

Experience brings stability

HNG Global Managing Director and CEO, Jochen Böllert spoke to John Wallis about the positive changes realised by one of Europe's most technically advanced glass container factories, now under the ownership of India's leading producer.

Productivity levels and staff morale were disappointingly low when Germany's Agenda Glass AG went into administration in 2011. Since the factory's acquisition later that year by India's leading glass container producer however, an experienced local management team has been drafted in and some critical refinements have been made. Subsequently, confidence has grown and the renamed HNG Global GmbH is starting to enjoy the profitable benefits of its labours.

When commissioned in 2010, this €50 million greenfield project had been feted as one of Europe's most advanced glass container production facilities, utilising some of the industry's most sophisticated manufacturing technologies. Sadly, with limited industry experience, it is apparent that some key errors of judgement were made, both prior to the factory's start-up in February 2010 and during its first year of operation. The plant is situated at Gardelegen, approximately 200km west of Berlin and 145km east of Hannover. Part of the former German Democratic Republic (DDR), the town sits at the heart of Saxony-Anhalt, where a state-of-the-art infrastructure, excellent investment incentives and an innovative R&D environment have made it eastern Germany's leading destination for foreign investors. Since 1991, Saxony-Anhalt has generated about 330 important investments from domestic and foreign companies, who have poured almost €10 billion into the state, creating more than 20,000 jobs.

MARKET DEMAND-DRIVEN

It was in 2006/2007 that the German glass packaging industry began a process of consolidation, partly it is suggested, in an effort to raise prices. This included the closure of several melting furnaces, especially those devoted to clear glass production, leading major domestic customers and distributors to stimulate the creation of an alternative local supplier, who could build and operate a dedicated clear glass production facility.

The factory location in Gardelegen was chosen for various reasons, including the fact that raw materials are readily available locally, in addition to which the region's road infrastructure has been the subject of considerable investment in recent decades, thereby simplifying distribution. Furthermore, unemployment rates are considerably higher in this part of the country, providing a rich source of labour. Importantly, valuable subsidies were also available to help new investors build industrial enterprises in the area.

This single furnace facility became operational in February 2010, serving three production lines. With the exception of a brief period when emerald green was melted, the furnace has produced white flint throughout.

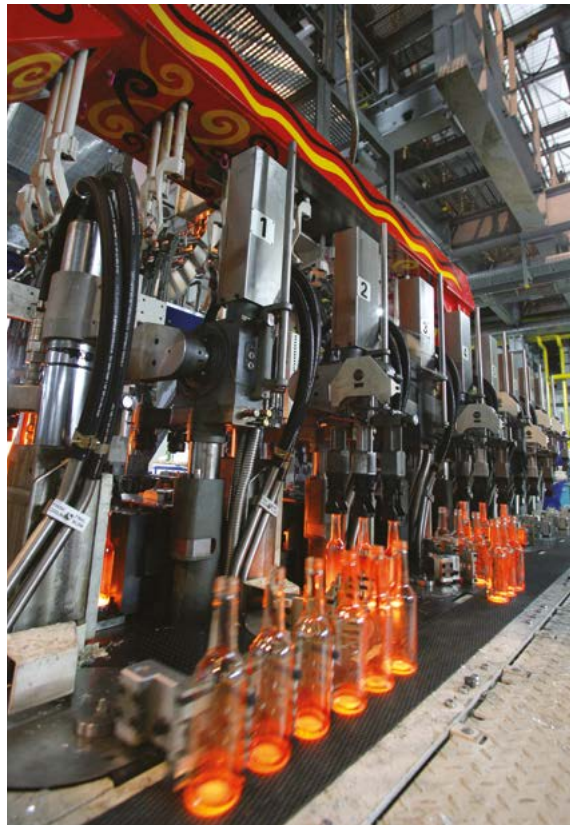
Jochen Böllert has been Managing Director and CEO since Hindusthan National Glass & Industries Ltd acquired the business in 2011. Previously, he was Managing Director



HNG's Gardelegen site concentrates on the production of white flint glass containers.

of Heye International, as well as having run the Ricardo Gallo and Sotancro glass container factories in Portugal at different times. This experience, together with that of Technical Managing Director Wolfram Seidensticker and other senior management colleagues, was to prove essential in realising a turnaround in the factory's fortunes. "The beauty of this business is that you generate immediate feedback to changes made and can measure improvements to productivity and profitability" he confirms.

