

Case Study

MdW Technical Support

MdW TECHNICAL SUPPORT
your connection in food machinery

Preventive gear motor replacement
for a spiral freezer in the snack industry

MdW Technical Support builds, maintains and installs complex machines for the food industry. Backed by more than 20 years of experience in the industry, they are experts in making machines efficient and safe. In recent years, MdW has been exploring the process of upgrading machines in the food industry, leading to a strong efficiency improvement of the existing machinery.

One of MdW's clients is Oma Bobs Snacks. This food producer supplies a wide range of traditional snacks exclusively to the hospitality industry. All snacks are carefully devised, developed and prepared in the same way that grandma Bobs, the grandmother of founder Jurgen Ottenhoff, used to do.



"If something urgent comes up, BEGE takes care of it in no time at all. And that is incredibly important in this business."

Michel de Wit
Owner of MdW Technical Support

Preventive replacement



Old situation: gear unit

The food processing industry is characterised by a high degree of hygiene and efficiency. Downtime due to production disruptions should be avoided as much as possible in this sector as well. Thanks to timely maintenance, Oma Bobs Snacks discovered that the cooling tower was no longer functioning optimally.

MdW Technical Support asked BEGE Power Transmission to assist in the preventive replacement of the spiral freezer drive motor gearboxes at Oma Bobs Snacks. The drive motors of the cooling tower with double spiral and double belts had been around for some time when it was discovered that one of the gear units was nearing its end. The oil seals were leaking, rust was formed and the gear units showed signs of wear and tear. As the original supplier of the motors no longer existed, MdW turned to his drive partner BEGE for assistance to help him with the specifications of the motors and gear unit so that the drive would once again perform at its optimum level.

“I have been working with BEGE for 10 years and I am very pleased with the level of knowledge of all employees. In addition to the expertise and the fact that they are always involved, I am very pleased with their customer-friendly and solution-oriented way of working.”

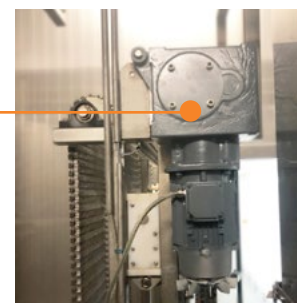
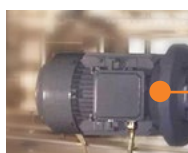
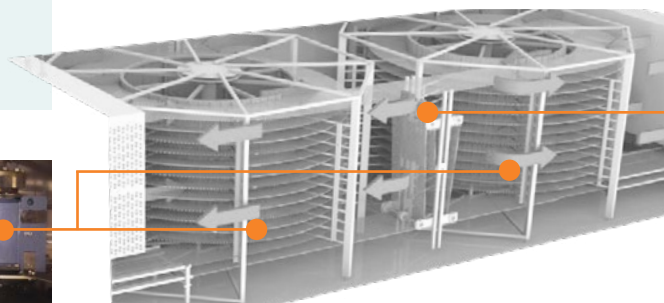
Why MdW opted for BEGE

- ✓ BEGE's engineers are customer-friendly, they respond quickly and personally;
- ✓ They work in a solution-oriented manner and identify with the client's situation;
- ✓ As they work with great precision and accuracy, everything is always right;
- ✓ Long-term partner;
- ✓ High level of knowledge.

The spiral freezer

Spiral freezers are versatile systems for cooling and freezing large quantities of snacks without compromising on quality, texture and taste. The spiral freezer at Oma Bobs Snacks ensures that croquettes and other high-quality snacks are moved at low speed during the entire freezing process.

Jurgen Ottenhoff from Oma Bobs Snacks: "With the replacement of the gear motors in the freezer, we can continue to meet the growing demand of our customers and we are able to achieve our ambitious growth objectives in the Dutch hospitality market."



The spiral freezer had to perform under difficult conditions; daily high-pressure cleaning and rapid cooling from 0 to -28° Celsius in a short period of time after being switched on.

These conditions place a heavy burden on the integrity of the machine. Short research by MdW and the engineers of BEGE led to the recommendation to take immediate action. BEGE rewound the motors so that the machine could move forward again.

The risk of downtime had been eliminated for the time being, but it became clear that the gear motors in the cooling tower had to be replaced in the short term. In consultation with MdW, BEGE and Oma Bobs Snacks, they decided to completely renew the gear units at the beginning of 2019.

Working method:

- Phased implementation: first ensure continuity;
- Engineering services for the optimisation of the entire construction;
- Complete check-up of the current condition: to determine the status quo and provide a forecast of the life span to avoid downtimes.

Long-term partnership

Michel de Wit, owner of MdW Technical Support has been working with BEGE for more than 10 years. From a previous working environment – coincidentally also in the snack industry – he was already familiar with the motors and other products of BEGE. When de Wit founded his own company MdW Technical Support, he decided to continue working with BEGE.

