



#1
PURE MOBILITY

As a supplier focused on pioneering concepts and sustainable mobility, ElringKlinger is continuously evolving and contributing to advances in technology. The Group is committed to relentlessly driving innovation in order to create added value – for its customers as much as for ElringKlinger itself. This is demonstrated in the reports below, which take readers on a tour through various idea hotspots in the company.





228

employees work in the Research & Development departments at Group headquarters in Dettingen/Erms.

ElringKlinger has firmly embraced the words of Apple founder Steve Jobs: "Innovation distinguishes between a leader and a follower." After all, ElringKlinger is an innovator in its markets. The Group actively promotes forward thinking as a way of making new ideas a reality. The principle of engaging in dialogue with customers at an early stage or being the first to describe and pursue a vision is part of ElringKlinger's DNA and can be found throughout the company, including at its Group headquarters in Dettingen an der Erms.

CREATING NEW THINGS

Let's look first at the development underway in the area of lightweight components, a division that only came into being two decades ago. Back then, ElringKlinger had just discovered that metal engine components could be replaced by lighter high-performance plastics. "Less weight, greater functionality, and greater scope in design" ran the short, snappy claim that summed up how the customer stood to benefit – successfully, as it turned out: the division is now responsible for over 20 percent of Group revenue.

And this figure is set to keep on rising, because the division has now launched its next major leap forward by industrializing innovative lightweight components in partnership with a premium German manufacturer: "With a unique technology, we combine the hydro-forming of metal with plastic injection molding, enabling us to design complex customized geometries with ultra-small tolerances and impressive structural strength in the event of a crash," explains Klaus Bendl, the head of the division. All of this adds value for the customer, who is thus able to integrate significantly more applications and achieve tangible reductions in weight – an extremely valuable option in order either to better comply with the stringent emis-

sions regulations governing combustion engines or to increase the range of electric drives. "The main reason we can come up with innovations like this is the fact that, as well as our knowledge of materials and our process expertise, we also have the ability to develop highly sophisticated tools in-house," says COO Theo Becker, underlining ElringKlinger's strengths.

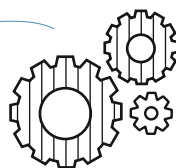
By combining organo sheets with plastic injection molding, the Group has in the meantime won a major order involving yet another method of this kind, this time producing door module carriers for a global manufacturer's compact car.

ENHANCING WHAT ALREADY WORKS

Changing places. Cylinder-head and specialty gaskets are ElringKlinger's bread and butter. This business formed the foundations of the Group, before it made the far-sighted decision 20 years ago to diversify its operations. ElringKlinger is the leader in this particular market, as it is in virtually all its others. Its share of its home market of Europe is well over 50 percent, with nearly every other cylinder-head gasket in the world likely to have come from ElringKlinger.

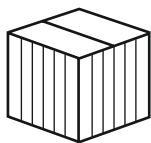
One can only defend a position of this strength with any success by keeping on developing rather than resting on one's laurels. Whereas the Group's multilayer technology used to be regarded as a groundbreaking innovation, the past few years have seen developers tinkering around with coatings and stopper geometries. These steps have been necessary in order to ensure that the ever-smaller engines brought about by the downsizing trend can continue to be sealed reliably. And ElringKlinger has enjoyed success here too, remaining in constant demand as a professional partner





»A strong culture of innovation is partly about having the entrepreneurial willingness to make your investment in advance if your idea is a good one.«

DR. STEFAN WOLF — CEO of the Management Board



Up to **1,000 °C**
is the temperature that ElringKlinger's newly
developed gasket coatings can withstand.

8,103 metric tons
of raw materials and semi-finished products
were shipped by ElringKlinger from Germany
to America and Asia in 2016.



Dettingen/Erms

Group headquarters is where all the various strands from the Research & Development departments come together.

and recording full order books. “Without the process expertise that we’ve built up over decades, however, we simply wouldn’t be able to exploit these benefits of the product characteristics that we’ve kept on improving,” adds Reiner Drews, who heads this division. At ElringKlinger, product knowledge and process expertise dovetail perfectly to shape successful innovations.

STRATEGIC PLANNING

Let’s now cross over into Plant 2 at the company’s main premises in Dettingen/Erms. It is home to, among other things, the aftermarket business, which has carved out a commanding position throughout the European and Middle Eastern markets for gaskets, gasket sets, and service products over many years. Yet the division has much more potential than that. “We want to expand into more key markets,” says divisional manager Dirk Willers, outlining the strategy. Maintenance cycles usually begin six to seven years after buying a vehicle. In that respect, the task now facing ElringKlinger’s aftermarket business is to enter the Chinese market and expand its presence in North America and thus exploit the structural growth that both regions have enjoyed over the past few years.

But that’s not all. Willers is also working systematically to drive his portfolio forward: “Our aftermarket business involving cylinder-head gaskets gives us a very successful base. But even now, we want to be thinking about tomorrow,” he says. So the division is already weighing up which of its products would lend themselves to the aftermarket business further down the line in the transformation process that the industry is undergoing. “Combustion engines are still going to need repairing for the next few decades, maybe even to a greater extent,” Willers says, explaining his division’s thought processes. “This is why we’re really targeting new products to add to this business. We’ve also started to prepare ourselves and our strategy for the requirements that electromobility will bring.” After all, the rule is a simple one: Today’s new business is tomorrow’s aftermarket business.

OPERATING GLOBALLY

Another scene change – back to Plant 1 and the Global Logistics department. It is here more so than anywhere else that you can sense the heavy demands brought over the past few years by the company’s rapid growth and global reach. New approaches are needed in order to have the capacity to operate successfully around the world. It’s all about “joined-up thinking”: Suppliers’ and customers’ processes as well as internal information are being adapted in order to standardize how data is exchanged. Although it may sound simple, it’s actually rather complicated. Delivery schedules, delivery notes, invoices, and all other documents and processes have to be made to match, on both the purchasing and sales sides.

In addition, the inventory analyses reveal which products regularly enter and leave the warehouse and which production and storage processes merit closer investigation. This segmentation is part of the implementation of new dispatch strategies developed as part of a global project during the last fiscal year. Inventory levels and batch sizes for delivery and production are the corresponding variables used to guide these optimization measures – not just locally, but also globally across the entire Group. “We need to have the same standards that are met across the world. It’s the only way to leverage economies of scale in logistics,” underlines Head of Global Logistics Jorin Preuß. “That’s what we’re working flat out toward.”

FORWARD THINKING

Four examples from Group headquarters that demonstrate how innovations form the main building block for ElringKlinger’s success. Forward thinking provides the methodological approach, prompt dialogue with customers the essential tool, and leading the development field the inevitable outcome. ElringKlinger’s goal and incentive expand on this further in equal measure.