Software: Welcome to the new CADMAN®

Victor Manufacturing’s secret for success in the UK

Dubai-based Ideal Design expands to Bangalore

“No mistakes”
A DUTCH JOB SHOP MAKES IT HAPPEN
Dear Readers,

Thanks for taking a look at the latest Discovery. Starting with this issue, we’ve introduced a new layout and features we hope you’ll enjoy, like “Insights” (from page 14 and 22) where we dissect industry-relevant topics or “Snapshots” (see pages 12, 28 & 30) where we see the big picture, literally and figuratively, of what some of our customers do. As in past issues, you’ll see customers we are proud to work with and some of our new product developments, aimed to give you a competitive edge.

We work in an industry that is ever-changing. At LVD, we believe our company culture, strongly based on family values, is one of the most important things for us (see what we’ve been up to on page 4). Truly global, LVD operates in over 45 countries, (see some on page 18), so wherever you may be in this world, LVD is close by.

Enjoy reading!

Carl Dewulf
President & Managing Director
Ask German professor and business leader, Hermann Simon, he coined the term. In his book, *Hidden Champions of the Twenty-First Century*, he defines Hidden Champions as "medium-sized companies relatively unknown to the public who have, under the radar, become world market leaders in their respective industries." Since then, Professor Simon has conducted a study to find Belgian companies deserving of the title. After surveying thousands of companies and extensive interviews, we’re proud to say LVD has been recognized as a Hidden Champion at the annual VOKA (Flanders’ chamber of commerce) congress event.

Earlier this year, we were pleased to announce the official opening of LVD Strippit India Pvt Ltd’s demonstration and technology centre. Situated in Bangalore (also known as the Silicon Valley of India), it is the ideal location for LVD to strengthen presence in a quickly growing market. See page 17 to see why Bangalore is on our map.

What is a “Hidden Champion”?

Increasing Productivity

In 2012, LVD rolled out an extensive initiative, World Class Manufacturing (WCM), a process-driven approach primarily focused on continual improvement in quality, cost, lead time, flexibility and customer service. Firstly, a pilot project that optimized our small press brake assembly hall was developed, implemented and measured. Results were incredibly successful, production time was reduced by 25%. Since then, WCM has been rolled out to our Belgian facility’s laser department, welding shop and large press brake assembly hall, as well as our facilities in the US and Slovakia.

See you in Bangalore!

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Does Personal Protective Equipment normally have an expiry date?

☐ Yes ☐ No

If you answered ‘yes’, you’re right! Our Human Resources team was looking for an effective way to educate employees on safety and introduced a safety campaign. Each month, a safety topic is presented with a quiz, including questions like the above title, at the end of the year. A reception is held for participants and a lucky few win prizes for answering the quiz correctly. “It’s a fun way to discuss a serious topic” says Sarah Lerouge, the campaign’s organizer, “but aside from being fun, it’s working. In 2013 we had 84% employee participation and work place accidents were down by 50%, and minor at that.” Safety has always been of the utmost importance to LVD and educating about safety is invaluable. “The campaign is so much better than simply e-mailing employees fact sheets. Employee engagement has been the key to the campaign’s success and more importantly, keeping LVD a safe place to work!”
VERSCHOOR METAAL TECHNIEK

NO MISTAKES

“The first part is the good part, always.”

Kees Verschoor, owner at Verschoor Metaal Techniek, or VMT, knows what it takes to separate himself from the competition. Operating in Culemborg, a city in the center of the Netherlands, VMT is a job shop of endless capabilities, even adept to delivering complete welded parts, including assembly and finishing. VMT serves customers throughout Holland, whose products eventually end up worldwide, but they aren’t pinned down to particular industries. The 19-year-old company is all about flexibility, able to serve any customer. “That’s a big part of our strategy,” explains Kees, “and the only way that it’s possible is through technology. Of course, you need to have solid machinery, but having the right software in place is what gives you the edge over competitors.”

“CADMAN®-B completely changed the process.”

