

Plastic Bearings and Surface Modification Fill a Dental Design Cavity

■ A partnership with TriStar gives you a competitive edge.



Dental offices have gone from drab to fab in many markets, as patients look for offices that not only deliver superior oral care, but provide a sleek, comfortable office experience. In some cities, the standard dental office has even morphed into the stylish "dental spa." And both dentists, and those who design for them, are taking note - and contacting TriStar to improve the functionality and esthetics of their equipment.

Our partner contacted us to replace the sticky, oilite bronze bearings in their dental chairs. They noted that over time the bronze bearings lost lubrication and ran dry, which caused the chairs to resist fluid movement. This posed a problem for dentists (who were unable to achieve proper chair positioning for exams), and patients (who had difficulty entering/exiting the chair). The dry bearings also released a loud, shrill sound as the chair moved into position.

TriSteel reinforced bearings smooth dental chair movement

Our [engineering experts](#) replaced the dry bronze with self-lubricating TriSteel; a reinforced plastic bearing.



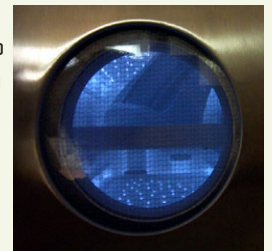
TriSteel bearings

have given the chairs fluid, consistent movement to enhance positioning.

Based on this success, our partner has also specified TriSteels to improve the swivel movement of their exam stools and instrument trays.

...While Surface Modification enhances chair painting

Our [Surface Modification lab](#) also added to the design by enhancing the custom painting of the chair armrests.



In these high-end offices, chairs are painted to match the color palette of the office, yet the constant friction on the armrests caused the paint to peel.

After a thorough [plasma surface cleaning](#), we enhanced the adherence of the paint and eliminated the peeling problem.

Do you have a unique equipment challenge to overcome?

[Need to machine custom parts](#) for a specialty application? [Connect with the plastic bearing pros at TriStar](#), and we'll fill your design cavity - no anesthesia required!

We're ready to put our engineering expertise to work for you from prototype to production.

Engineering | Custom Fabrication | Manufacturing



CJ Composite

- Self-Lubricating
- Low weight | High Strength
- Chemical Resistance
- Direct replacement for Bronze



Ultracomp[®]

- Self-Lubricating
- High Load | Low Speed
- 54,400 PSI Compressive Strength
- Exceptional Resistance to Vibration and Impact



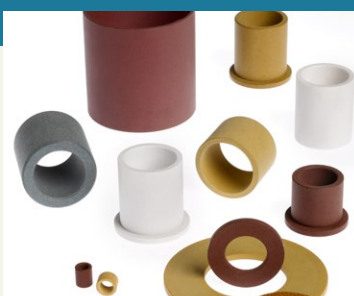
TriSteel[™]

- Self-Lubricating
- High Load | High Speed
- Metal Backed Bearing System
- 100% Lead Free



Rulon[®]

- Self-Lubricating
- Low weight | High Strength
- Low Coefficient of Friction
- Chemically Resistant



Enhanced Materials Division

- Plasma Surface Treatment
- Specialized Primers & Coatings
- Material ID & Selection
- Process Engineering | Analysis & Testing



TriStar



Engineered Plastic Solutions[™]

tstar.com

1.800.874.7827

©TriStar Plastics Corp. All rights reserved. Ultracomp is a registered trademark and TriSteel is a trademark of TriStar Plastics Corp. Rulon is a registered trademark of Saint-Gobain Performance Plastics Corporation.