

Pivotal role for Thai glass packaging producer

Boonsak Stitmannathum is Senior Vice President - Operations at Thai Glass Industries and Thai Malaya Glass, BJC's successful Packaging Business Unit in Thailand. He spoke to official AFGM journal *Glass Worldwide* about the company's operations and his involvement in their management.

Berli Jucker's Packaging Supply Chain business units focus on design and manufacture, as well as the marketing, sales and distribution of packaging products, while also offering engineering solutions. The organisation strives to meet customer demands, improving operational efficiency and product quality, as well as seeking new business and investment opportunities for future growth.

With the vision of Berli Jucker's management team more than half a century ago, Thailand's first private glass container factory, Thai Glass Manufacturer Co Ltd was set up on the banks of the Chao Phraya River in Bangkok as a joint venture between Berli Jucker Co Ltd and The Australian Consolidated Industry Co Ltd. The factory commenced operations in 1951 and its products were marketed and distributed by Berli Jucker's Glass Products Division. Coping with continuous growth since its first operation in 1951, a second factory became operational at Bang Plee district, Samutprakarn province in 1991. The original TGI plant shut down in 2014 but today, BJC's Packaging Unit operates two factories (Thai Glass Industries and Thai Malaya Glass). A combined daily production capacity of 2735 tonnes is managed by TGI and TMG at Samutprakarn and Saraburi respectively.

GLASS SECTOR EXPERIENCE

Although Boonsak Stitmannathum is a comparative newcomer to the senior management team at Thai Glass Industries, his involvement with the local hollow glass industry dates back almost four decades. He has worked for TGI's parent company (BJC) for eight years, becoming TGI's Assistant Vice President for Technology and Engineering in 2013. In this role, he was responsible for new projects and investment, including the start up of new furnaces from initial concept to commissioning,



Boonsak Stitmannathum (left) with Veerasak Chongcharoenpornchai, TGI Vice President Procurement, during the 40th ASEAN Glass Conference last October.



Boonsak Stitmannathum (back row, middle) with AFGM committee members during the plenary session of the 40th ASEAN Glass Conference.

as well as handling the glassmaker's evaluation of the latest production technologies, recommendations for their use and their implementation.

This followed more than three decades working for the family cullet supply business, "so I have enjoyed a lifetime in the glass industry, first with glass breaking and now in glassmaking!" he explains.

DIVERSE CAPABILITIES

Mr Boonsak's first project as BJC's Assistant Vice President of Technical and Engineering was SB3, the latest furnace at Thai Malaya Glass in Saraburi, started three years ago. This furnace was built from new, with a total capacity of 400 tonnes/day and five production lines, producing amber. At 94% production efficiency, it is the

group's best performing installation.

He was in charge at the start of the project but not at the time of commissioning; two months before start up, Boonsak Stitmannathum became Senior Vice President of Operations for Thai Glass Industries and Thai Malaya Glass. These companies are separate from Malaya Glass and Malaya Vietnam Glass, both of which are BJC joint ventures with O-I. Global glassmaker O-I manages the Malaysian and Vietnamese plants on a day-to-day basis, although BJC is involved in setting budgets etc.

Collectively, the TGI and TMG operations account for 2735 tonnes/day of glass packaging from eight melting furnaces (five at TGI and three at TMG). Five of these furnaces melt flint, two melt green and one >



Additional capacity will come on stream at Thai Malaya Glass in September 2017

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The TGI vision is to be the leading and preferred glass packaging company in the region.

is an amber tank. Five years ago, the business was more focused on amber but when a key customer decided to relaunch its previously amber product in green glass, a change of melting focus was initiated.

The diverse manufacturing capabilities operated by BJC in Thailand allow the glass packaging businesses to serve the pharmaceutical, food and beverage sectors with almost everything except very small ware, below 40ml capacity. Most work is domestic, with about 5% exported. The biggest customer is ThaiBev, which is responsible for brewing Chang Beer and takes approximately 50% of glass packaging output. The Chairman of ThaiBev is also the Chairman of BJC, making ThaiBev a kind of internal customer, although such arrangements have their own challenges. The other 50% of production is sold to a diverse range of customers, the majority being involved with food.

