Deburring

Big saws, thick parts

Optimil Machinery Inc. enhances deburring results with ARKU EdgeBreaker® 4400

Delta, British Columbia – Mahogany trees, pines or oaks are a miracle of nature – and the foundation of many everyday objects. Furniture or flooring wouldn’t exist if it weren’t for hardwood and softwood. But the raw material isn’t available straight away. Optimil Machinery has what it takes to turn towering trees into processable lumber with its processing equipment. Its machines are sought after by lumber producing companies in North America. But the customer base stretches far beyond the Canadian/American territory. Optimil also ships to Australia and New Zealand.

Fully automated

Since 1983, Optimil has helped sawmills reach a crucial goal: produce more lumber from their wood resources. Manufacturing the machinery requires a full machine shop. In its 100,000 square feet production facility, Optimil covers steel fabrication, equipment assembly and electrical wiring. To maintain consistent product quality, the company largely relies on automated processes. Laser tables, horizontal boring mills, and CNC milling are major production pillars. For its heavy-duty components, the company utilizes oxyfuel cutting technology.

Robust material

“We process thick materials, since we build heavy duty equipment,” explains company owner Ross Chapman. Cutting is done smoothly, whereas deburring proves more challenging: For a long time, the company was having employees use hand grinders to prepare parts for the fabrication process. This process proved to be very time consuming and causes repetitive strain injuries which are very serious.

Consequently, Optimil’s goal was a combination of efficient deburring and fewer work-related injuries. One day, Ross Chapman was flipping through a trade magazine – and read about ARKU’s EdgeBreaker®. “Purchasing a deburring machine was a compelling idea,” he recalls. “We first discussed the project internally. The entire team agreed that an EdgeBreaker® could built tough: The EdgeBreaker® 4400 cleanly deburrs and edge rounds the materials with no problems.

Arkw, Inc. · 11405 Grooms Road · Cincinnati, OH 45242 · USA · Phone: +1 (513) 985-0500 · Fax: +1 (513) 985-0580 · E-Mail: info-us@arku.com · www.arku.com

Ross Chapman, President at Optimil (right) and David Wilkins, Operations at Optimil (middle) as well as Nathan Brown, Sales Engineer at ARKU Inc. are discussing the future possibilities of deburring.

Contenido

Deburring: P. 1 and 2
Leveling: P. 2, 3 and 4

CONTENTS
That highlight the quality of Optimil’s products. “The machine handles thick parts with consistently high deburring and edge rounding results. Our workers really appreciate the easy-to-use interface. Moreover, the quick-change of the drum and the brush consumables ensure easy operation.” This reduces Optimil’s downtime significantly. Not to mention the hand grinders: The workforce no longer must carry out this dangerous task. “Experienced metal fabrication workers are hard to find. Employees now have more time for fabrication, and we can increase our output.”

www.optimil.com

Welding
Weld accuracy, time savings advance to the next level
Miller Fabrication Solutions enhances downstream processes with the ARKU FlatMaster®

Leveling

Coil Lines

Third coil line for Hago Automotive Corp. in Mississippi
Hago in Iuka, Mississippi has just received their third ARKU coil line in the US. This line features the unique CompactFeed® design which saves valuable space in the press room. The installation and commissioning was conducted by Sean Self, Field Service Engineer for ARKU Inc. Therefore allowing the automotive parts supplier to increase capacity while simultaneously operating smoothly and cost efficiently.
**A true American success story**

CLS Fabrication achieves excellent flatness with ARKU FlatMaster® 55 165

Bend, OR – CLS Fabrication Inc. is a good example of an American success story. In 1985, Eric and Barbara Fleming founded a company for laundry machine coin mechanisms in their own garage. Over the years, CLS Fabrication has expanded and developed into a trusted partner for OEM sheet metal and structural material customers.

Two key elements have contributed to their success: “The core of our strength is unquestionably our employees. We all work hard and always strive for continuous improvement,” says Benjamin Mitchell, COO of CLS Fabrication. Secondly, the company reinvests profits in infrastructure and high-quality equipment. This is also reflected in the Oregon machinery park. Since October 2018, it features a new ARKU FlatMaster® 55 165 precision leveler.

Fresno, CA – When it comes to cutting metal, Central Cal Metals is the right address. Clients from the automotive, food and architectural industries rely on the family-owned business. Besides cutting various materials including wood and rubber, the company offers leveling expertise for a large array of alloys. Especially decorative architectural grilles need to be leveled – before and after cutting.

