IOWA STATE UNIVERSITY
Center for Industrial Research and Service

CIRAS NEWS

VOLUME 54 | Number 1

AT A GLANCE

Artistic Manufacturing

FOUNDED: 1948

OVERVIEW: The company manufactures aluminum, brass, chrome, and silver-plated churchware for congregations around the world.

EMPLOYEES: 40

IMPACT: Estimated impact of more than $200,000 from sales of new disposable communion cups and a new device to help fill them.

FOR MORE:
https://www.artisticchurchware.com

Artistic Manufacturing—A Business Bringing New Ideas to Church

The shelves in Randy Monk's Altoona, Iowa, office are lined with the artifacts of decades past. At one corner sits a stack of the stamped metal ashtrays Artistic Manufacturing Corporation once produced as a sideline. A few feet to the right, you'll find one of the small, decorative metal pots that the company made and sold to florist shops until the 1960s. In between those historical outposts sit older versions of the crosses, cups, and communion plates that have been the bulk of Artistic's sales for more than 50 years.

Churchware has been a good business, Monk explains, but it's by no means been immune from the problems found in other industries. Low-cost foreign competitors in recent years have become an increasing threat to Artistic's market share, while online retailers have caused problems for the Christian bookstores that used to be the company's major retail outlet.

"Things have changed," Monk, Artistic Manufacturing's owner and president, said simply. "You just have to keep up with that, or you're not going to survive."

"We would not be doing what we are doing right now without the help of Iowa State," Monk added later. "For us to be doing this on our own, it would be too much."

With technical assistance from CIRAS, Artistic Manufacturing Corporation this winter is poised to announce its second new product of 2018—a patent-pending device (and companion tray) that will let church workers rapidly fill small plastic communion cups by pouring wine into one larger, funnel-like container. The new product follows a new line of

Continued on page 2

INSIDE THIS ISSUE

On the Cover: An Artistic Manufacturing employee assembles a candelabra.

CIRAS Mission: *Every day we will enhance the performance of industry through applied research, education, and technical assistance.*

CIRAS is supported in part by the DoC/NIST Manufacturing Extension Partnership, the DoD/DLA Procurement Technical Assistance Program, the DoC/EDA University Center Program, and the State of Iowa Economic Growth Committee appropriation for the CIRAS Technology Assistance Program.

CIRAS News is published quarterly by the Center for Industrial Research and Service and edited by the CIRAS publications team. Design and production is by Hobbs Designs, LLC. Please send questions, comments, or address changes to ciras.news@iastate.edu.—October 2018 HD18093

compostable communion cups that Artistic unveiled earlier this year in a bid to appeal to more ecologically minded congregations.

> "This is an excellent time to refresh the product line a little bit. We can't just keep doing the same thing."
>
> *— Randy Monk*

For Monk, both changes are calculated steps designed to keep Artistic Manufacturing in front of its foreign competitors and to provide products that no one else has: "This is an excellent time to refresh the product line a little bit. We can't just keep doing the same thing."

Artistic Manufacturing's first church-related products were designed by Ellis Monk, Randy's father.

The elder Monk, who also served on the CIRAS Advisory Board from 1985 to 1988, "started out sweeping floors at the company when he was in high school," Randy said. After college and a stint in the Navy, Ellis took over Artistic and, according to a chuckling Randy, eventually purchased the company by taking out "a second mortgage on the house, the kids, and the dog."

By the 1960s, Ellis Monk also held a leadership position at Grant Park Church in Des Moines. When the church developed a need for a new altar cross, it fell to Ellis to do the shopping. He ultimately decided that Artistic could produce better work than anything that was available on the market. Then, encouraged by a friendly retailer, Ellis decided to take his newly manufactured cross to a St. Louis convention of the Christian Booksellers Association—where he promptly made enough connections to launch a new sideline for his company.

Today, according to Randy Monk, Artistic is the only American manufacturer that still produces a full line of churchware, from altar crosses and candelabras to collection plates and communion trays. The company still sells through a diminished network of Christian bookstores, as well as through catalogs and a growing-in-importance website.

