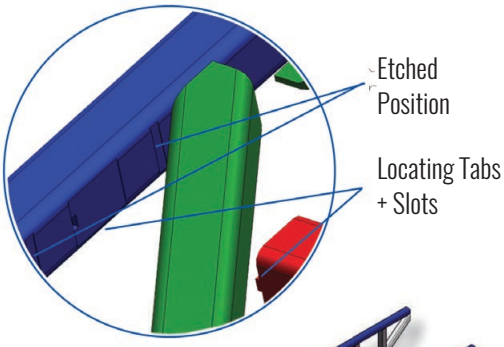
ACE METAL CRAFTS
company

Value Engineering a Tube Laser Solution.

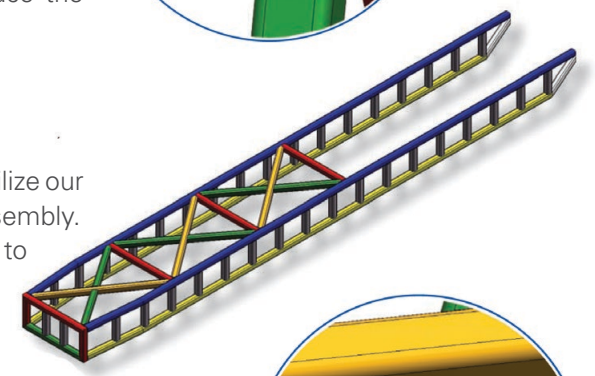
THE CHALLENGE

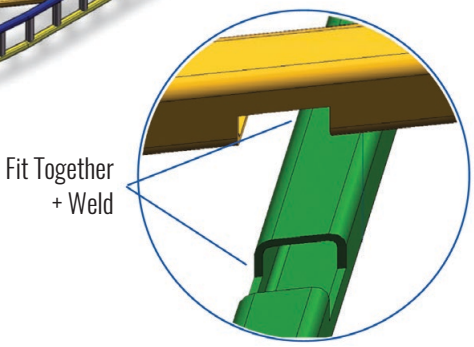
A Geotechnical Drill Manufacturer designs and builds Drilling Rigs for Soil Sampling, Soil Exploration and Groundwater Monitoring. With strong sales and a large backlog in their welding department, they were behind schedule in fabrication of the mast towers for their Rigs. This assembly is welding intensive and required hours of setup, weld preparation, and fit-up to manufacture. Engineering was looking for ideas to reduce the welding time of this crucial structural tube weldment.



THE SOLUTION

Engineering teamed up with ACE METAL CRAFTS COMPANY to utilize our new Automated 3-D Tube Laser to process the tubing for weld assembly. Our goal was to value engineer the mast tower with the client to reduce the welding hours, allowing this Drill Manufacturer to meet their Drill Rig shipment requirements. Our manufacturing engineering team was excited to work with this client's Engineering group on the project. We came up with tab, groove, etch, and miter techniques that eliminated most of the welders' setup and measuring during weld assembly. The total weld assembly time was reduced by 50% to 60%, according to the client. There were also improvements in quality: our amazing automated tube laser cut all tubes within +/- .005. This made the frame fit-up in welding better, making the finished frame straight, square, and to size. The client also appreciated how we delivered on our commitment to get the value engineering and processing correct from the start of the project.





This Geotechnical Drill Manufacturer gained from the improved throughput, allowing for timely shipments of Rigs to their customers. Engineering is looking to use Tube Laser technology to value engineer their tube frames in the future.

To learn how our 3-D Tube Laser will enhance your tube weldment project,
contact Vice President of Manufacturing Angela Pitzo at angela.pitzo@acemetalcrafts.com