000 Light Weight)

Flame/Smoke/Heat Release Sheet****

- Boltaron® 9815 (Extruded, Pressed, Metallic, True Pearl, Decorative)
- Boltaron® 9815 Film
- Boltaron® 9850 Low Smoke
- Boltaron® 9200 (Light Opacity)
- Boltaron® 9850N Low Smoke and Heat Release

Fully-Compliant Sheet*****

- KYDEX® FST and XHR6000
- ULTEM™ 1668A
- ULTEM™ 1613V (Boeing)
- Boltaron® 9915 FSTH
- Radel® R-7700 (PPSU)
- Nylatron® FST

*FAR25.853 (a) & (d)
**FAR25.853 (a) 60sec vertical burn
*** FAR25.853 (a) and Boeing BSS7239 & Airbus ABD0031 Toxicity
**** FAR25.853 (a) & (d)
***** FAR25.853 (a) & (d) and Boeing BSS7239 & Airbus ABD0031 Toxicity

LEXAN™ Jet Mirror™

- Made from LEXAN™ FR polycarbonate, provides glass-like clarity
- Surface treated to resist scratches, abrasion and dents
- Flame retardant, meets vertical burn requirements
- Lightweight
- Virtually unbreakable – high impact strength

Innovative Solutions

LEXAN™ Jet Panel™

This fully-compliant product meets flame, smoke, toxicity and heat release requirements for cabin interiors.

KYDEX® Clear FST Sheet

The first ever water-clear, fully compliant Polycarbonate sheet offering design freedom.

Lonseal Aircraft Flooring

Lonseal offers a number of unique product collections that add a high-quality, modern look to any aircraft interior. These products are moisture and slip resistant, as well as providing flame spread control.. Several color and pattern options are available.

Value Added Services

- Thermoforming
- Vacuum Forming
- Pressure Forming
- Drape Forming
- 3- and 5-Axis CNC Routing
- Film Conversion
- Heat Bending
- Heat Stamping
- Cold Forming
- Edge Polishing

Quality

- ISO9001
- AS9100
- AS9120
- ITAR Compliant
- CMM
- Optical Comparator
- Engineering Support

Films and Processing Aids

Films

- LEXAN™
- ULTEM™
- Valox™
- PEEK
- Tedlar®

Processing Aids

- Bagging Films
- Breather Cloth
- Flash Tapes
- Peel Ply Fabric
- Release Films
- Sealant Tapes
- Honeycomb Core Panels
- AdTech Adhesives & Fillers
- Tooling Board
- Cargo Liner

Miscellaneous

Cut To Size

Sheet, plate, or rod cut to the length, width, or thickness you need. We also can provide machined-to print parts – just send us a print.

Value-added services, and quality certifications vary by location. Contact your local facility for more information.

ISO 9001, AS9100 and/or AS9120 compliant facilities:

US:
- Santa Fe Springs, CA
- San Diego, CA
- Dallas, TX
- Orlando, FL
- Seattle, WA
- Fresno, CA (Film Division)
- Tulsa, OK
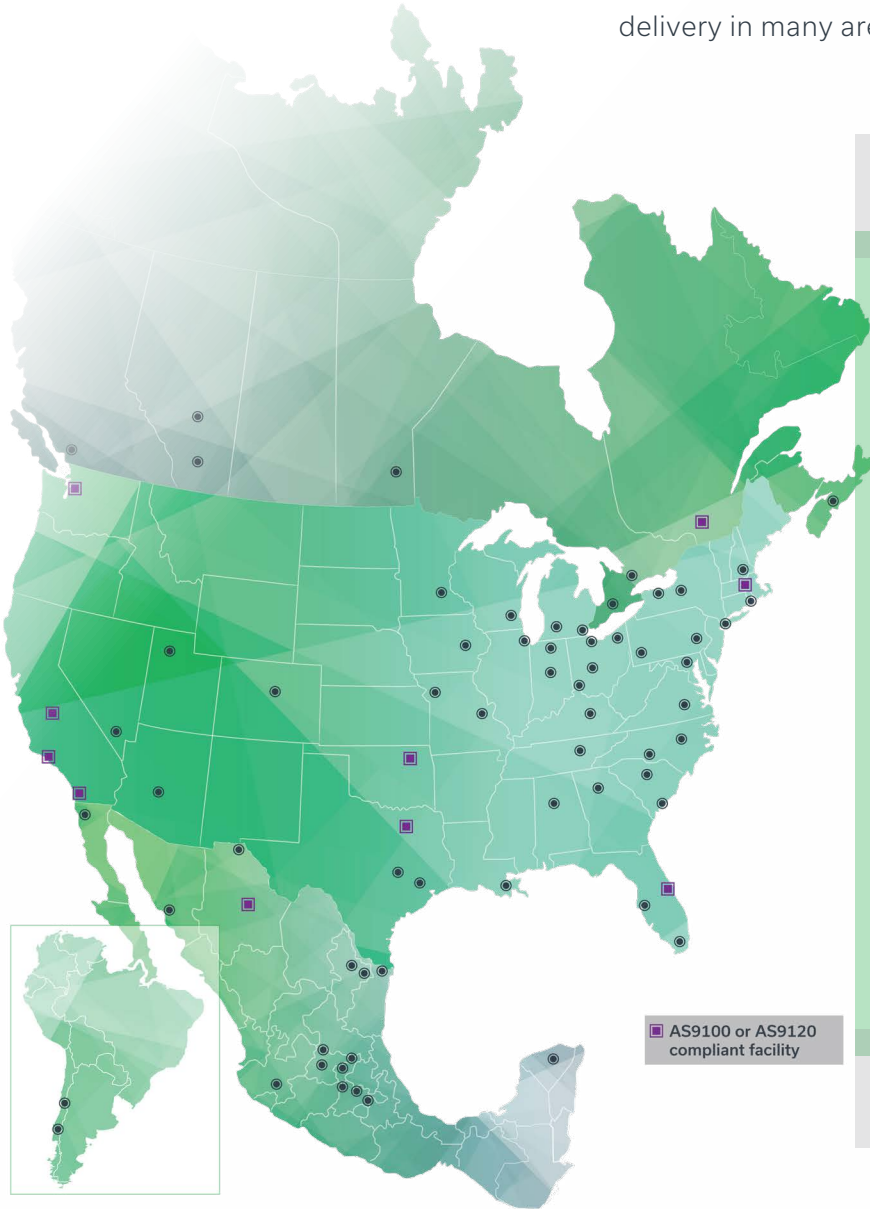- Tyngsboro, MA
- Pittsburgh, PA

Canada:
- Montreal, CN

Mexico:
- Chihuahua, MX

You're the Center of All We Do

Polymershapes is the leading plastics distributor dedicated to you, the Center of All We Do. With over 75 years of experience, our team of experts provides extensive industry knowledge to deliver innovative solutions to your material and application needs. With 80 locations across the United States, Canada, Mexico, and Chile, Polymershapes' network offers inventory from world-class manufacturers and same-day delivery in many areas.

■ AS9100 or AS9120 compliant facility

INTEGRITY + ACCURACY
You can trust.

- Local distributor of plastic sheet, rod, tube, film, and associated products

- Expert services: cut-to-size sheet, CNC routing, machining, and film conversion

- Wide range of products: 17,000+ SKUs

- Material selection and application support

- Extensive 75+ year industry heritage

Contact us for quotes and availability:

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