The current revival of Artistic's product line began roughly two years ago, when Monk approached CIRAS account manager Paul Dunnwald for help in determining the inner lining for a flagon. A discussion of various polymers brought CIRAS project manager Shankar Srinivasan to the company, where he noticed the disposable communion cups and suggested using polylactic acid, a corn-based plastic that is compostable.

At a minimum, Srinivasan believes the new cups will help Artistic maintain stature in the industry.

"It will get them noticed," he said. "They'll be the guys who invented the compostable cups."

Artistic started selling the new cups this past spring, with the first shipment going to a congregation in Iceland.

Top, illustrations of Artistic Manufacturing's upcoming communion cup filler. Wine poured in the top (green) piece will trickle to cups in the (red) tray below. Bottom, a communion tray and boxes filled with Artistic's new compostable cups.

"I wouldn't say it's overtaken the industry," Monk said. "But slowly, the word is getting out. Certainly, curiosity has been piqued."

Cup conversations eventually led to another discussion about Artistic's long-standing goal of creating a device that simplified the filling of communion cups. Many decades ago, the company patented a metal apparatus that was designed to funnel wine into multiple cups simultaneously. But Artistic managers never really liked how the product worked, so the effort was abandoned.

At CIRAS' suggestion, two teams of mechanical engineering students from Iowa State University revived the idea in 2017 and worked to refine the design as part of a capstone project. The students eventually simplified the concept to create a form of self-leveling, multihole funnel.

Monk believes the cup filler will prove popular with congregations in which elderly church members do most of the work preparing for communion services. Artistic Manufacturing currently sells a squeeze bottle for filling communion cups, but Monk believes the new device will help churches avoid the risk of repetitive stress injuries by filling dozens of cups at the same time.

"I think we've met the need," he said, praising the Iowa State students for "leading us to an answer that we'd been looking for 30 or 40 years."

"You can't stagnate," Monk said simply. "The earth continues to spin. We have a very mature product line. One would normally think, 'Well, what can you do with it? A cross is a cross, the collection plate is the collection plate, and communion ware serves cups. What else can you do with it?' Well, there is something else that can be done with that if you take a fresh look at the problem.

"CIRAS provides that—as well as the expertise to tell us whether or not it works."

For more information, contact Paul Dunnwald at dunnwald@iastate.edu or 515-509-1377.

Keith Vorst and a new machine that will help him test film food bags.

Food Packaging Consortium Looks to Grow

Keith Vorst is busy.

Flush with attention from Iowa manufacturers seeking a front-row seat in a new era of food safety research, the three-year-old Polymer and Food Protection Consortium that Vorst directs at Iowa State University has more than doubled its lab space since 2015. During that time, it's also submitted five scholarly articles for publication and multiple patents involving new techniques for manufacturing packaging from recycled material.

Now, the consortium is looking for a new home.

Vorst in August launched a multimillion-dollar drive to create a new, dedicated research facility for the consortium in the ISU Research Park. A key priority in the new building, he said, would be creation of the nation's first process for certifying the quality of recycled material and biobased packaging.

"Our goal is to become the premier packaging research institute in the nation," he said. "We believe we can be leaders at industry collaboration and research."

Vorst, an associate professor in the Department of Food Science and Human Nutrition, said the new building will let the consortium expand its research and make a strong public statement about Iowa State's commitment to the science of food packaging.

With initial and ongoing support from CIRAS, the consortium opened at Iowa State in 2015, one year after Vorst's arrival from California Polytechnic State University. The group is funded largely by food businesses in exchange for some control over selecting the avenues of research.

Consortium projects over the past two years have included probing the safety of microwave popcorn bags, evaluating the relative merits of different types of retail meat display cases, and testing new uses for recycled material in packaging.

Food companies nationwide are rushing to improve their products, Vorst said. Updated packaging, using less material or more recycled material, both saves firms money and helps them market to an increasingly green-minded public.

"It's not just about cost savings," Vorst said. "Now, it's about value added and improving performance."

"Recycling, reusing plastics—these are things that are not going away."

For more information, contact CIRAS food industry account manager Brenda Martin at bkmartin@iastate.edu or 515-570-5282.