MAJOR EXPANSION

To keep pace with demand from local and international food clients especially, it has been necessary for the glassmaker to outsource some glass container production in recent times, although this situation will start to change from September 2017, when additional capacity comes on stream at Thai Malaya Glass. SB4 furnace will add 300 tonnes/day and five production lines. It represents the first phase of an ambitious expansion programme for the site, where another three furnaces could be constructed in the coming years.

The glassmaker's ability to expand at this challenging economic time has been surprising to customers and suppliers alike. "Our competitors have capacity but have stopped production in some furnaces, so we have increased our customer base and maintained about 39% market share in 2016" Boonsak Stitmannathum explains.

As was previously the case with SB3, TMG is relying on the technical expertise and reliability of Nikolaus Sorg and its sister company EME for this project. SORG was selected to supply another state-of-the-art end port regenerative furnace, complete with IRD doghouse and EME-NEND batch chargers. This equipment will feed five more SORG 340S forehearths.

The EME batch plant has been built with a capacity of 300 tonnes/day, in anticipation of future expansion. The plant is being built as a modern tower concept for flint, green and amber glass and includes automatic hot cullet scraper return systems. The cullet storage facility will be equipped with crushers and all metal detection with automatic rejection. The entire system will be fully automated via a proven EME controls solution.

"We rigorously compared all furnaces and decided again to use SORG for SB4, as we had for SB3" Mr Boonsak confirms. "We are pleased with the performance of SB3,



Surasak Wannaparhun, TGI Vice President Quality and Research Development, was Chairman of the technical session at the 40th ASEAN Glass Conference.

where even the energy consumption is very good. SB3 is very well organised and efficient – sometimes you don't have both! I have to give credit to the team running the furnace, which is an excellent combination of established and newer staff, all with real expertise."

A specialist training centre has been created for TGI and TMG staff, delivering both the technical and management skills required to run an efficient glassworks. "We also started a new R&D department in 2016, having discussed the opportunity for many years; significant budget is now allocated to R&D and we will start benefitting from the investment in the near future."

Traditionally, the organisation has used O-I forming equipment, although other international machinery suppliers are also considered for the latest TGI/TMG investment projects, such as Bucher Emhart Glass and Heye International, for example. "The ASEAN Glass Conferences provide an excellent opportunity to meet suppliers from around the world and learn about the latest technology" says Boonsak Stitmannathum. "Much of the benefit of the ASEAN Glass Conferences is about relationships, getting to know each other better. This is often the priority for attendees and brings a lot of business benefits, although many attend for the technical session too. Last year's conference programme was very good; my TGI colleague Surasak Wannaparhun was Technical Session Chairman and did a great job."

OTHER BJC INVESTMENTS

Elsewhere within the BJC Packaging Business Unit, significant investments have been made at BJC Glass Vietnam Ltd in recent years. "We have further expansion plans in Vietnam with a new furnace within the next two-three years"

Mr Boonsak indicated. This factory already houses one furnace with four lines, the fourth line having only been added in recent months. And in Malaysia, Malaya Glass Products Sdn Bhd has scheduled a cold repair and furnace expansion.

SHARED EXPERIENCE

As Senior VP of Operations, Boonsak Stitmannathum is responsible for production, logistics, safety etc at Thai Glass Industries and Thai Malaya Glass. This involves 1100 employees at TGI and another 800 at TMG. "The advantages of TMG and TGI being part of the BJC Group include the benefits of sharing experiences and helping each other" he contends. "In 2017, we plan to organise a strategic plan together with our joint venture companies to understand the region's total requirements. Although each company has its own customers, we would like to co-ordinate together."

For the past year, Mr Boonsak has also been one of four Vice Chairmen at the Glass Manufacturers Industry Club at the Federation of Thai Industries (GMFTI). "We share knowledge, which is very useful for the industry as a whole" he concludes. ■



TGI has operated its glass packaging business in Thailand since 1951.

FURTHER INFORMATION:

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