Initially because he remained active in the same sector and therefore often came to BEGE for identical replacements. Over the years, the bond with BEGE intensified and a long-term partnership developed. In the meantime, the relationship has become so close that de Wit automatically knocks on BEGE's door whenever MdW develops a new machine.

Phased implementation

"If I build something myself,
if I think of a machine myself,
it's automatically BEGE."

De Wit explains why he is so happy to work with BEGE: "A few years ago, we were working on a project where a customer had a roasting oven with a couple of machines and five conveyor belts connected to it. We integrated it in the controller so that the speed of all belts can be set directly in the display.

BEGE was very helpful with the optimisation of this installation; the choice of the motors, the weight of the drive and all the technical calculations. I sketched out the starting situation and the engineers at BEGE worked through everything and came up with sound advice.

In this case, they recommended installing two different types of motors to avoid that the machine would contain too many different motors."

Robust gear unit

The result of the collaboration between Oma Bobs Snacks, MdW Technical Support and BEGE is the installation of a robust 700kg gearbox that is fully compatible with all relevant hygiene requirements and regulations. The gear motor is connected to a 2.2kW BEGE motor via a coupling flange. In combination with the enormous gearbox, the drive delivers a very high torque of 20,000 Nm at 0.9 rpm.



Result

- ✓ Fast implementation of a suitable solution aimed at the needs of the end customer;
- ✓ The motors are IP56 and meet strict food safety requirements;
- ✓ Upgrading the machine;
- ✓ Support in the field of technology and calculations.

About BEGE

Your Drive, Our (Trans)Mission since 1950

BEGE Power Transmission creates, optimises and maintains reliable drives so that your industrial company, large or small, can focus on its core business without any worries.

We offer comprehensive, intelligent drive systems to achieve efficient, productive installations with maximum continuity. The combination of our own production lines and the acquisition of Ströter makes BEGE your ideal partner for reliable and integrated drive systems. We value quality, efficiency and product and process innovation.

Expert in Your Sector

We build long-term relationships and focus on how our drive solutions can contribute as effectively as possible to making your aspirations a reality.

We combine drive technology expertise with knowledge of the specific sector. The result is fully integrated, customer-specific drive that increase the competitive advantage of our customers' production facilities in a wide range of sectors. We have the answers to today's challenges and tomorrow's needs in industrial production.



Food & Beverages

Food-safe, efficient and hygienic in humid environments.



Agriculture & Horticulture

Energy-efficient, powerful and cost-effective under harsh conditions.



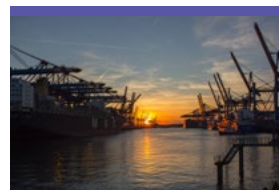
Packaging & Logistics

Flexible, accurate and durable for high productivity.



Bulk & Solids

Sturdy and certified for a safe, productive environment.



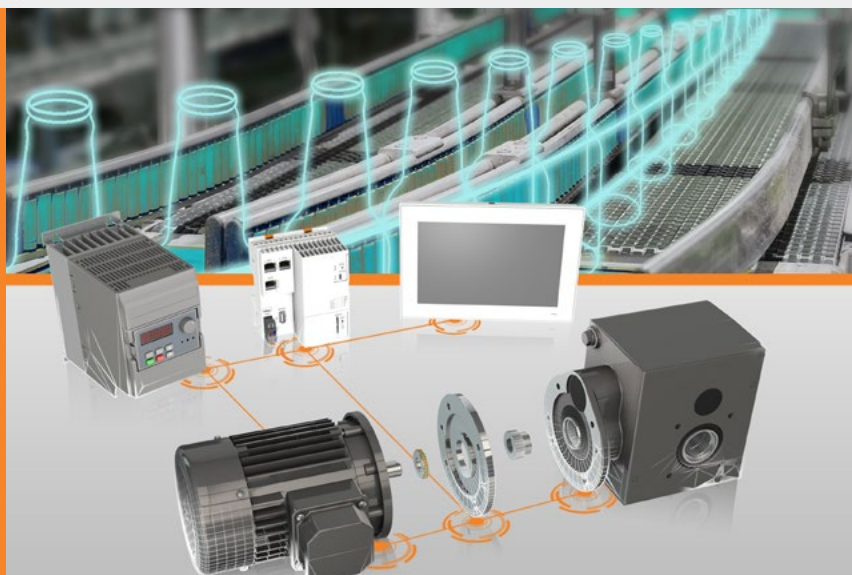
Marine & Offshore

Corrosion-resistant and reliable in demanding or extreme situations.

Want to find out more?

Would you like to find out what BEGE can do for you?

Contact us. We love sharing our knowledge.



BEGE develops and optimises sector-specific drive systems



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OUR TRANSMISSION

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