Kees Verschoor

The building blocks
The bulk of Kees’ experience starts much before VMT was in the picture. Kees had begun working for an office furniture manufacturer, first gaining experience on the shop floor and then throughout the company’s different departments. “I really got a handle for how a manufacturing company works,” reminisces Kees, “and when an opportunity came up to open my own shop, I was confident. I bought some ground and acquired some sheet metal machinery from an old company.” This is when things really began. VMT couldn’t afford to be dependent on few customers in the volatile market of office furniture, so Kees, the only employee at that time, began working from sun-up to sun-down. “I was calling potential customers all day, selling good quality parts far cheaper than I made them for but this helped me build VMT’s customer base. The sheet metal world can be very small, we grew VMT into a company that manufacturers talked about. Having a solid reputation is key.” As time went on, VMT had established themselves in the industry and beginning in the year 2002 VMT started acquiring sheet metalworking divisions from other companies, and though the risk was huge, this is what ultimately led to VMT’s growth.

Kees and his team of now 23 full-time employees have become a close-knit group, as they share the same interests for the company. “We’re totally flat, there is no hierarchy here. This keeps it simple,” remarks Kees. “Everyone here has opportunities. Our first employee, who is still here, moved around the whole company and now he is where he is comfortable. If anyone gets the impression they’re stuck, they’ll leave.” Kees further supports employees by encouraging requests for training, for anything from welding to languages.

Changing the game
Continuous improvement is always on Kees’ mind, presumably why he was so quick to answer how he initially came to know LVD. Kees had just taken over some equipment, of which a 80 ton, 2.5 meter LVD Easy-Form press brake was a part of. Kees cites this as a memorable moment for VMT, as this was when they first recognized the value of offline software. “Using CADMAN®-B offline software completely changed the process for the better. Normally, our
LEADERS

The first step was to cut the plates, then bend, but frequently we found ourselves unable to bend the part. Now, with the software, we consider the bend sequence before we cut the part to see if it is possible and then the precise sequence with the proper tooling and tool set-ups. “This solved a lot of problems for us, not only did it remove any wait time the operator had incurred due to these errors but most importantly, the first part we made became the good part, always.”

Now Kees has CADMAN®-B and CADMAN®-JOB fully integrated into his operations. Kees attributes the steep decline in errors completely to the software, however the software doesn’t only provide value for him, it gives the customer vital information too. With CADMAN-JOB, Kees can set and meet expectations for the customer to determine when the part will be delivered. “What LVD software gives us is a better controlled process”, allowing VMT to be more transparent. VMT can comfortably put a price in front of the customer, before operations, and not have to worry about margins changing.

Kees attributes part of the success of the integration to VMT’s relationship with LVD. “When a customer approaches me with a part, I like to work together to find the best solution for them, no matter what it takes. It was the same when working with LVD, they really listened to my needs and we worked together to get to the ultimate outcome. It all came down to mutual respect.” Kees was pleased to see the impact that the software has made regarding the flexibility of VMT’s operations. For example, if priorities change and a customer orders a part that they need immediately, the system can accommodate the change and adjust the operations schedule without causing any disturbance. The software integration has been so successful with planning and operations that despite not adding machinery, VMT’s output has gone up. "Ultimately," says Kees, "the software gives me clarity."

Kees is adamant that technology may be the toughest thing to keep up with but it is the most important. He is always thinking about what is next for the company. VMT recently introduced the tablet system that will remove all paper during the manufacturing process. Kees explains, “From the customer drawing to the invoice, not one piece of paper will be used. All details required for a part will be accessed in our app that links the part to a QR code.” What is next for this visionary company? “I can’t go into too much detail, but it’s good” he says, smiling, and with a company like VMT, we can trust that it is.

“Continuous improvement is always on my mind.”

Profile

Company: Verschoor Metaal Techniek
Website: www.vmtbv.nl
Since: 1995
Works with: stainless steel up to 15 mm, steel up to 20mm and aluminium up to 12 mm but VMT doesn’t shy away from other materials like copper or high strain steel when the opportunity arises

Innovative project: VMT developed and manufactured an entire ‘smarter’ garbage receptacle system starting to be adopted by many cities. Garbage is crushed after being tossed in the bin, enabling one bin to hold up to 5 times more garbage.

Equipped with: Three LVD Easy-Form press brakes
Software: CADMAN®-B automatically unfolds the part and determines the optimum bend sequence, gauging positions and tool selection for minimum tool stations and part turns. CADMAN®-JOB organizes and schedules the fabrication shop workload, classifying and grouping jobs in the most efficient manner to increase throughput, minimize set-up time and streamline workflow.

Paperless, from A to Z

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SOFTWARE
“Welcome to CADMAN®-Suite version 8!”

