Customer-Driven Innovation

Commitment to customer integration highlights management trends at this year’s Industrial Excellence Awards in Leipzig.

Corporations are flooded with seemingly infinite data every day that are swept under the carpet. There are data on purchases, billings, production and maintenance. And there are data on marketing and customer sales. For the company that spends the time to sort customer data, a new world of opportunities arises. Smart companies are returning to the customer through Big Data.

It was a strong focus on this concept that gave the winners of the 2013 Industrial Excellence Awards (IEA) in Leipzig their edge. The annual conference and prize ceremony recognises excellence in corporate strategy and management execution. Understanding customer demand has sparked a new business consciousness at prize-winners BMW Leipzig Plant, Orkli of Spain, and Itron of France, and even reversed the fate of Stiplastics in Beauvoir-en-Royans which was wrestling with bankruptcy.

Big Data

Companies are now sifting through the customer data already at their fingertips in an effort to strengthen relationships and ultimately boost sales. “We did see some smart use of data - and large amounts of it to try to identify areas where some new services could be delivered to the customer,” says Stephen Chick, INSEAD Professor of Technology and Operations Management, on the sidelines of the awards presentation.

Chick pointed to one of the French winners of the IEA, Itron, a pioneering global technology company that makes monitoring devices for public utilities. The devices help to optimise the distribution of electricity, natural gas and water, thereby reducing waste and saving taxpayers’ money. The monitoring service was borne out of the willingness to use big data to help customers “identify and prioritise repair activity for the water treatment systems,” he says.

“We’ve seen some other plants as well do some very interesting things to try to come up with some really customised solutions - not trying to treat an average case, but really working with the outliers with big data.” Chick believes that in trying to develop some custom solutions, the result is providing value to customers in a clever way.” Many web services now offer Customer Data Integration (CDI) solutions that are linked to company data processors. But the key is managing the data. “It’s not a matter of working harder, it’s a matter of working differently and trying to accumulate these massive data to convert that into knowledge,” says Chick. “Piles of data don’t help you – it’s [rather] the knowledge that emerges.” Chick suggested management teams “reorganise data to make it more proactive.”
The BMW Leipzig Plant Case

This year’s European IEA winner, BMW Leipzig Plant, has placed the customer at the top of its priority list.

Its assembly plant was built in 2005 with a broad matrix of communications and robots, allowing BMW to customise features for multiple customer tastes during the entire manufacturing process.

BMW Leipzig Plant employs some 3500 workers, with a further 1200 at supplier companies on site. The plant produces the BMW 1-Series and the X1 and is itself a local sightseeing attraction.

According to plant manager, Milan Nedeljkovic, who accepted the top IEA award for BMW: “The factory was planned around the experience of the workers.”

BMW stresses flexibility and adaptability. “The plant must be flexible because customers and production processes constantly change,“ says Nedeljkovic. He speaks of the need to balance customer, strategy and employee participation. He also encourages management to get away from their desks, walk the shop floor and delegate responsibility. “Every associate knows best how the process should run, if he takes responsibility for his own workplace, and for his own area, that’s the best you can get.” BMW actively promotes inclusion with leaflets that state: “Be involved, not affected.”

Nedeljkovic is committed to efficiency and self-improvement. He earned a PhD in Engineering at Munich’s Technical University and rose through the ranks by boosting productivity at several BMW units, including the auto body works. Although he is relatively new to BMW Leipzig Plant, he has promised continuity. His predecessors introduced on-going improvement schemes, such as the Topic of the Week, a problem-solving effort by each department, and Poka Yoke, a lean-manufacturing process to eliminate mistakes, popularised by Toyota. Progress reports on the Topic of the Week are visible on large-screen monitors in each department and together with productivity data are accessible throughout the plant, giving management a big-picture of the overall manufacturing process. Nedeljkovic said the auto group is forever on the lookout for sustainable solutions to current problems.

Since 2009, managers at BMW Leipzig Plant have succeeded in reducing unit costs by 7 percent each year. “That’s much more than the cost increase in Europe,” Nedeljkovic insists. “And I think by keeping an eye on the processes, starting to optimise shop floor areas, and at the same time, keeping the overall costs under control, you can be very good and a very competitive producer in Europe.” BMW Leipzig Plant produces some 770 cars a day.

Sustainable Customer Satisfaction

BMW Leipzig Plant is on the outskirts of town at the crossroads of a major highway and rail lines. Four 140 metre-high wind turbines tower above the assembly halls, generating 10 megawatts of electricity, enough to fully produce the new BMW i3 and i8 electric urban vehicles. “It’s like free money, but it’s an opportunity we used since our plant is slightly out of the city,” says Nedeljkovic. The wind turbines are part of a far-reaching strategy to make BMW production more environmentally sustainable.

In bestowing BMW the top European Industrial Excellence Award, Professor Chick said the automaker displayed impressive lean management and continuous improvement. “They’re a very outstanding management - a huge organisation…. and still somehow are able to effectively translate the strategic vision to the front line very effectively. Bringing in new products in time while decreasing costs, and improving productivity.”

According to BMW: “The customer is the focus of everything we do and the measure of all of our activities.”

The annual IEA awards, now in their tenth year, are organised by INSEAD, WHU (Germany), IESE (Spain), and the University of Cambridge (UK), with support from media groups WirtschaftsWoche (Germany) and L’Usine Nouvelle (France). They recognise European excellence in management and the skill with which teams execute corporate strategies from top to bottom, through the entire supply chain to the final customer.

Stephen Chick is a Professor of Technology and Operations Management at INSEAD. He also directs the Middle East Health Leadership Programme and Innovators for Community Wellness, part of INSEAD’s portfolio of executive education programmes.

Follow us on twitter @INSEADKnowledge or Facebook https://www.facebook.com/Knowledge.insead.

Find article at https://knowledge.insead.edu/innovation/technology-manufacturing/customer-driven-innovation-2876
Download the Knowledge app for free

Visit INSEAD Knowledge
http://knowledge.insead.edu