Sadly, the original business had failed within a year >



The 12-section double gob, 6 1/4in centre distance NIS machines are also capable of running in triple gob.



€50 million was spent on the greenfield glass container production complex at Gardelegen.

of start-up. According to Jochen Böllert, it is well known within the industry that a greenfield operation of this type needs time to improve gradually in terms of efficiency and quality, as well as building an effective operational team. "Sometimes it can take up to three years for a new factory to achieve efficiencies of 88%-89%, a level that is needed to be successful in the market." Apparently, this scenario was underestimated by the original owners, so inadequate funding was put in place to give the fledgling concern adequate time to make the necessary improvements. The company was losing money and producing bottles at efficiencies of less than 70%.

Ultimately, the business went into receivership but continued to operate, protected under German law for a period of several months. During this time, a couple of possible buyers emerged, expressing interest in acquiring the assets of Agenda Glass. India's leading glass container

producer, HNG had been looking for an opportunity to expand its operation and put together a successful proposal to acquire the business, persuading both the administrator and authorities in Saxony-Anhalt that they could offer the best package for the glass factory's ultimate success. HNG took over the business legally in August 2011 and Jochen Böllert joined later that year to spearhead its rejuvenation.

ADVANCED CAPABILITIES

Despite its original operational problems, the Gardelegen glass factory remains one of the most advanced of its kind, worldwide. As a greenfield facility, the

latest dedusting and deNOx pollution control investments have been made, making the facility one of the industry's cleanest. A ZIPPE fully automated batch plant and cullet return equipment are installed and the plant was automated using the Simatic PCS 7 process control system from the Siemens Industry Automation Division.

The SORG natural gas-fired, end port design furnace has a nominal melting capacity of 360 tonnes/day and serves three of the same company's latest design gas-fired forehearth. A furnace and forehearth control package from STG Combustion Control GmbH & Co KG is operated. The first furnace repair is scheduled for 2022.

All three production lines operate Bucher Emhart Glass NIS forming machines, primarily operating the NNPB process. These 12-section double gob, 6 1/4in centre distance machines are also capable of running in triple gob, a transition that is likely to start on at least one line during 2014, depending on the success of the company's revised product portfolio.