The latest version of CADMAN® is loaded with flexible new features in our offline software CADMAN®-B, CADMAN®-JOB as well as the software you’ll find in the controllers, Touch-B and Touch-L. Here’s a few highlights...

CADMAN-B
Combined with our high-precision press-brake technology, our offline bending software ensures quality- from the very first piece.

What’s new?
- Open Sheet Metal (OSM). OSM plug-in for SolidWorks enables seamless and automatic 2D and 3D transfers into CADMAN without feature loss. Notches are cut as originally designed but the unfolding may change depending on the chosen tools.
- Dynamic Virtual Simulation of a full bend sequence, including springback angle for collision checks. Give your production the ultimate visibility on the exact process that will take place.
- During set-up calculation, the improved tool-setup intelligence ensures you avoid any unnecessary complications. Checks for collisions, minimizes tool station length and Z-axis limits are taken into account.

CADMAN-JOB
Organize and schedule your fabrication shop workload, group jobs efficiently to increase throughput, minimize set-up time and streamline workflow.

What’s new?
- The new mode Resource Management organizes items such as sheets, materials and tools so that you have a full overview of your production resources.
- Add extra production documents in PDF, JPEG, BMP or SAT formats with the parts. Other valuable production information ID’s can be identified and imported with tags for parts.
- At the end of the day, check your production order and job list reports, to review and report on the status of production.

TOUCH-B
Fully integrated with CADMAN®, Touch-B gives your press brake operator dynamic control with an easy-to-use interface.

What’s new?
- With the feature visualization of part documents, there is no need for paper. Every detail of the part that is needed for quality verification can be accessed with the controller.
- No more surprises for your press brake operators- see the entire bend sequence simulation- including springback angle and collision check to ensure hassle-free bending.
- Machine status is clearly indicated with new machine status lighting on the cover of your press brake- working mode (green), idle mode (blue), contact has been made with backgauge fingers (yellow) and error mode (red).

TOUCH-L
Fully integrated with CADMAN, Touch-L gives your laser operator dynamic control with an easy-to-use interface.

What’s new?
- Adaptive Laser Cutting (ALC) is now included in Touch-L. Available on Impuls and Sirius Plus, ALC technology enables real-time monitoring and feedback of your laser cutting and can increase your productivity by 10%. See more on page 27.
- The 19” Touch-L touch screen allows any level of user to interact with the machine. The intuitive interface keeps set-ups fast and uncomplicated.
- Take a DXF-file from the network or a USB-stick and apply cutting technology, nest and cut the part with minimal input. Easily add remnant cutting lines, change type and position of lead-ins and add a micro-joint if needed.
Based in the village of Lutten in North-East Germany, Fienhage supplies customers around the world with aviary-style systems for raising and keeping poultry. Aviary systems provide birds a large living space, with room to move freely and fly.

The story of how Fienhage has evolved is the story of a rural economy adapting to changing times. The company was founded in 1900, when Managing Director Hans-Juergen Fienhage’s forefathers were woodworkers making pallets for the local peat industry. He says his grandfather branched out into making wooden wagon wheels and later started to make the typical wooden feed silos used in North Germany. “When I joined the company in the 1980s I started the production of laying nests for hens while my father continued to concentrate on feed silos. Then, at the turn of the century, I started to manufacture modern aviary systems for poultry.”

As the poultry market moved more and more towards free-flying aviary systems, it became clear that metal fabrications were the way forward - so Fienhage’s started its relationship with LVD.

The aviary-style systems soon became very popular, with their success helped by changes in European legislation. Battery cages were banned by the EU in 2012, deemed too restrictive and harmful to the welfare of hens, however Germany enforced the ban in 2007. “All the traditional battery cages had to be changed to new husbandry systems at very short notice. In response to this market demand we extended our production so that we could meet our customers’ needs,” says Mr Fienhage.

But the company had to stay flexible and innovative to continue to thrive. As markets in Europe fell back, Fienhage built a new customer base in Russia, the Middle East and Asia and broadened its portfolio to become a single-source supplier.

Today the company continues to grow, build its markets and innovate – and it’s come a long way from its woodworking origins.

