

Lafayette Steel and Aluminum Increases Process Capability with the FaroArm

For more than 100 years, the Oscar Winski Company (oscarwinski.com) has served the needs of its commercial and industrial customers. They excel in scrap metal recycling services and products, fabricated steel and aluminum products, and metal demolition. Lafayette Steel and Aluminum, their largest division, purchases steel and aluminum coils from mills, and then processes it to customer specifications.

PROBLEM

For their extruded and fabricated parts, they need several different types of measurements. Parts are often in excess of 100-in. long, tend to twist after forming, and can be flexible at those lengths. This presented challenges for accurate measurement.

Lafayette used height gauges and digital indicators on a steel welding table with shims and blocks to try to hold the part flat and stable. "These methods were not repeatable," said Quality Assurance Director John Powell. "About the only thing we could be sure of was that we had taken a measurement."

The old methods were completely inadequate, cumbersome to set up, and Powell's team could take only a few points on each set up. They needed to be able to quickly and easily take many measurement points on each part.

SOLUTION

"After comparing the capability, usability, cost, and current user recommendations, we performed our own capability studies and the FaroArm beat the competitors by a large margin," said Powell.

The FaroArm provided greater accuracy and its usability was favored by those who tested it because it seemed to "float" better than the competitors and take less effort to control movements.

Lafayette uses the FaroArm for length, angularity, hole position, diameter, radius, and flatness measurements. They are able to meet automotive Product Part Approval Process (PPAP) requirements that were previously a struggle. They also use the FaroArm for trouble shooting, machine set-up, and reverse engineering.

RETURN ON INVESTMENT

The combination of versatility and accuracy in the FaroArm gives Lafayette a reliable measurement system that can be used on their complete range of products. The ability to highlight measurement variation and product consistency that was not previously understood has allowed Lafayette to improve their processes and capabilities and reduce their amount of scrap.

Powell estimates that more than 1,500 man-hours and \$30,000 have already been saved using the FaroArm. On their largest fabricated part, what once took two people six hours to measure, now takes one person only 10 minutes. The time savings and increased process capabilities gained with the FaroArm have been a great value to Lafayette Steel and Aluminum.