Capstone Students Hush Clamoring Granulator at Orbis Corporation

The Orbis Corporation's plastic container manufacturing plant in Monticello has a significantly quieter corner of the factory now, after a capstone project by Iowa State University engineering students reduced the noise from a nearby granulator.

Orbis Corporation, which uses plastic injection molding to make a wide variety of containers, frequently must grind up changeover material for use in certain recycled resin products of a different color. The problem, according to Orbis operations manager Doug Wortman, is that the granulator used for such tasks runs at roughly 114 decibels—91 when measured at a frequently occupied workstation 40 feet away.

Gray sound-dampening curtains quieted the Orbis Corporation granulator.

A team of seven students from the Department of Agricultural and Biosystems Engineering worked over the fall 2017 and spring 2018 semesters to identify multiple options and suggest changes to the Orbis granulator area.

"They came up and did some modeling and studied the sound levels to understand the threshold values that we wanted to achieve," Wortman said. "They engineered solutions such as sound-deadening curtains and other sound-absorbing material, as well as applying spray foam on the grinder's upper chamber itself."

In the end, the students spent roughly $5,000 and got the sound level at the workstation slightly below the 80 decibels that Wortman had requested. Orbis estimates the solution saved $13,000 that otherwise would have been spent on constructing a new granulator room.

Wortman said he frequently uses capstone projects as a way to solve problems while simultaneously helping young engineers "learn a little more about what goes on in a manufacturing plant, so they can decide whether that's something they want as a career."

"We wanted to reduce the noise for our operators," Wortman said. "They made a significant difference."

For more information, contact Carey Novak at cenovak@iastate.edu or 515-408-4257.

Learning Opportunities Abound at ILC Events

The nice thing about Iowa Lean Consortium events, according to Sara Richards, is that the useful tips are all around you.

Richards, a continuous improvement manager at Vermeer in Pella, attended two ILC events last year, including a May workshop in Omaha where facilitators Tracey and Ernie Richardson helped participants simulate a "real-life, hands-on" approach to continuous improvement.

The two-day Omaha event (photo above) is one of ILC's most popular. It included both discussion about the best culture for Lean organizations and teachings about the standards, flow, and employee development required to develop Lean.

Richards praised the quality of the information—even the things she says Vermeer already practices.

"There was a lot of stuff that I've heard over and over," Richards said. "But there's always something that you're going to learn."

Sometimes in unexpected ways. For example, Richards picked up several new ideas from chatting with other participants during the event. One idea, acquired when Richards and her colleagues bumped into another group of participants on the way to a restaurant, has since been shared with Vermeer colleagues as a practice they might want to adopt.

"These events are just a great opportunity to be around people and learn what they do," Richards said. "That to me is as big a benefit as anything else."

For more information, check the Iowa Lean Consortium's events calendar at http://www.iowalean.org/event.

Dickson Industries Opens New Doors by Achieving Global Quality Standard

A 72-year-old Des Moines company with a long history of making products that boost the flavor and appearance of meat is now pursuing new opportunities after CIRAS helped the firm obtain a Safe Quality Food (SQF) certification.

David Dickson, president of Dickson Industries, said his company obtained its certification last March after a CIRAS gap assessment helped Dickson understand the quality requirements and prepare for the review.

"We operated under many of the quality standards already, but we didn't have the paperwork and the proof that we were actually doing it," Dickson said. "This really was to help us with the product line, to ensure quality and help customers realize that we do take this seriously, that we're proactive about safety."

CIRAS account manager Brenda Martin said more and more Iowa food companies are pursuing independent food safety certification, usually in the hopes of making themselves more attractive to demanding would-be customers.

Dickson Industries last year estimated that the economic value of achieving SQF certification would be more than $1.3 million, mostly in new and retained sales.

"Companies that recognize the market potential of having it are doing it, and it's paying off," Martin said of the certifications. "It opens a lot of doors to more customers. . . . It's really about having solid documentation for your food safety procedures and then making sure that your employees actually carry it out and do things the way you say you're doing it."

Founded in 1946, Dickson Industries sells "pre-consumer" fabric food items, including specialized netting that many producers wrap around cuts of meat during smoking. These products enhance flavor and create patterns on the product's surface.