Fienhage is equipped with Strippit V, Alpha and Global punching machines, five PPEB and two PFEC press brakes.

www.fienhage.com
WIM SERRUYS, DIRECTOR OF ENGINEERING

INDUSTRY 4.0

Disruptive innovation, simply put, fundamentally transforms the way we do the things we do. These innovations are creating shifts in every sector. Thanks to the internet, children in developing countries now have a better chance than ever to receive an education. The mobile phone, e-mail and social media overturned the communication market. In manufacturing, the next looming innovation is deemed so disruptive that it is considered the fourth industrial revolution or, Industry 4.0.

Sectors like the auto industry have already emerged as early-adopters to the concept of Industry 4.0, but how will this revolution affect the sheet metalworking industry and what is LVD’s plan for integration?

The innovation, developed by the German Academy of Science and Technology, and its namesake follow the first, second and third industrial revolution; the development of the mechanical loom in 1784, the realization of mass production at the beginning of the 20th century and the automation of production through technology of the 70’s, respectively.

How will Industry 4.0 radically change manufacturing across the globe? It certainly has a lot to live up to, each preceding industrial revolution introduced technologies that have helped us manufacture products quicker, cheaper and all in all, better.

Industry 4.0 changes the game by adding intelligence to the mix and not just aiming for smarter machines or software, but a smart factory; a factory where machines, products, tools and software communicate with each other. This is where we’ll see the most adoption in the sheet metal industry; machines will become social, sharing information with Manufacturing Execution Systems (MES). Decision-makers get real-time insights from the shop floor and instant control of production processes.

For LVD, Industry 4.0 is the logical further step in our integration philosophy. All of our products are already social, enabled through our software suite, CADMAN®. Our Touch-X series controls are seamlessly integrated with all CADMAN modules, covering the entire value chain of sheet metal; starting with a 3D CAD file, guiding the production team to a finished part with the shortest lead time and best quality.

Industry 4.0 is a technology that allows access to any information you might need, but information is not the same as knowledge. In our daily lives we’re bombarded with more information than ever before. The key is understanding how to filter this information to extract what is valuable. The same applies to Industry 4.0— with all machines being social, there will be a lot of data, but extracting the meaning of the data is the most important, and perhaps the most daunting part.

Having human-centred products has always been a must for LVD and we make no exception in our Industry 4.0 technology. We present the data using different viewpoints, offering complete transparency of the entire value chain. We do not impose a production control strategy as a cost based or time based approach will yield conflicting results. We offer the tools to measure the Key Performance Indicators (KPIs) that matter: Overall Equipment Effectiveness (OEE), lead time, Work in Process (WIP), delivery performance, giving you the true insight of your overall performance.

The changes Industry 4.0 bring will be substantive enough to alter the sheet metal industry. We’ll have more information about our production and performance than ever before. Having the right tools to decipher this data and what its true implications are will give you the ability to take advantage of the new developments Industry 4.0 brings.
The journey to productivity

When Ideal Design made the switch to metal, they could offer customers a more durable, higher quality product, not to mention the obvious benefits that come with flat-pack shipping. There was just one piece missing: the productivity. Their initial investments were entry level punching machines from an Italian company, but that just left Ideal Design to search for a machine with a lot more performance. Enter: the LVD Siena. “With the Siena,” explains Director Thomas D’Souza, “our production stepped up. The business was growing and our output, quality and accuracy went way up.” The Siena, which today, has been replaced by the Strippit-M, has a 20 ton hydraulic system with a 47-station thick turret configuration. Along with the Siena, Ideal Design installed an Orion 2.5 kW laser. Adding laser technology gave Ideal Design the freedom to produce more complex shapes and work on thicker material, allowing the company to offer a wider range of electrical panels.

“Since adding the LVD machinery, our focus was able to shift to uninterrupted production,” continues Mr. D’Souza, “which is crucial since lead times on point-of-sale displays can be as short as 30 days, including sourcing the material, manufacturing and delivery to the store.”

Making strides in India

Fast forward to December 2013, when Ideal Design opened its new facility in Bangalore to respond to a growing consumer base in India and South Asia. Spread across 50,000 square feet and employing nearly 80, Ideal Design does all processes in-house, from concept to completion. When it came time to choose their machinery, Jacob Kattukaran, founder and chairman says the choice was clear, “The relationship we had with LVD meant that we were confident that they would offer the same level of support we received in Dubai.” A part of their equipment fleet was an Orion Plus with load/unload automation, four PPEC press brakes and two Strippit-PX punch presses. Mr. Kattukaran refers to the latter as his workhorses, “For one of our clients we delivered 7000 display units in a record nine days! Anyone else would have taken at least one month, if not more.” The Strippit PX offers Ideal Design more versatility than any other punch press, with punching, tapping, bending and forming capabilities.

