

Always a step ahead

The Käppler & Pausch GmbH leaves no wish unanswered in terms of sheet metal processing. But for co-founder Gabriel Pausch that is not enough. He conducts research to learn what will help his customers, both tomorrow and next year, to keep his company in first place, now and in the future.

When two mechanical engineers, Ulrich Käppler and Gabriel Pausch, in 1993 made reality of their long-sought desire for self-employment, they had a clear objective: To quickly become the leading sheet metal processor in the eastern part of Middle Germany. And they succeeded. The company, located in Neukirch, Saxony, today offers everything that the sheet metal market needs. Käppler & Pausch supplies virtually every sector – including the aviation industry, mechanical engineering, rail and motor vehicle industries, and even agricultural equipment and medical technology. The firm can process just about every metal. Batch sizes range from one-off prototypes to mass production of 5,000 items. The spectrum offered by the company comprises everything from design and engineering through to manufacturing complete assemblies. In this way the firm acts both as a job shop and as a system supplier. In addition to that, and to an ever increasing extent, it develops, builds and markets its own products.

Multiple mainstays

"We never wanted to stand on just two legs and thus always aimed to be a centipede," Gabriel Pausch recalls with a grin. And so the company, which started with water jet and 2D laser cutting, was always open to new technologies. Its entry into 3D laser cutting was undertaken fourteen years ago, and that, seven years later, proved to be the springboard into the world of laser welding. Anyone who engages in 3D cutting is entering new territory. The operator has to think in three dimensions and that is an entirely new world, not only for welding, but for cutting, too," Pausch reports. Today the company has its own fixture construction department and the staff is able to make even complicated fixtures, ready for use within a week.

"We will continue to focus on this field, watching how the market and the technology develop, and will be making further investments. We are also seeing advances in the beam sources, particularly in terms of energy efficiency. We want to stay on the ball here," says Pausch.

New markets

The businessman has always stayed right on top of things, evidenced by his decision to enter the field of tube processing six years ago. "This is an entirely different market," he explained." You can familiarize the sheet metal customer with new designs where pipes or tubes play a part – and we do that, as well. But we have also acquired an entirely new circle of customers who need tubes – and that was our intention." Today, the TruLaser Tube 7000 operates like all the machines, except for press brakes in three-shift operations. In spite of this, the firm often bumps up against capacity limits." We compensate for that by running weekend shifts," says Pausch quite pragmatically.

To ensure that everything runs smoothly in multi-shift operations, all the machines are linked to a Stopa storage system with more than 630 spaces. "Whenever necessary and if the procedures permit, four machines can operate fully automatically. This corresponds to a 35% degree of automation," explains Gabriel Pausch, "and there we see additional potential."

Good neighbors

As diverse as the ideas and services offered by Käppler & Pausch might be, the businessman insists on single sourcing in terms of his equipment. "The TRUMPF plant in Saxony is just around the corner; we're something like neighbors." And thus you will find TRUMPF machines almost exclusively on his shop floor: 2D laser machines, punching and laser cutting machines, press brakes, laser tube-cutting machines, and 3D laser technology. In addition to being good neighbors, Pausch argues, maintaining a stock of spare parts for a group of machines from a single source is simpler. That is also true for maintenance. Two of his mechanics are so thoroughly familiar with the machines that they can undertake many maintenance steps and minor repairs themselves. "And if we should need some kind of support, TRUMPF is a reliable partner. I appreciate TRUMPF as an innovative company. The diversity of its line and its services are simply unbeatable," Pausch explains.

Thinking outside the box

When Ulrich Käppler retired this last April, it was quite clear to Gabriel Pausch that he wanted to continue operations with two chief executives. Since June, Klaus Gerlach has been at his side and responsible for operations. Gerlach, now 51 years of age, was for more than 10 years the general manager of a company with more than 600 employees. He is assuming the tasks that Käppler once carried out. Gabriel Pausch will continue to concentrate on research and the development of new products. "We have more than 400 regular clients. And from them we receive, via our field sales staff, a great deal of feedback on what might be of importance to them in the future," is how he explains his commitment.