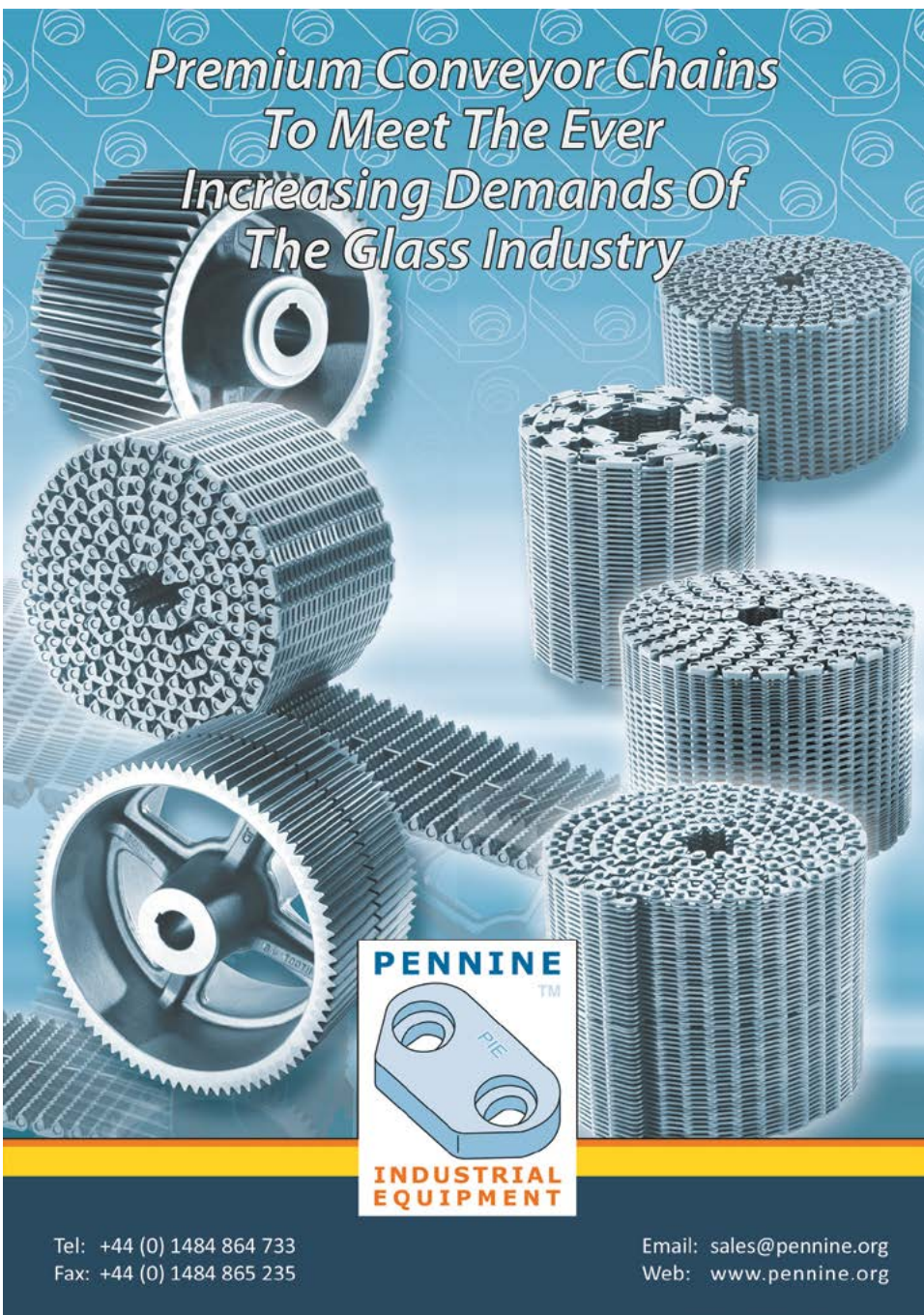
The three Ernst Pennekamp annealing lehrs are gas-fired and were built to the company's advanced energy efficient design.

At the cold end, the latest Bucher Emhart Glass FLEXinspect inspection technology has been installed. This feeds fully automatic palletisation and shrinkwrapping equipment, delivered by MSK Verpackungs-Systeme GmbH, after which output is stored in a 35,000m² covered warehouse.

PRODUCTIVITY PLAN

The new owners admit that it was a tough transition, including some unexpected challenges to overcome but two years later, the business is heading in a positive direction. "It was a difficult time for the workforce, coming to terms with new owners from a different part of the world and bringing some different ideas with them" Mr Böllert explains. Throughout, HNG has been working closely with suppliers to optimise system operation.

The first priority was to



**Premium Conveyor Chains
To Meet The Ever
Increasing Demands Of
The Glass Industry**

PENNINE
INDUSTRIAL EQUIPMENT

Tel: +44 (0) 1484 864 733
Fax: +44 (0) 1484 865 235

Email: sales@pennine.org
Web: www.pennine.org



External view of the ZIPPE fully automated batch plant.



The Bucher Emhart Glass NIS forming machines primarily operate the NNPB process.

develop a productivity plan, analysing production over the initial period, changing management behaviour and with the help of HNG technical and personnel management, turning the factory from a loss maker to a profit generator within the space of 12 months. Some modifications were made to the cold end layout that assisted these efforts, as did the decision to change an existing triple gob IS machine to double gob operation. "There is a need for greater operator experience when running triple gob equipment and swabbing needs to be conducted differently" says Jochen Böllert.