Mr. D’Souza and Mr. Kattukaran cite that their sales strategy is to get customers to the shop floor so that they can see what Ideal Design’s machinery is capable of. This idea of not only promising the customer quality, but showing the customer quality has made the difference in their success.

www.idealsign.com

Ideal Design, a Dubai based point-of-sale display unit manufacturer, started out producing units using wood and acrylic. They still manufacture display units but now they’re in the metal business. Today, with customers like Nestlé, 3M, Procter & Gamble, Unilever and Sony and a new facility in Bangalore, India, Ideal Design is soaring to new heights.

“Both Ideal Design and LVD now call Bangalore a piece of home.”

Bangalore is known as the Silicon Valley of India which is no surprise since it is home to close to 250 software & IT companies and 21 engineering universities - more than any other city worldwide.

3rd largest city

in India with a population of

10.2 million

16 # LEADERS

IDEAL DESIGN

www.idealsign.com
GLOBAL REACH

We’re working hard to equip leading manufacturers across the world with our sheet metalworking machinery. Here’s a glimpse at some recent installations, worldwide.

USA
Over 40 years ago, Philips Precision Medicraft started as a small workstation in the founder’s basement. Today, the advanced orthopedic implant manufacturer runs two state-of-the-art facilities with 200 employees. Taking their laser production to the next level, PPM has recently purchased a 2 kW Electra fiber laser for incredibly fast laser cutting.

Brazil
Brazil is among the largest players in the world of agriculture, with an annual grain production of over 145 million tons, of which 90 million go through one of Kepler Weber’s products. The company specializes in and manufactures complete grain storage solutions. Kepler Weber operates the first ToolCell 135/30 in South America.

Morocco
Sofamel is doing some heavy-duty bending for the industrial electricity sector, with main clients in the Maghreb region of Africa. Their recent investment of a Tandem 640 ton press brake enables bends of up to 12 meters specifically for lamppost manufacturing.

Hungary
Global manufacturer of agricultural machinery, McHale Hungária Kft specializes in balers and wrappers for the production of round and square baled silage, and round bales of hay and straw that farmers, worldwide, can depend on. The installation of their second Easy-Form 135/30 is a testament to the higher productivity, accuracy and reliability the press brake brings.

Belgium
With their recent addition of a Striss Plus 3015 4 kW laser cutting machine and offline software CADMAN®-JOB, Metaalhandel Christiaens NV is ready than ever to meet customers’ laser cutting needs. Founded in 1975, Christiaens remains a strong family-owned company supporting the construction industry in Belgium.

Germany
Lansing is Europe’s first Strippit PX customer! The PX is LVD’s latest punch press, combining punching, forming, bending and tapping. Specializing in complex construction projects, Lansing’s investment in the PX aligns well with their motto ‘Stable, efficient, and safe’... not to mention innovative!

China
1 in 4 elevators in China are made with parts manufactured by Hangzhou Xizi Trust Technology Co., Ltd. Constantly growing, Xizi Trust recently built a new factory for the manufacturing of higher grade elevator components and chose one Easy-Form 170/30, two PPEB-8 170/40, a PPEB-5 220/40 press brake and two MVS shears to equip the new facility.

Malaysia
Located in Kuala Lumpur, Supreme Steel Makers Sdn Bhd. is Malaysia’s biggest stainless steel stockist and dealer in Malaysia. Adding to their impressive list of four Impuls and three Axel laser cutting machines and other LVD press brake and shearing machines, they’ve recently installed an Easy-Form 1000/81 press brake.

Australia
Brisbane’s DVR Metal Industries Pty Ltd. certainly stays ahead of the curve. DVR was LVD’s first Dyna-Press customer! DVR’s strategic mandate to stay equipped with the latest technology keeps them competitive and able to keep staff levels low. In addition to the super-compact press brake, DVR is also equipped with a ToolCell, our automated tool-changing press brake among other LVD sheet metal solutions.

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THE LATEST IN AUTOMATION

"The idea for the new flexible automation came from a customer" explains Thierry De Vleeschouwer, Laser Product Manager, Engineering. "They were interested in the purchase of our fiber laser, the Electra, but wanted automation that can keep pace with its high speeds."