The company first approached CIRAS several years ago for help interpreting quality standards set by the Safe Quality Foods Institute. Work to get the company ready for its SQF audit accelerated in 2017, when Dickson hired Wilder Melendrez as its new quality assurance manager.

"If you're starting from scratch, it could take companies a couple of years to get ready because it takes a lot of human resource capital," Martin said. Dickson "formed a great team. They listened to everything we said. They attacked this, they buckled down, and they did it."

"The gap assessment really helped me out with just structuring the whole system in a way that we could understand it," Melendrez said. "CIRAS went through the whole system following the SQF Code and told us where we were lacking and what we were doing well. Once we finished that, then we were just revising and fixing what we needed to fix."

AT A GLANCE

Dickson Industries

FOUNDED: 1946

OVERVIEW: The company makes quality fabrics for multiple markets, ranging from food processing garments to sporting goods.

EMPLOYEES: 48

IMPACT: Estimated $1.3 million in new and retained sales.

FOR MORE: https://www.dicksonindustries.com

For more information, contact Brenda Martin at bkmartin@iastate.edu or 515-570-5282.

Dickson Industries makes fabrics for food handling (left) and garments for a variety of industries.

CIVCO's Solstice™ SRS Immobilization System Speeds to Market Thanks to CIRAS Scanner

An Orange City manufacturer of medical devices found a faster, cheaper, and more precise way to bring its new product to market after CIRAS showed the company how industrial scanners could be used to prove the product's effectiveness.

CIVCO Radiotherapy, a 36-year-old company that makes a broad variety of radiation therapy products, created the Solstice SRS Immobilization System to keep patients immobile during stereotactic radiosurgery (SRS) and stereotactic radiotherapy (SRT). Both procedures involve delivering high-dose radiation to very specific areas of the head and neck.

Doctors say the higher doses shorten the course of a patient's radiation therapy, meaning fewer treatments. But the process requires extraordinary precision in terms of how patients are positioned when the radiation is delivered.

"Not having a person move is very important" because it aids doctors both in delivering treatment and reading subsequent scans, said Chris Hill, director of the CIRAS Technology Assistance Program. "They really would like to be able to get you back into that exact same position so they can see: Is that tumor moving? Is it growing? Are we treating the same area?"

> "We had really two paths forward. We could either take it out to a clinical site and have them use it, which takes a lot of money and time, or we could find some other way to prove our effectiveness."
>
> — *Allen Oetken*

Allen Oetken, CIVCO's lead quality engineer, said the Solstice SRS Immobilization System was designed to give doctors more control over patient positioning and more ability to "make adjustments on the fly." The company's intention was to create a device that restricts patient movement to no more than 1 millimeter during SRS and SRT treatment. Once the device was built, however, CIVCO needed a way to verify that it had achieved the required accuracy.

AT A GLANCE

CIVCO Radiotherapy

FOUNDED: 1982

OVERVIEW: The company designs, manufactures, and distributes a variety of radiotherapy products.

EMPLOYEES: 115

IMPACT: $150,000 to $200,000 in avoided costs.

FOR MORE: https://www.civcort.com

"We had really two paths forward," Oetken said. "We could either take it out to a clinical site and have them use it, which takes a lot of money and time, or we could find some other way to prove our effectiveness."

Enter CIRAS.

After two days of tests in spring 2018, Hill and CIRAS project manager Mark Williamson ultimately created a way to attach reference points to the Solstice device and track a patient's positioning via a scanner that ordinarily is used to create computerized designs of mechanical parts.

Oetken estimates that the work saved CIVCO $150,000 to $200,000 and several months of time that the company otherwise would have spent lining up a partner hospital and convincing patients to use the experimental device. In September, the U.S. Food and Drug Administration cleared the Solstice SRS Immobilization System for use.

"It greatly expedited our time to market," Oetken said. "If we needed to go the clinical route on this, we wouldn't even be near the point of submitting this for FDA clearance. That would have taken at least six more months."

For more information, contact Mark Williamson at mdwmson@iastate.edu or 515-509-7024.

A Walsh employee handles finished doors.

Walsh Door & Security Keeps Growing as CIRAS Guides

A rapidly growing Des Moines commercial door and electronic security company has become more efficient, more professional, and safer thanks to a long-standing CIRAS relationship that continues to grow.

