Handling equipment

Bystronic: vacuum lifters small devices with important jobs

N IMPORTANT ORDER

5 October 2005 was a great day for Anke Lippmann, responsible for handling equipment at Armatec. "It does not happen very often that a single client orders so many handling devices all at one go," she said. "It was especially significant that the order covered a very wide range of products: several *Easy-Lifts* in various versions, pillar and wallslewing cranes, lightweight craneways and special devices. This showed us not only that the client knows exactly what he wants, but also that he has complete faith in our product range."

The customer in question was *Pilkington Austria*, located in the town of Bischofshofen. Hubert Schwarz, new Country Manager for Austria, has put the company back on the road to success, in his decision-taking role in the restructuring measures that have taken place.

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At first glance, handling devices may only seem to be a small part of the glass preparation process. They are, however, located at critical interfaces, and if they do not operate properly, they can have a devastating effect on all stages of production. Günter Seeberger, Production Manager at Pilkington Austria, is therefore installing handling devices from the Bystronic technology centre Armatec. During a guided tour of the plant, he explained why people at Pilkington are paying particular attention to vacuum lifters.



Bystronic: vacuum lifters - small devices with important jobs

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"Our plan has really worked out," declares Günter Seeberger, Production Manager at Pilkington Austria, whilst he puts on his protective helmet and safety goggles and then opens the metal door into the production area. "Considering all cost effective methods, we have moved away from mass production and have concentrated on high quality products. That includes, amongst other things, the manufacture of solar, coloured and fireproof glass."

During the production process at Pilkington Austria, glass can pass through many pairs of hands and several various departments. For this reason, vacuum lifters are very carefully selected as they contribute significantly to production speed and quality of the end product. At Pilkington, very high value glass is handled with these devices.

"In total, we have seven different departments here and in almost all of them we use handling devices from Bystronic," says Seeberger, standing next to a one-column vacuum lifter, the so-called *Easy-Lift*. Directly in front of this there is a small worktable on which an employee is assembling a step-type combination of three sheets of insulated and fireproof



Günter Seeberger, Production Manager at Pilkington Austria glass. Concentrating hard, he places the last of the three sheets on top of the other two. "For us, quality comes before quantity – that means that in a few cases we still prefer to work by hand. He glances at the Easy-Lift and adds, "If a handling device is light, safe and easy to use, excellent cycle times can even be achieved even with manual assembling, as we can see here."

FULL CAPACITY IN PRODUCTION

The forklift and suction cups of Easy-Lift As we continue through the workshop, it is clear that the Pilkington Austria's order book must be very full. Everywhere production is at full capacity and if any machines are idle, this is usually only because a new system is about to



be installed. This can be seen at Günter Seeberger's next stop directly in front of a new production line for tempered glass.

The line is subdivided into two sections: on the right is the *first'arris* edge-grinding machine from Bystronic and on the left a tempering furnace which has an Easy-Lift installed both at the loading and the unloading sectors. Both parts of the line are separated by a walkway that runs through the centre. Seeberger explains: "At either end of our first'arris, there is a new and fully automatic process in the form of special suction beams. But we do not transport the ground sheets directly to the tempering furnace. We stack them onto a glass rack and feed the furnace manually using the Easy-Lift. This, from time to time, also gives us the option of tempering glass which did not previously pass through the first'arris before going into the furnace. This additional flexibility is only possible by integrating the Easy-Lift. That is why we put all our faith in this handling device also at this station."

Günter Seeberger walks on and comes to the final stop on our guided tour, a *Fleischle* screen printing system. "Here we coat glass sheets before we finally enamel them in the furnace," he explains. "If only the outer edge is coated, the sheets can easily be taken from the top. In a full surface coating, the workpiece can only be lifted up from the underside so that the coating is not damaged. We needed a handling device that could do both."

CUSTOM-BUILT MACHINES

To meet these customer requirements, Bystronic developed the Easy-Lift with a forklift. This specially tailored installation at Pilkington Austria is only a horizontal handling process, so standard functions such as tilting did not have to be included on this machine. If the glass sheet can be taken from the top, removable suction cups are used. Furthermore, the lifting device was fitted with a rubberised upper contact surface. This means that even fully coated sheets can be lifted gently onto the material from the underside. In addition, a castor table was also designed where the openings are optimally tailored to match the Easy-Lift's lifting fork. "We now have exactly what we want: a handling device that is multifunctional," reports up a satisfied Seeberger.

The Fleischle screen printer





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