That got our engineering team thinking. Customers that are laser cutting thin material at high cutting speeds will of course have a fraction of the processing time a customer cutting thick material will have, therefore require automation that can keep up. Additionally, customers need to have the flexibility to manually load thicker materials, when the need arises. This brings us to our latest offering in automation: the Flexible Automation for Lasers (FA-L) can unload a finished sheet and load the next sheet on the table— all within forty seconds. Shuttle tables remain easily accessible to load thicker material manually. FA-L is now available on our Sirius Plus and Electra laser cutting machines.

How do we get this running so quickly?

To streamline the load/unload process, we’ve separated the load/unload tables. "In doing this, loading and unloading happens simultaneously, giving the FA-L enough speed to handle the Electra or Sirius Plus," continues Mr. De Vleeschouwer. Additionally, if you have a warehouse already existing, no problem, the warehouse can be integrated in the automation process of the FA-L to load raw materials.

Flexible automation in numbers

- Sheet dimension: 1000 x 1000 up to 3050 x 1525
- Sheet thickness: 0.5 mm up to 12 mm
- Capacity input pallet: 3000 kg, 240 mm (including wood pallet)
- Capacity output pallet: 3000 kg, 240 mm
- Cycle times:
  - Unloading finished parts/loading new sheet within 40 sec.
  - Minimum laser-cutting time for uninterrupted cycle 60 sec.
- Optional: second loading table, scratch free unloading, warehouse integration
KURT VAN COLLIE, PRODUCT MANAGER LASERS

THE RIGHT LASER FOR THE JOB

When customers reach out to us to help them decide which laser cutting machine is best for them, we always come back to what we consider the only valid indicator, cost per part. Defining the cost of manufacturing your parts and comparing with your productivity will give you insight to your ROI. Purchasing a machine is, of course, a substantial investment and we want to ensure your direct gains are as high as possible. We help guide you to the machine that will give you real results and affect the bottom line, whether it’s a fiber laser or a CO₂ laser. To determine cost per part, we consider factors such as the overall cost of the machine, production hours, gas consumption, maintenance and consumables cost. We’re also trying to help customers understand why and how things like part quality, material type, thickness, electricity efficiency and cutting speed come into play. Here’s some insight to set the record straight.

Fiber is not the best choice for thick material

We’ve seen fiber technology recently being pushed as a solution for thick materials. There’s no question, fiber is able to cut thick material. What’s missing here is that fiber’s cost per part is higher than CO₂ in thick material. Furthermore, for thick stainless and aluminum the quality of the cutting edge is inferior to the one of CO₂ lasers. We’ve done tests on all sorts of materials and thicknesses and we keep coming back to the same results, so we don’t push a fiber solution when we know CO₂ does a better job. For now, CO₂ remains the most flexible laser cutting technology.

Range of materials

The shorter wavelength of fiber lasers is better absorbed by high reflective and conductive materials like copper or brass, making fiber the better choice. On the other hand, fiber laser cannot cut most non-metals like polymers (plastics) or wood based products. When you order stainless with a protective plastic, remember to order it with a “special protection film suitable for fiber lasers” if you want to cut material and protection in one pass.

Fiber really can generate energy savings

Buying a “greener” machine is a win-win; not only do you make a difference in the environment, but you will see the difference on your power bill. Across the industries, fiber lasers experience 30% energy efficiency - an impressive number, compared to CO₂’s 10%.

(Not quite) maintenance free

The fiber laser has significant advantages over CO₂ lasers in the maintenance department, but be wary of the notion that there will be no maintenance. Due to fiber technology, a fiber laser doesn’t need a lot of components that CO₂ lasers need and requires significantly less maintenance than a CO₂ machine. Some of the maintenance on the basic machine mechanics will, of course, remain.

No gas, no gain

To cut faster with a fiber laser in thin materials, you need to use nitrogen. Point. When cutting thin steel with oxygen, speeds are comparable with a CO₂ laser.

Not every speed means the same thing

Fiber technology is fast, we all know this, but are we all measuring the same “kind” of speed? For example, having a fast travel speed is great on paper but unless you’re cutting contours far apart from each other, this masks the speed that actually creates an impact. The speed that gets you more parts in less time, is the cutting speed.

