GLOBAL SHOP SOLUTIONS CASE STUDY

Forma-Fab Metals, Inc.

Deep in the heart of the North Carolina Piedmont area sits a sheet metal fabrication company called Forma-Fab Metals, Inc. Founded in 1996 by Richie Richmond, this custom job shop has quietly built a reputation for quality metal fabricated products at competitive prices.





Various Forma-Fab Metals faceplates that entail fabrication, powder coating, and silkscreening processes.

An electrochemical autosampler used by many different industries.

With a staff of 30 skilled machinists operating out of 50,000 square feet of production space, Forma-Fab Metals turns out thousands of different metal components for a wide variety of industries, including medical, high-tech electronics, point of purchase kiosks, and standard industrial/commercial enclosures. These enclosures include cabinets, housings, panels, brackets, racks, bus bars, and covers.

Forma-Fab Metals' customers range from small local companies to global Fortune 100 enterprises. Their products are made with various light-gauge sheet metals, including mild steel, aluminum, stainless steel, galvanized, brass, copper and plastics. Additional services offered by Forma-Fab Metals include laser cutting, press brake forming, welding, powder coating, silk screening, design/CAD engineering, and more.

After a decade of stability, Richmond decided in 2006 that the time had come to grow the company at a faster rate. However, he recognized that the disjointed spreadsheets and software systems being used to manage the business at that time could not support his growth objectives. Seeking a more sophisticated business management tool, Richmond asked Director of Operations Ron Tedder to recommend a good ERP system. After evaluating several candidates, they settled on Global Shop Solutions ERP software.

"Initially, we came very close to buying a different system that I already had experience with," says Tedder. "At the last minute someone recommended we check out Global Shop Solutions. We did, and were instantly sold on its powerful Advanced Planning & Scheduling (APS) module.

"APS gives us a lot of flexibility in how we manage our production schedules. We can easily manipulate the data to see what will happen if we make changes to the existing schedule. The visual aspects of APS make it easy to absorb and understand all the data. We can look at current and future capacity by workcenter. And we can track the efficiencies on each and every job. When it comes to scheduling, Global Shop Solutions is head and shoulders above everyone else."

Better Data = Better Decisions

Soon after implementing Global Shop Solutions ERP software, Richmond began noticing dramatic improvements in key areas of the business, including material requirements planning (MRP).



For starters, switching from the old manual process sheets to Global Shop Solutions ERP software's integrated system dramatically reduced the time required to purchase the raw materials and components needed to run the business. At the same time, billing, shipping and invoicing accuracy grew by leaps and bounds, especially in terms of reconciling billed and shipped parts with invoiced parts.

"With Global Shop Solutions, we discovered that shipping parts under the same system in which they are invoiced eliminates those 'black holes' where some parts get shipped but never get invoiced," says Richmond. "You always want to get paid for what you ship, so I was really happy to see improvement in that area."

The ability to easily review job history and evaluate recent work orders for specific jobs quickly improved job costing. It also helped to determine when Forma-Fab Metals had the right pricing structures in place and when they needed to adjust margins. In addition, when customers call in with an "I need it yesterday" job, the ERP software now enables Forma-Fab Metals to respond more quickly.

"When somebody needs a part real quick, I can look at the capacity in APS and identify any holes in the schedule," says Tedder. "As a result, I can often promise delivery quicker than I would have in the



A fully-assembled medical cabinet ready to be wired for the customer.

past because Global Shop Solutions gives me the confidence that we can deliver on time. Rather than just give the customer our standard four-week lead time, I can move up delivery dates based on what the system tells me we can do."

Perhaps most important, Richmond and his team began getting the information they needed from Global Shop Solutions ERP software to make better decisions for customers and for the company.

"One of our biggest customers – a large, Fortune 100 enterprise – indicated an interest in giving us significantly more business if we agreed to reduce costs by a certain percentage on some of our products," says Richmond. "With all the data available from the ERP software, we determined that we could offer certain cost considerations without hurting our margins, and still grow the account in a profitable manner. If we had tried to make that decision without the complete customer history that Global Shop Solutions provides, it would have been like throwing darts blindfolded."



A point-of-purchase kiosk for one of Forma-Fab Metals' Fortune 500 customers.

50% Reduction in Inventory

To maintain a high-level view of the business, Richmond spends most of his time in the business intelligence and customer relationship management (CRM) applications.

Using business intelligence, Richmond tracks a wide variety of key management metrics like on-time delivery rates, quality goals versus actual performance, and setup times and costs. He then provides ongoing feedback to shop floor personnel to assist them in making improvements in those areas. In CRM, he accesses the data he needs to facilitate a high level of customer service and keep abreast with all aspects of key customer accounts.

"I used to spend a lot time in the Supply & Demand screen because it has a lot of useful data," says Richmond, "but now I'm using CRM more because it's tied to the customer. When a customer calls in with a question, I can pull up CRM and tell them anything they need to know about a part, their account, or their order history. You name it and it's right there in CRM at the click of a button."



As Director of Operations, Tedder divides his time between the Supply & Demand screen and the APS application. In Supply & Demand he gets the data he needs to simplify processes and reduce costs in areas like finished goods inventory and on-hand inventory for raw materials. Since implementing Global Shop Solutions ERP software, Forma-Fab Metals has experienced a 50% reduction in finished goods and work in progress (WIP) inventories, and a 20% reduction in raw materials inventory.

"Despite carrying a lot less inventory, we're also seeing fewer issues with material shortages on the shop floor," notes Tedder. "That's because our MRP is now directly tied to everything in Global Shop Solutions rather than a manual system. When you get better information, you can make better decisions, whether it's in inventory, shipping, or any area of the business."

A Building Block for Growth

Experienced Global Shop Solutions ERP software users know that it's not just about cutting costs and simplifying operations. It's also about developing the ability to compete more effectively in the marketplace. Richmond agrees.

Over the last 10 years, lot sizes in his business have been cut in half, and the inventories his customers carry have been reduced five-fold. As a result, Forma-Fab Metals must respond much faster to customer requests and reduce delivery times in order to stay competitive. The ERP software allows them to do this by identifying exactly how much capacity they have at any given time.



Commercial oven cores that are shipped just-in-time directly to Forma-Fab Metals customer assembly lines.

"The scheduling information we get from APS enables us to make accurate decisions about when we can actually get a product out the door," says Richmond. "This allows us to take on business we know we can produce and turn away jobs that would cause too much disruption to the schedule."

"We can track job costing, margins and profitability – for every part, for every customer – with amazing precision," continues Richmond. So if we start getting squeezed by competitors, we can identify areas where we can safely take less margin and still make money. We feel comfortable doing that because we know exactly what our margins are."

According to Tedder, the over-riding value of Global Shop Solutions ERP software is far more than just a feature or a function. It's the way the ERP software brings everything together under one integrated system and then makes the information readily accessible to everyone in the business.

"With Global Shop Solutions, we can see everything that drives the business," says Tedder. "We have all the information to make decisions for today and into the future, and it's all right there at our fingertips. Global Shop Solutions is truly a complete ERP system."

For Richmond, Global Shop Solutions ERP software provides an essential ingredient in the company's future growth.

"We're in the process of positioning the company for some serious growth in the next few years," he says. "It's good to know that with Global Shop Solutions, not only do I have the information I need to make decisions that will fund the growth for the future of this business, but so does everyone else in the company. That's the building block we need to have in place before embarking on this growth plan."

"I don't think Forma-Fab Metals will ever grow bigger than Global Shop Solutions can handle, so we don't have to worry about doubling the business and then finding out that we need another ERP system," concludes Richmond.

