

Automotive Welding

Automotive plant improves the performance of its welding machinery

An auto assembly plant needed robust welding and assembly machinery that did not require a lot of unnecessary maintenance. This was especially important because the harsh environment within the auto assembly plant contained welding spatter, dust, and water. They needed a standard design system that included no-maintenance linear slides (guide bar slides) that were both cost effective and reliable.

The PBC Linear solution

Simplicity plain bearings and pillow blocks, and nonhardened shafting were specified for the new slide design for many factors. The pillow block's aluminum shell reduced the overall weight of the slide system. The bearings outperformed the linear ball bearing competitors by tolerating higher shock loads and temperatures. The welding spatter and other environmental hazards were kept out of the bearing by tough molythane seals.

Results / ROI

The customer is pleased with the Simplicity bearing's higher performance and reduction in weight. Shock loading, temperature extremes, and contamination did not adversely affect bearing life. The result has been the low-cost implementation of thousands of bearings into slide systems that are now smooth, quiet, and reliable.

Details

Components:

Simplicity Bearings: FL16, FL20 Pillow Blocks: P12, P16, P20

Retrofit or OEM: OEM

Industries: Automotive

Problem:

An auto assembly plant needed a cost-effective and reliable welding and assembly machinery that would work well in harsh environments and avoid unnecessary maintenance.

Solution:

Simplicity plain bearings and pillow blocks reduced the overall weight of the slide system while withstanding environmental hazards.