Walsh Door & Security began as a builders' hardware company, but the business evolved over the years to become one of very few U.S. firms that offer customers both physical barriers (doors, frames, and hardware) and electronic security (such as access control and video surveillance systems). Marty Walsh IV, co-president of the family-owned company, said the firm has grown steadily on both sides of its door and security business, even as the electronic offering expands.

"We're evolving into a company that doesn't exist anywhere in this state," he said. "We're the ones that other people are going to benchmark themselves against."

Established in 1866 by the current leadership's great-great-grandfather, Walsh Door & Security has tripled its revenues over the past decade and grown from 40 employees to 94. Growth brought the need for continual refinement, and the business repeatedly has turned to CIRAS for help.

"It's an ongoing process," said Brady Warrick, Walsh's vice president of operations. "CIRAS really has helped us with the journey to get where we're going."

CIRAS account manager Derek Thompson describes the Walsh relationship as typical of what happens when a business is serious about continuous improvement.

"Once we get started with a company, and we really get ingrained with them, it's one or two projects every year," he said. "One thing leads to another."

Since 2015, CIRAS project manager Marc Schneider has helped the company improve its purchasing and inventory handling, while former CIRAS project manager Jim Poe (retired) helped Walsh reorganize its production and storage facilities to make them safer and more efficient. Company leaders also turned to CIRAS strategy coach Joy Donald for guidance with implementation of several strategic initiatives.

Warrick "already had the vision in his mind," Donald said. "He just needed a sounding board to test his hypotheses and clarify the details."

Warrick called CIRAS "a trusted partner" and "a good resource"—"somebody that you know, like, and trust, who has a good set of resources that we can use."

"CIRAS helps us a lot," agreed Marty Walsh. "Your team offers some tools that we don't have in our toolbox—but that we can still use to continue to grow and improve."

For more information, contact Derek Thompson at thompson@iastate.edu or 515-419-2163.

AT A GLANCE

Walsh Door & Security

FOUNDED: 1866

EMPLOYEES: 94

OVERVIEW: Walsh is one of an estimated dozen U.S. companies that provide both physical doors and the electronic control systems that go with them as part of modern security operations.

IMPACT: Over 10 years of work with CIRAS, Walsh has tripled its revenues and increased staff from 40 to 94.

FOR MORE: https://walshdoor.com

John Nelson, left.

ESCP Finds Business by Making the Web Work for the Company

For John Nelson, the difference was like night and day—largely because everything looks dark when customers can't find your website.

Nelson is sales manager for ESCP Corporation, a Davenport metal fabricator and manufacturer of metal stacking racks. ESCP's website used to work wonderfully, he said. But then one day, a periodic Google algorithm change seemingly knocked the company out of favor. All web-based leads just evaporated.

Darkness.

Then came a CIRAS Strategic Marketing Boot Camp, led by CIRAS project manager Paul Gormley and sponsored by the Quad Cities Manufacturing Innovation Hub. And the clouds parted in a hurry.

"I made the changes they wanted me to make, and all of a sudden I started getting hits," Nelson said. "My website became my storefront again."

Nelson, who followed up the February 2018 boot camp with two months of CIRAS-arranged coaching from a search engine optimization (SEO) expert, said the difference he's seen since embracing the CIRAS assistance has been stark.

The CIRAS consultant "essentially helped me define what I was selling," Nelson said.

With the consultant's help, Nelson changed ESCP's brochures, updated keyword searches, and learned how to properly monitor the web analytics. He was rewarded with an increase from roughly 20 web hits per month to more than 400—including 10 requests for quotes during the initial month, four of which have turned into sales.

"Before, if I went out to get 10 RFQs, I would have to go to several trade shows and meet quite a few people, then bring back their cards and follow up with them the old-fashioned way," Nelson said. "This is more concise. You spend the money on your website and learning how to manage the website and getting good data, then your website becomes your marketing."

Gormley, the CIRAS project manager, said many businesses incorrectly assume that the web developer who built their site will automatically take care of their search engine optimization needs. Company leaders need to actively manage the process, he said.