» Our intention is to always keep our staff young.

To mention just one example, his company is working on the development of the Kulan motorcar demonstrator, incorporating lightweight construction technologies, in the "Poly-Lab.Net" network. "Weight-saving construction will continue to interest us in the future. No matter whether in aviation, rolling stock or automotive construction. Everything that shaves weight is welcome, because it also shaves energy needs," Pausch explains. The company is cooperating with the Fraunhofer Institute for Machine Tools and Forming Technology in Chemnitz to develop solutions for bonding sheet metal with plastic or carbon-fiber-reinforced carbon.

A strong link

In addition to constructing a fish-friendly weir, in which its load-bearing elements are manufactured entirely on the TruLaser

Tube 7000, Käppler & Pausch has also collaborated with the ecoligent company to design and build a small wind turbine. It is to be marketed in the near future.



The company, which started with water jet laser cutting, today offers everything that the sheet metal market needs. Picture: Jan Gutzeit



The TruLaser Cell 7040 manages visible seams of the best optical quality. The staff is able to make even complicated fixtures, ready for use within a week. Picture: Jan Gutzeit



"We never wanted to stand on just two legs and thus always aimed to be a centipede," says Gabriel Pausch. Today Käppler & Pausch, located in Neukirch, Saxony, offers everything that the sheet metal market needs. Picture: Jan Gutzeit



The load-bearing elements of the fish-friendly weir are manufactured entirely on the TruLaser Tube 7000. Picture: Jan Gutzeit



Gabriel Pausch uses his network with Universities and research facilities to identify good recruits for the company but also for technological developments like a wind turbine. Picture: Jan Gutzeit

Here, too, Pausch has pursued cooperation with the Zittau Technical University, the Professional Academy at Bautzen, and the Technical University at Magdeburg. He uses this network not only for technological developments, but also to identify good recruits for the company. "Our intention is to always keep our staff young and do indeed do something about that. Of course, the general shortage of skilled labor is also apparent in the region," Pausch explains.
At present, seven young people are pursuing their apprenticeships as machinists, warehouse specialists or industrial mechanics. In the design department, students can undertake a practicum and even young people who take summer jobs at Käppler & Pausch have an opportunity to prove their suitability for a later apprenticeship in the firm.

Looking forward to the future

With his 61 years, Gabriel Pausch is still full of plans and ideas for the future. Thus he wants to expand the company's own line of products even further in the future – and that includes international marketing. In addition, the coatings operations, currently at the Kirschau site, are to be relocated to the Neukirch headquarters site. And, of course, the entrepreneur is always on the lookout for new areas of activity and challenges.

He envisions, for instance, expanding massively the cooperation with suppliers to the Federal Railroads. "Since July we have been certified for welding on rail vehicles and components in those vehicles, in accordance with DIN EN 15085-2", he says. "Even now, we could subcontract all the sheet metal production for a railway supplier and, in the future, use our expertise and our broad manufacturing range for the construction of components and assemblies for signal technology."

But Gabriel Pausch does not consider himself to be indispensable. "The cemeteries are full of indispensable people," he says with a smile. "It is just important to me that everything continues to run seamlessly and that my employees' jobs continue to be secure, now and in the future."

This article was first published in autumn 2015.

Who:

Käppler & Pausch GmbH, Neukirch and Kirschau, Germany. Founded in 1993. 210 employees.

What:

System supplier for sheet metal parts and complete assemblies; job shop as well as design, development and marketing of its own products. Delivers to the aviation industry and mechanical engineering, the railway and motorcar industries, agricultural equipment production, and medical technology, among others.

How:

TruLaser Tube 7000, TruLaser Cell 7040, TruLaser 3030, TruLaser 3040, 2 x TruMatic 6000, TruBend 8400, TruBend 5085 and many others