Transforming the European Medical Device Supply Chain

Intensifying cost and service pressures are forcing medical device manufacturers to re-think their European distribution strategies

"The medical [device] sector is weathering a perfect storm, caused by three concurrent trends: the move toward value-based healthcare, extreme cost/margin pressures and increasing regulatory/compliance requirements." That is how consulting firm EY (formerly Ernst & Young) recently characterized the current state of the medical device industry worldwide.

"These dynamics are forcing manufacturers to re-evaluate their operations and supply chain strategies," noted Vinay Asgekar, Senior Director, S&OP and Supply Chain Performance for Edwards Lifesciences, at a recent medical device sector conference. "In particular, the industry must become far more efficient and that requires transformational strategies for managing the supply chain as a whole."

In Europe, achieving such transformation is no easy task for one key reason: the region is not a one-size-fits-all market. With aggregate sales exceeding €100 billion, the European medical device business clearly breaks down into two distinct markets: mature (Western Europe) and emerging (Eastern Europe). Growth in the mature region is relatively flat at about 4 percent. Growth in the emerging Eastern European markets, on the other hand, is expected to be among highest in the world through 2016 – at nearly 11 percent.

While disease patterns in the emerging Eastern European markets are starting to match those in the mature Western Europe, product preferences, payer mechanisms, regulations and distribution channels vary widely by country. “There are significant differences in how products are secured and distributed, as well as the nature of stakeholders involved in the sales and distribution process,” notes Luiz Moreira, Vice President, Global Products and Accounts Leader at DHL Supply Chain. “These practices vary country by country, making Europe a very complex market to serve.

Across the board, though, one mandate is clear: device manufacturers must meet the rapidly escalating pressure and, indeed, demand from payers and providers to cut costs.

Intensifying cost pressures

Historically, profit margins in the global medical device industry were very healthy – as high as 20 to 40 percent, according to a study by consulting firm Deloitte. That’s no longer the case, as governments across Europe are forcing cost cutting and other austerity measures in an effort to rein in escalating healthcare expenditures.

“The downward pricing pressure from all payers – government, insurers, healthcare providers and patients – is causing price erosion and commoditization across a broad range of medical products,” observes Moreira. Government pressure is particularly strong, as many European countries provide national health plans to their citizens as part of social welfare benefits.

Low-value disposables such as basic surgical supplies are most affected by this trend because they are viewed as commodities. However, high-value devices such cardiology devices and implants also are experiencing growing cost pressures, as government are moving increasingly to performance and value assessments for these products. Moreover, because of the new financial constraints, the institutions that pay for medical devices are not purchasing the new innovative/upgraded devices unless their value to patient health outcomes significantly outweighs the cost.

The message here is that with reduced payer support, decreasing product values and increasing economic cutbacks, medical device manufacturers must streamline their operations. No matter where in the world these operations are located, the best areas to achieve efficiencies are in the supply chain. For this reason, leading companies are exploring several options in this regard, including segmenting the supply chain, going direct and sharing distribution capacity.

The segmentation strategy

Because of the different product and payer profiles across Europe (e.g. premium product with high value/margin; private payer model versus national health payer), manufacturers are

working to better align their supply chain cost structures with the margin characteristics of these different profiles.
To do this, device-makers are turning to supply chain segmentation strategies as a means of restructuring their networks, processes and operations. For example, they are tailoring transportation and warehousing options in each country to match the type and category of medical device. Such segmentation may call for low-value, high-volume consumer medical devices to be transported by slower ocean and long-haul road freight, and distributed via regional distribution centers located closer to the point of consumption.

On the other hand, products such as specialty and high-value devices, could be shipped using premium, faster transportation modes, and might be distributed from a single global distribution hub directly to the hospital or ward. This option could include an end-of-runway approach, where critical parts or products are located at a central air hub at a major European airport, ready to move on the next flight to meet urgent patient needs. Or, it could incorporate forward stock locations, which are small shared-user warehouses located close to the usage point, to ensure rapid response to hospitals. Both of these methods significantly reduce the amount of inventory in the system, while at the same time assuring responsiveness.

Going direct
In certain areas of developing Eastern Europe, some manufacturers are beginning to look at serving customers directly. This approach provides an alternative to the traditional distributor-intermediary model.

Under this strategy, the hospitals and device manufacturers establish a direct relationship that facilitates the sharing of product knowledge, actual demand data, as well as customer feedback about the product. It also improves the security of the supply chain by removing intermediate handling layers.

By contrast, in a distributor or agent setup, the manufacturer has no direct connection with the end customer. As a result, it loses visibility and control over the product once it leaves the manufacturing plant; thereby making a third-party role necessary in the markets (i.e., U.S.). Costs in the distributor model are higher because they are based on a service fee rated as a percentage of product value – as opposed to the true activity-based cost of distribution to the customer.

Shared services
Another opportunity for manufacturers to reduce costs and streamline their supply comes through leveraging a shared services distribution model. Medical device manufacturers typically sell to the same community of customers – e.g. hospitals, clinics and physicians' offices. But they do so via independent, parallel supply chains. This duplication and redundancy carries a high cost for manufacturers and their receiving customers – one that the environment of fiscal austerity increasingly will not support.

By contrast, outsourcing the logistics operations to a third party logistics provider (3PL) in a shared services model spreads the cost of the supply chain across multiple manufacturers. Optimizing this shared supply chain further reduces costs. The different areas of saving potential can range as high as 20 percent, depending on the solution. By becoming the supply chain orchestrator, and managing the country-specific distribution operation end-to-end, the 3PL provides visibility into, and control of, product - coordinating deliveries, tracking those deliveries, and managing other logistics service providers and distributors – all to ensure timely, accurate and cost-effective distribution to the end customer.

Clearly, the time is right to re-think the European medical device operating model in general and the supply chain in particular. Leading manufacturers are doing just that. They are working with their business partners – customers and logistics service providers - to effect these changes.

For a more in-depth discussion of the European medical device market and the supply chain transformation underway, read **"Transforming the European Medical Device Supply Chain: Adding Value and Reducing Costs"**, click here.