"You either need to understand SEO yourself or find someone you trust who understands it to represent you," Gormley said. "You've got to stay on top of it."

Nelson praised CIRAS experts as "guys who know what they're doing" and urged all business owners to embrace web expertise.

"You can't afford not to have a website," Nelson said. "You can't afford not to know how to use it, either."

Search Engine Optimization (SEO)

(n) The process of maximizing the number of visitors to a particular website by ensuring that the site appears high on the list of results returned by a search engine.

—Google Dictionary

For more information, contact Paul Gormley at gormley@iastate.edu or 319-721-5357.

AT A GLANCE

ESCP Corporation

FOUNDED: 1994

OVERVIEW: The company is a metal fabricator and manufacturer of metal stacking racks.

EMPLOYEES: 50

IMPACT: Twentyfold increase in web traffic. (Other CIRAS projects have also helped the company land multiple government contracts.)

FOR MORE: https://www.escp.net

Claim Technologies: Finding New Opportunities in GovCon

In the beginning, it was the pursuit of higher peaks that sent Randy Brandt to CIRAS.

Brandt's employer, Claim Technologies Incorporated (CTI) of Des Moines, audits self-funded health plans to check for overpayments and administrative oversight. The company has worked with all sizes of private companies, school districts, and municipalities, as well as 16 state governments. But before 2018, the firm had only had two federal contracts.

"We wanted a better understanding of the federal marketplace and the bid process and how all that works," said Brandt (center in photo below).

For CIRAS, the process begins with a computer, according to Jodi Essex, government contracting specialist with the CIRAS Procurement Technical Assistance Program (PTAP). Experts help companies register with specific government agencies so they can be notified when business opportunities are posted.

Once a company is on all of the right lists, CIRAS bid-matching software helps businesses scour the Internet for other publicly posted opportunities. Then PTAP experts help companies find prime contractors who might be looking for subcontractors to share the work. The education process can take anywhere from a month to a year or more, depending on the size of a particular company, Essex said.

"It's all about having the time to dedicate to it," she said. "Responding to an RFP could take anywhere from eight hours to more than a week—and you don't know going in whether you're going to win."

Brandt said Essex helped his company identify several potentially lucrative federal contracts—but they're contracts that won't come up for bid for several years. So CTI plans to use that time to gear up for the long term. The firm is building its own database of government procurement officers to aid in future marketing, and it's making sure that it can comply with federal rules governing things like information security.

The plan is to position CTI so the company can put its best foot forward when the time comes to bid.

"There are so many moving parts," Brandt said. "That's why it's helpful to have someone like Jodi. Without her, we never would have known any of this information."

For more information, contact Jodi Essex at jodir@iastate.edu or 515-509-0769.

Samantha Ferm joins CIRAS PTAP

Samantha Ferm has joined CIRAS as a government contracting specialist with the Procurement Technical Assistance Program (PTAP). She will be based out of Iowa City and will serve the southeast portion of the state. Samantha, who most recently worked for the Small Business Development Center in Kirkwood, was named Iowa's SBDC Resource Person of the Year in 2017. Before that, she served as marketing director for EntreFEST, Iowa's largest conference for small businesses and start-up entrepreneurs, and spent five years as the community and marketing manager for what was then called the National Council of La Raza, America's largest Hispanic advocacy group. Samantha has an English degree from The College of Wooster in Wooster, Ohio. Her job at CIRAS will focus on guiding businesses located in southeast Iowa through the complex world of government contracting.

- **GovCon 101**
  November 20, 2018 • 9:00 a.m.–10:30 a.m.
  Webinar
- **Subcontracting Opportunities**
  November 27, 2018 • 9:00 a.m.–10:00 a.m.
  Webinar
- **Blended Human Food PCQI—Part 2**
  December 3, 2018 • 9:00 a.m.–4:30 p.m.
  Ames
- **The Federal Sales Game—A Three-Step Process**
  December 4, 5, or 6 • 9:00 a.m.–4:00 p.m.
  Davenport (12/4), Huxley (12/5), or Sioux City (12/6)
  Note: One event being offered three times
- **Creating Your Government Marketing Strategy**
  January 16, 2019 • 9:00 a.m.–10:30 a.m.
  Webinar

Jim Long (Cline Tool)

From time to time, CIRAS likes to tell you a little bit about some of the people who make Iowa business better.