Machine dynamics mean everything for fiber technology

This is a big thing for fiber. Fiber technology itself is relatively new and we’re just at the forefront at seeing what it can really accomplish. For LVD, we knew fitting a CO₂ laser cutting machine with a fiber laser wasn’t the right way to approach fiber, it wouldn’t achieve the cutting speeds that fiber promises. That’s why we built the Electra from the ground up, to truly exploit all advantages fiber has to offer.

As you can see, choosing a laser cutting machine isn’t easy, but as always, knowledge is power. Curious about what’s right for your company? Let’s talk - sales@lvd.be

THE BATTLE

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Number of parts per hour

Fiber laser - 2kW | CO₂ laser - 4kW
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| Material Thickness | Fiber Laser Cost | CO₂ Laser Cost |
|---------------------|-----------------|----------------|---|
| 1 mm PART 1        | €0.50           | €0.89          |
| 2 mm PART 2        | €0.43           | €0.63          |
| 3 mm PART 3        | €0.54           | €0.46          |
| 4 mm PART 4        | €1.70           | €1.20          |

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Cost per part

Fiber laser - €0.50 | CO₂ laser - €0.89
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Number of parts per hour (Fiber) | Number of parts per hour (CO₂)
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Fiber laser vs CO₂ laser in cutting speed and cost comparison.
Victor Manufacturing is one of the UK’s top catering equipment manufacturers, designing and producing a range of stainless steel units for schools, hotels, restaurants, stadiums, and hospitals. This year Victor turns 70, and they have a lot to celebrate. Victor was recognized by the London Stock Exchange as one of the country’s fastest growing small-to-medium sized businesses, out of three million candidates. This year, they’re planning for 15% growth. What is Victor’s recipe for success? To help us figure that out, we sat down with Phil Williams, Operations Director and Bob Morris, Production Manager.

**How did Victor become the cutting-edge catering equipment manufacturer that it is today?**

Bob Morris (BM): Originally a family owned company, Victor started out manufacturing paint cans and tea-towel dryers. As the hospitality industry in the 60’s started to develop, Victor responded by producing standard hot cupboards and banqueting carts. Many of the products you see today still have the same concept, improved over the years.

**What were some obstacles Victor has made it through?**

Phil Williams (PW): We still cite the recession of 2008 as a difficult period for Victor. During a recession, it’s logical that hospitality is an industry that suffers. We had to respond quickly, we kept all of our skilled employees and made some big investments in training and capital equipment. While some other players in the market just trimmed down, we were adding. When the recession ended, we were ready to hit the ground running.

And run you did. Victor thrived despite the economic slump, experiencing 37% increased turnover from 2009-2010 to 2012-2013. Now that the catering industry is back on track, how do you plan to continue growth?

PW: By entering new markets. Retail, for example, is a market we’ve just started to penetrate. Under a year ago we became the sole-source vendor to bakery giant Greggs for their countertops, tills and refrigeration units. (Editor’s note: Greggs is the leading bakery retailer in the UK, with over 1600 retail outlets and serving almost 1 million customers every day.) This kind of custom work wouldn’t be possible without our latest LVD Easy-Form press brakes.

**How did your Easy-Form press brakes drive development?**

PW: It all comes down to the accuracy that the Easy-Form press brakes bring. It has changed what we manufacture and how we manufacture. We are able to avoid more expensive processes like welding and secondary processes like polishing, because our bends on the Easy-Form are always consistent. Not only that, but the press brakes have enabled us to bring processes back in-house. This means we can offer a great product at a lower cost to the customer and maintain margins. It gives us a competitive advantage.

So, it’s safe to say investing in leading-edge machinery is supporting Victor’s overall growth. What factors came into play when you were sourcing your press brakes?

BM: We were in the market to replace...
LEADERS PRODUCT FOCUS

In this industry, there’s been a skills gap taking a nine step process down to a two. To make operations so much smoother, we wanted to eliminate 2D drawings and that suited what we were after. It’s allowed us much more capability and advanced than others on the market, and the software from LVD is much more powerful.

Has the integration between machine and software been successful?
BM: From my point of view, the offline software from LVD is much more advanced than others on the market, it gives us much more capability and suited what we were after. It allowed us to eliminate 2D drawings and that makes operations so much smoother, taking a nine step process down to a two.

In this industry, there’s been a skills gap for some time and CADMAN®-B offline software bridges that gap.