Perhaps the major change achieved, however, was a change in the mind-set of the plant personnel via an intensively managed team-building process. "You can have the best equipment in the world but unless you also

build a skilled team to operate it, that equipment will not work." In the opinion of Jochen Böllert, the human factor represents at least 40% of a factory's success in the glass container business.

Sanjay Somany and his colleagues at HNG have been very supportive of the local management team's revisions, which are geared to optimise the performance of a German company, serving the German market. HNG has not simply 'exported' its successful formula to the German subsidiary, supporting

the local managers to find workable solutions. Increasingly, the two organisations are coming closer together and are now helping one another to overcome forming and mould issues etc, where HNG (India) is profiting from HNG Global's greater experience in NNPB operations and the German business is benefitting from the Indians' considerable experience in high speed BB operation. The Gardelegen factory is also benefitting from the market leading position maintained by its parent business, maximising the >



Ernst Pennekamp GmbH & Co. OHG

Königsfelder Straße 38 · 58256 Ennepetal · Germany

Phone: +49 2333 605 0 · Fax: +49 2333 605 200

E-Mail: info@pennekamp.de

www.pennekamp.de





The latest Bucher Emhart Glass FLEXinspect inspection technology is installed.

access afforded to market leading international customer brands.

By October 2013, the factory had realised pack-to-melt efficiencies of 88%. Although this is not the level where the plant wants to peak, the management is pleased with the improvements made in the space of just three years. The target is to exceed 90% but this is likely to take another 12 to 24 months to achieve. Furthermore, it is acknowledged that with constant job changes on the factory's three machines, it is becoming increasingly difficult to make quantum levels of improvement. It is now more a case of finetuning on a day-by-day basis.

All of this has been achieved with a workforce with little or no long-term experience of glassmaking. Training has been the responsibility of skilled glassmakers who

were brought in from other German glassworks, although coming from different companies with different philosophies, they also needed to agree a common approach. In addition, the specialist training services of Siegler Consulting continue to be a valuable asset, especially in the areas of IS production, maintenance, forehearth tuning etc.

CHANGING CUSTOMER FOCUS

Employing 143 people and five apprentices, HNG Global is now in transition to a different group of target customers. Formerly, up to 85% of output was supplied to two large German glass distributors, with the remainder supplied to the local mineral water industry. Now, the company is in the process of reducing its dependence on distributors and is establishing more direct links with customer industries. A standard range of products is offered to the beer, milk and water industries, in addition to which it continues to work closely with distributors, primarily for the liquor trade.

Direct sales are handled from an office at the Gardelegen site and Jochen Böllert expects the company to continue to focus on the local German market. In part, this is driven by the size and weight of containers produced (between 0.2 and one litre capacity), which are arguably too bulky for remote shipment. HNG Global's export rate is between 20% and 25%, in line with the German industry average.

FUTURE PRIORITIES

Major targets for the business are to stabilise production efficiencies at a higher level, while also maintaining the company's profitability. Although there is space for a second tank at Gardelegen, current market conditions are not conducive to such an investment.

Jochen Böllert believes the German glass container market is currently finely balanced between production and demand, with approximately 25% of output exported. "Product quality is high and unit costs are competitive due to controlled manufacturing, energy and labour costs" he contends. "This all helps Germany to be a successful exporter."

The founder of the original HNG business in India and winner of the 2013 Phoenix Award, Mr CK Somany is keen to use the Gardelegen project as a starting point for HNG to develop 50% of its business outside India. Jochen Böllert believes acquisition is a more realistic way to achieve these goals than building new factories. "We need to build a critical mass on a global scale" he concludes "and hope to get there within a few years." ■

FURTHER INFORMATION:

HNG Global GmbH,
 Gardelegen, Germany
 tel: +49 3907 7 75 78-0
 email: info@hngglobal.net
 web: www.hngglobal.net



HNG Global operates three high speed production lines.