NAME: Jim Long
EMPLOYER: Cline Tool, Newton, Iowa
JOB TITLE: President and CEO

Jim Long worked his way up from a regional salesman to become the president and CEO of Cline Tool in Newton. He believes in hiring good people, and he'd like to see more good businesses coming to Iowa.

Explain your job. What do you really do there?
I am currently the president and CEO. However, as a smaller company of 120 employees, you must wear many hats and jump in wherever your additional resources and expertise are required. Mostly, I manage a custom tool manufacturing company and full-line industrial distributor and bring alignment across the organization through clear understanding of the key business drivers and the impact each function has on these drivers.

How did you get started in Iowa industry?
I started with Cline Tool in 1987 as a regional salesman living out of state but working out of the Newton office. In 2001, we relocated to Iowa after I became the V.P. of sales and engineering.

How has the business/industry changed since then?
Since my time in Iowa industry, I've noticed that businesses have become more data driven. Technology has changed the way we manufacture and sell our products, as well as how we communicate with our customers. Technology also has allowed us to expand our geographic coverage area. Manufacturing in Iowa has certainly slowed down, and there is less than there was when I first started.

Boil it down to one most important rule. What's the key to success for somebody in your job?
Hire the best people, always be honest, treat them with respect, and acknowledge their accomplishments. I know it's been said many times, but it truly comes down to the people in the organization. The right people make the good times great and the bad times bearable.

MEP National Network™

Survey: Manufacturing Extension Services One of Best Ways to Grow Jobs

American communities can add manufacturing jobs if they invest in infrastructure, boost worker skills, and provide customized assistance to small- and medium-sized factories.

That is the message of a recent study by an economist with Michigan's Upjohn Institute for Employment Research. The study, which looked at employment data for a total of 105 manufacturing-intensive metropolitan areas, also found "no evidence that job growth in these areas is significantly spurred by cutting business taxes or increasing business tax incentives."

According to the Upjohn Institute, manufacturing extension services (such as what's available through CIRAS' Manufacturing Extension Partnership) give factory owners "low-cost access to high-quality advice on improving competitiveness." Likewise, the study found that communities get a high benefit from economic development efforts when they focus on redeveloping land, boosting infrastructure, and improving education to increase the area's pool of quality employees.

Overall, America lost more than one-third of its manufacturing jobs between 2000 and 2015, according to economist Timothy J. Bartik. But Bartik examined data from 105 "commuting zones" where communities had a higher-than-average percentage of manufacturing employment. He found 22 areas that performed better than the United States as a whole in terms of growing jobs between 2000 and 2015.

The 22 "successful" communities included three zones in Iowa—Cedar Rapids/Iowa City, Waterloo/Cedar Falls, and Dubuque. All three areas gained jobs overall between 2000 and 2015 and, despite significant manufacturing job losses between 2007 and 2015, performed better than the national average.

Lisa Rivera Skubal, vice president of economic development for the Greater Cedar Valley Alliance and Chamber, said the survey validates her region's "perfect storm of a lot of good companies coming together" to support manufacturing. She cited a long list of Waterloo/Cedar Falls projects backed by governments, schools, and local businesses.

"It makes a difference," Skubal said. "No one entity can do it all."

For more information, read the full study at https://bit.ly/2N7Nuw6. To discuss how your company or community might follow the "successful" path, contact CIRAS economic development program manager Mark Reinig at mreinig@iastate.edu or 515-231-4150.

Why Existing Workers Are the Real Answer to Iowa's Workforce Problem

by Mike O'Donnell

Iowa is out of people.

Almost every company I talk to, regardless of size, industry, or location, says that finding good people is their number one issue. The few exceptions are expert Lean practitioners—such as members of the Iowa Lean Consortium (ILC)—who tend to look at the issue differently: If every single person in our business was better at seeing, communicating, and solving problems, they ask, wouldn't it help our workforce needs?