How has the skills gap in the industry impacted Victor?
PW: Given the aging demographics of the workforce, we have to be proactive in our succession planning. We actively support apprenticeships; we see each apprentice as one of the key ingredients under one roof. Not only do we actively support apprenticeships, we see each apprentice as one of the key ingredients in the workforce, we have to be proactive in our succession planning.

Victor’s first 70 years have been, without a doubt, successful. What’s your secret?
BM: In today’s highly competitive market, you have to distinguish yourself. By staying true to the Victor spirit of strong investments in people and technology and always seeking to improve, we see steady, well-managed growth in Victor’s future.

BOB MORRIS
“It would have been a compromise to go with someone else.”

LASER TECHNOLOGY

ALC IN USE

“We recommend ALC starting from 8 mm upwards to 25 mm thick mild steel material.”

Cutting thick mild steel materials? ALC or Adaptive Laser Cutting is bringing laser cut accuracy and consistency to another level. ALC technology uses continuous feedback to monitor and regulate laser power, speed and assist gas pressure— all in real time. These in-process capabilities provide up to a 10% increase in productivity but don’t just take our word for it, we asked two customers using ALC for some feedback.

“PCS started out in the 1980’s from our founder’s garage. After growing steadily over the years, we’re now operating three shifts. When we were considering our next laser purchase, we wanted new technology, to increase our capacity and to do something a bit different. We went for an Impuls 12m by 3m for our site in Oakland and a 6.5m by 3m for Christchurch, both with ALC. There are things on this laser that we couldn’t have cut before. Now we’re cutting in high-definition, which we’re more than happy about. We can put a plate on without having to worry about its condition when it comes off the machine. In the industry, you can hear horror stories about lasers that won’t cut, this certainly is not the case here. ALC measures the quality of the cut and optimizes speed, so for us this is great. This is ground-breaking technology that nobody else has. Only LVD offers it."

ALC is now available as a standard feature on 4 kW Sirius and Sirius Plus and all Impuls laser cutting systems.
"Innovation is a key word to Fondis, but not only for their products."

Whether its style is classic or contemporary, gathering by the fireplace remains one of winter’s finest pleasures. For 35 years, Fondis has been producing fireplaces in metal, glass and stone ranges based completely on innovation, and that is not simply hearsay. Since 2003, Fondis has filed over twenty patents, including their latest “Zero CO” technology, reducing CO₂ and dust emissions by 90%.

Innovation is a key word to Fondis, but not only for their products. “The shop floor looks nothing like it did even a couple of years ago,” says Fred Haas, Technical Director of Fondis. “We completely redefined our entire production line, now every process maximizes productivity.”

This organizational shift not only addressed processes but also Fondis’ investment in new machinery, one of the most important being LVD’s automated tool-changing press brake, the ToolCell. Fondis’ operating team needs a new tooling set-up roughly every 30 minutes. Manual tool set-up time can add up quickly, and since the installation of their ToolCell, Mr. Haas explains, “We’re saving five to seven minutes on every tool change,” resulting in up to an hour of time savings throughout an eight hour shift. “We were one of the first companies in the world to have a ToolCell, its automated tool-changing capability has eliminated so much unproductive time we didn’t realize we were losing.”

Along with the ToolCell Fondis is equipped with a Easy-Form press brake and an Orion 2.5 kW laser cutting machine.

www.fondis.com
Wim Delvoye, often deemed the rebel of modern art, is a Belgian neo-conceptual artist known for his inventive projects. One of which being the creation of life-size construction equipment with Corten steel, laser cut to create an intricate neo-gothic style; juxtaposing medieval craftsmanship with machine-age technology. The work of Delvoye is characterized by an immense interest in artisanal (but not directly art-related) production process. Wim’s artwork has been displayed worldwide, from the Louvre to the New Museum of Contemporary Art in New York.
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IN HIGH-QUALITY LASER CUTTING
WITH SIRIUS + ALC

LVD leads the way to quality assured, high reliability and consistent laser cutting with the latest generation Sirius CO₂ series laser cutting machine with in-built ALC technology. Adaptive Laser Cutting is a new laser cutting technology that automatically adapts cutting parameters to increase productivity by up to 10%, increase cutting reliability and reduce scrap.

Learn more about maximizing your laser cutting performance and quality with the new Sirius series laser cutting systems with integrated ALC technology.

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