

Go for PLM

Hans-Kurt Lübberstedt, Executive Vice President, Asia Pacific, UGS, spoke to P K Chatterjee, on how manufacturing companies can leverage PLM to become more innovative and competitive

How do you define the term 'Global Innovation Networks'?

The genesis of this term lies in the idea that 'extended enterprises' need to collaborate in order to innovate effectively. Extended enterprise embraces the multiple sites of a company that need to collaborate; the suppliers who provide the subsystems or parts for the company's products need to be included in innovations, and also customers because you need to leverage on customer experience to define the next generation of products. 'Innovation Network' would therefore include the whole company, the supplier base and partner base they work with, and the customers they cater to.



How exactly does Product Lifecycle Management influence the creation of Global Innovation Networks?

PLM can provide a platform to communicate effectively in a global sense, in terms of sharing ideas, product images, etc in a collaborative environment. For example, PLM solutions enable people to use 3D product information when they communicate with each another. The 3D models may have been created using different tools, but can be made visible and shared through the use of common standards. There are also several functions that you can perform with PLM. For example, if you have a 3D image of a new proposed product, you can present it to others, who can comment on what needs to be done further even though they are in completely far flung locations across the globe. This is how PLM facilitates 'Global Innovation Network' in a basic way. Increasingly,

the development and engineering of a product is done at one location, while the production and assembly manufacturing takes place at another place. For instance, a product may be developed in Europe, parts may be sourced from India and the complete product may be manufactured and assembled in China. The parties involved may need to talk to each other and PLM can help here. Designers may want to talk to production personnel so that they consider the manufacturing facilities and capabilities that production has. As the number of ideas to be considered increases, the same can be easily accommodated. There are tremendous savings on time as communication is instant and fast – you can exchange data in

real time. Again, a product consists of many parts. Product Data Management (PDM), which is a function provided by PLM, makes it simpler to navigate through your entire database of parts, find the ones that interest you, and mix and match.

How does PLM address the external variables (ex: raw material price fluctuation) that may lead to rise in cost of the product?

UGS' Team Center PLM solution has a 'Sourcing' module which allows customers to find suppliers, compare and optimise their offerings effectively, taking into account considerations like need, price, etc. Through this process, they can select the best suitable supplier for a particular need. Once established, the process can be extended or repeated as many times as needed. When the

conditions change, they can redo the process and find alternative suppliers.

In today's ever-changing business environment, how can PLM help in capturing best practices and lessons for re-use?

Through the implementation of technology, and exchange of knowledge between different customers, there is sharing of best practices. When customers buy pieces of our technology, they also take our help to implement the same into their processes. When we do that, we influence not only what the customer is using (i.e. the technology) but also how they are using it. Our implementation engineers and solution architects interact with different customers around the globe, and pick the best practices at one location. These can be used in similar situations around the world. In emerging markets, our customers not only want the technology but also the know-how to make effective use of that technology in the context of their own development. That's how best practices are re-used. At the same time, there is no breach of confidentiality in any manner because we have a very clear stand on not sharing any data of our customers with others. We only provide the enabling technology or 'software' with which our customers can develop a product and manage the data of that product. We have no access to that.

Do you customise your products as per the need of the customer?

When implementing the technology into a specific customer environment, we try to make sure that our customers use standardised models with minimum customisation. In the long run, customers can implement and benefit from the new versions quickly and efficiently. If you have a heavily customised solution, upgrading or adopting new technology becomes difficult. However, we do configure our solutions for customers. Our principal technology solution can be configured in different ways so that its final use matches the specific customer's needs without the burden of writing codes or adding extra elements. This is a more flexible, less expensive, and short approach that can accommodate the future versions in a better way.

What are the significant differences in business approaches you have encountered among the enterprises in the Asia Pacific region?

There is huge difference between the approaches of different cultures, and that is one of the elements that makes my job very interesting. In general, developing markets like China, India, and other South-East Asian countries have a different kind of need. They have a need for know-

how of processes. In more mature markets, processes have already been defined. Therefore, they want to know more about optimisation and refinement whereas in the emerging markets, customers are talking about developing from the scratch. People are very interested not only in getting the technology but also in getting know-how on how to do the things.

Also, in the emerging markets, there is a huge base of Small and Medium Businesses (SMBs). As they have only started growing recently, they have a need for simpler technology - more basic and price-effective. They are not looking for the level of sophistication that more mature environments need.

How is PLM changing the manufacturing environment in India and Asia?

Some of our larger customers in India have implemented complete PLM solutions. The value they get from it is the same as in the other parts of world. They become faster in what they do, which reduces their product development cycle. They are coming into the market with new models of their products quicker. The next benefit would be a higher degree of innovation than before. Our customers are able to incorporate new features and more elegant solutions faster than their competitors. Also, they can collaborate with their suppliers more effectively which helps in faster building of the new products.

We cannot say that it is up to us to boost the manufacturing sector in Asia. But we can certainly make sure that Asia Pacific's rapidly growing manufacturing sector gets the best possible technology and right approach through UGS. We have learnt from mistakes made during PLM installations in our more mature markets. Now we are using those experiences for the benefit of our customers in the emerging Asia Pacific markets. That's our biggest contribution.

Another aspect is collaboration. Our PLM technology makes it easy for our customers in Asia Pacific to collaborate with their suppliers and customers around the globe. That's a huge competitive advantage.

What is your message to the Indian companies?

My message is very clear – Go for PLM. Use this technology right from start. Do not develop a manual process first and then convert it to digital. Rather, go digital at the start. At the same time, PLM is not something for large companies only. There are many PLM components, which are built and structured for SMEs. UGS offers 'VELOCITY' series for small businesses. It is a complete PLM solution, but simpler and easier to use and at a lower cost it is easy for the smaller companies to buy into. 