Twenty-plus years ago, when the world began to interpret the famed "Toyota Production System" as magic tools necessary for everyone to cut costs and compete globally, most of us missed the point. In reality, the secret lies not in the tools but in the people that developed the tools and how Toyota developed those employees.

The truth is that Lean tools were never magic. Lean, when it's done well, is hard.

But it works.

Lean is about leaders leading—developing people, helping them see waste, and providing them with the coaching, tools, and authority to fix issues themselves. None of this is expensive or time consuming, but it requires real effort and behavioral change at every single level of your organization.

The most recent CIRAS study of manufacturers' needs shows that despite Iowa's workforce shortage, only about 20 percent of our manufacturers have fully embraced a productivity system. I see it as our responsibility to help Iowa manufacturers see the path in which developing people and simplifying processes helps them get more product out the door with the same staff.

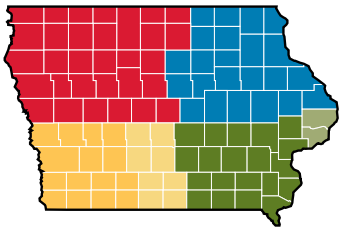
This is one of the many reasons why I'm so excited that the ILC has joined CIRAS. Together, we're going to be working closely in the coming months to define the next generation of Lean in Iowa. That will mean more resources for current ILC members and new options for the thousands of companies out there that need people and have not yet embraced Lean.

For more information, contact Mike O'Donnell at modonnll@iastate.edu or 515-509-4379.

ciras Engage. Educate. Embed.

Since 1963, we have delivered proven services to enhance the performance of industry. Our approach—Engage. Educate. Embed.—creates specific solutions that allow each business and its community to prosper and grow. Coupled with a satisfaction guarantee, our typical client has achieved a 200% ROI. Clients have reported an economic impact of more than $2 billion over the past five years.

Locate your county to find your best introduction to CIRAS.
In addition to four regional account managers, CIRAS has six regional government contracting specialists,* a statewide account manager for the food industry, and one for economic development. More staff information can be found at www.ciras.iastate.edu/staff.asp.



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  - Engineering Career Services
  - Engineering K–12 Outreach
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  - Iowa Grain Quality Initiative
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  - Structural Engineering Research Laboratory
- Iowa Area Development Group
- Iowa Association of Business and Industry
- Iowa Economic Development Authority
- Iowa Farm Bureau
- Iowa Sustainable Business Forum
- North Iowa Area Community College
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- Quad Cities Manufacturing Innovation Hub

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Increase the Return on Your Marketing Investments

by C.J. Osborn

Every business is interested in finding opportunities to grow revenue. One way to make that happen is to understand the respective performance levels for the major stages of the marketing and sales "funnel" process. Conducting this analysis is relatively easy and inexpensive, and it can show you which stage is most likely to yield more benefits with increased attention.

This concept works for companies that sell both to other businesses (B2B) and for those that sell directly to consumers (B2C).

For B2B, the framework starts by identifying potential customers. One possible way to do this is to find the North American Industry Classification System (NAICS) code for one of your existing customers and see how many similar companies exist. (You can find general information, including the number of companies in a given NAIC category, at https://www.naics.com/search-naics-codes-by-industry/.)

With a fixed number of potential companies that could buy your product, the next step is to use internal records like a customer relationship management (CRM) system to find out how many of those companies were identified as "sales leads" (inquiries), received a quote, or resulted in a sale. You can use any period of time for the measurement, but data from a 12-month period is most effective.

To illustrate, suppose two companies both have access to 5,200 potential accounts. Both receive inquiries from 50 percent of those companies, but one company has a 10 percent quote rate with a 50 percent quote-to-sales conversion rate and the second has a 50 percent quote rate with a 10 percent conversion rate.

Those companies probably would not take the same actions if they were pursuing increased revenue. The first likely would focus on sales lead management or call-to-action messaging, while the second company would benefit from selling effectiveness and/or the use of discounting or incentives.

This approach can be a great way to identify how to focus sales and marketing efforts where you can most dramatically increase revenue. In addition, this analysis can prompt some great conversations, both with an internal team and with customers, about ways to increase sales.

For more information, contact C.J. Osborn at cjosborn@iastate.edu or 641-840-0505.