“It is essential for our grilles that cutting, coating and forming are completed smoothly. Both downstream and upstream processes benefit from leveled metal,” Operations Manager Tom Alandt explains. Leveled parts stay flat during the laser process and increase cutting accuracy. Additionally, they make for easy coating and forming.

The expo experience

However, due to internal cut-outs, architectural parts were warped after cutting. The company had just a small amount it could level with a press brake. "As a consequence, we needed to increase the leveling quality for good," Alandt stresses. But where to start? At Chicago’s FABTECH expo in 2017, Tom Alandt saw the FlatMaster® 55 in action. Upon his request, ARKU carried out leveling tests on site with demo material. As somebody who is familiar with flatness issues, he immediately noticed the high quality of the results. "From that moment on, I was eager to work with a FlatMaster® in Fresno," he reports.

In April 2018, Central Cal Metals ordered a FlatMaster® 55 165 precision leveler. The machine has been running since June 2018. “Thanks to the investment, we offer tighter leveling tolerances at a lower price,” Alandt explains. The leveler helps Central Cal Metals to level and stress-relieve their metal. “That’s a real step forward,” he summarizes. His customer base is fully satisfied as well: The flat parts add to the appeal of their constructions – without any quality cutbacks.

www.clsfab.com

**Toll processing from ARKU**

Are you in need of leveled and/or deburred, edge-rounded parts/sheets? ARKU is your one stop shop for all your leveling and deburring needs. Contact Chad Ellis (Toll Processing Manager) – chad.ellis@arku.com or simply call +1 513-387-9586.

**Are you in need of certified used equipment?**

ARKU offers a variety of refurbished machines which are available on short notice. All machines are rebuilt by certified service technicians. Contact us to set up material testing today!
President of Manufacturing at Styberg.\[3\]

"Besides, a lot of customers require tight leveling tolerances down to .004 inches.” However, Styberg’s existing leveling equipment wasn’t capable of leveling parts this thin. So Baker approached long-term partner ARKU for a new solution.

Matthew Hubbell, Field Service Technician at ARKU Inc. (right) and Mike Tresider, Supervisor at Styberg Engineering, inspecting the readout values of the new HRC 30 leveler.

Tight tolerances

“We initially reached out to ARKU in 2014. Back then, we needed spare parts for our old HRC 80-1250 leveler. ARKU was able to promptly supply us,” Baker remembers. Based on that positive experience, ARKU was the obvious contact for a new leveler as well. Within less than half a year, Styberg purchased a refurbished HRC 30-750. The machine originates from HRC which is an ARKU subsidiary, a fully-owned company since 2015.

Since the implementation in September this year, the new leveler is up to the task: “The HRC 30-750 achieves the desired tolerances and enhances our productivity,” Baker says. Thanks to the new leveling machine from ARKU, Styberg’s clients can rest assured. When vehicular components need to perform, they can trust in the precision of Styberg parts.

www.styberg.com

Racine, WI – The more complex the products, the more precise the required parts: As a contract manufacturer, Styberg Engineering knows the drill. The company produces metal parts for drivetrain applications for all kinds of vehicles. Over the past years, client requests have changed drastically: parts needed to be increasingly smaller and thinner. Consequently, the tolerances became much tighter, requiring more precise leveling operations. With ARKU’s leveling expertise, Styberg continues to deliver high-grade components.

The company was founded over 90 years ago as a small tool and die business. It quickly gained clients from multiple industries, including military, bicycle and automotive. They purchase parts for transmissions, brakes, and engines, amongst other things. During its long history, Styberg has faced quite a few market changes. “The longer we stay in business, the tighter the parts tolerances have to be,” says John Baker, Vice President of Manufacturing at Styberg.

Two ARKU birthdays were celebrated at this year’s evening event on the 14th of September: In addition to the company’s 90th anniversary, the 60th birthday of the owner Albert Reiss was also celebrated. This made for an evening full of surprises. At first, the Managing Director Marcus Bartle presented a fascinating retrospective of ARKU’s past decades. The Management Team then rolled in a special gift together with family and colleagues. “The evening celebration was an unforgettable experience for ARKU and for me personally. I would like to thank all of the employees who made this memorable day possible,” says Reiss, summing up the celebrations.

An unforgettable gift: Albert Reiss (3rd from right) received the miniature model with his wife Susan (4th from right) and his children Hannah (2nd from right) and Simon (1st from right).

An unforgettable gift: Albert Reiss (3rd from right) received the miniature model with his wife Susan (4th from right) and his children Hannah (2nd from right) and Simon (1st from right).