Maximize, Optimize, and Minimize (MOM) – The framework for a better customer annuity supply chain



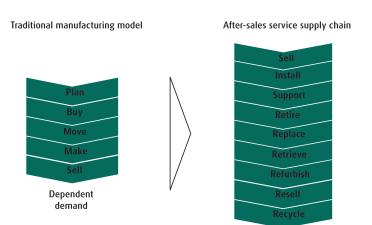
UPS Supply Chain Solutions[™]

Our Insight. A UPS Supply Chain Solutions White Paper

Copyright © 2005 United Parcel Service of America, Inc. All Rights Reserved. No part of this publication may be reproduced without the prior written permission of UPS Supply Chain Solutions. In the competitive high-tech marketplace, companies are continuously innovating to gain competitive advantage over their rivals. Most recently, high-tech organizations are looking to edge out the competition in the area of service. As a result, the quality and delivery of customer annuity programs are becoming increasingly critical, while at the same time businesses do everything they can to be more cost-effective and profitable.¹ Research has indicated that the customer annuity supply chain generates 40 to 50 percent of profits and nearly 25 percent of annual revenues for many high-tech organizations.²

The challenge with the customer annuity supply chain is its unique characteristics not found in the traditional supply chain, such as reverse logistics, risks associated with asset recovery and disposal, and critical inventory location decisions tied to Service-Level-Agreements (SLA) (see Figure 1). Many high-tech companies have begun to address some of the common customer annuity supply chain issues including inventory levels and replacement strategies, network redesign and field service optimization. The results have been somewhat mixed. To capitalize on the opportunities within the customer annuity supply chain, companies require an approach that considers the challenges associated with this supply chain, and also one that balances service, risk, efficiency and profitability.

Figure 1: UPS's view of the customer annuity supply chain



UPS Supply Chain Solutions consulting services has developed a framework specifically for high tech companies referred to as MOM, an acronym for Maximize, Optimize, and Minimize. Figure 2 illustrates how to prioritize the customer annuity supply chain activities across the MOM framework, although there can be some overlap.

¹ "Cornerstones of Post-sales Service Excellence," UPS-Supply Chain Solutions, 2003 ² AMR Research

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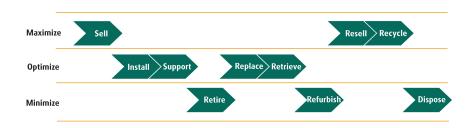


Figure 2: MOM applied to the customer annuity supply chain

Maximize: Increasing revenue through the resale of parts/products can be equally as important as maintaining a new product revenue stream.

Maximizing aftermarket sales includes order management capabilities and integration, customer collaboration, customer segmentation as well as the execution of service. Maximizing sales also requires a deeper level of cross-functional cooperation between the various parts of the business. Sales and marketing must be in-sync with operations and distribution. Procurement must be aware of demand and how well products are selling to ensure that the supply chain has adequate flow of replacement parts for aftermarket sales. Integrating order management and visibility throughout your customer annuity supply chain, increasing customer collaboration, and focusing on well-executed service level agreements can significantly impact aftermarket sales.

Maximizing sales of refurbished parts ensures that organizations capitalize on deploying existing assets rather than new assets when and where it is appropriate. All too often assets that could be refurbished are discarded and new assets are deployed. At the same time, organizations need to carefully balance product lifecycles and redeployment to minimize cannibalization of new innovations.

Maximizing recycling efforts can also add to an organization's bottom line. Ultimately, companies will be held responsible for the disposal of their products. When possible, the ideal solution is to design environmentally friendly products. However, if environmental design is not practical, a robust retrieval and recycle program may be the solution. What can be recycled from recovered assets may add to revenues. In addition, favorable public relations can result from being environmentally conscious and companies can reduce the risks of future environmental liabilities.

Sales and marketing must be in-sync with operations and distribution.

The MOM framework minimizes the amount of product that is retired by building quality into the production process... **Optimize:** Customer annuity programs must be designed around product lifecycles and operational efficiency.

Optimization of the activities associated with servicing and repairing high tech products not only has a dramatic effect on the overall service an organization provides, but also on the cost of the customer annuity program. Optimization focuses heavily on infrastructure and includes much more than facilities and information technology. It also refers to inventory deployment, the degree to which suppliers are leveraged, and other related customer annuity processes. Infrastructure to support the ever-challenging customer requirements can be a huge drain on a company's capital. Businesses need to fully optimize their infrastructure or consider possible outsourcing alternatives.

Optimizing support can be achieved through service level agreements (SLAs) as well as field service operations. However, businesses must be able to deliver on these agreements and meet customer requirements. Supply chain operations including inventory levels, field stocking locations and field service procedures need to be efficient to meet these requirements.

Minimize: Reduce risks around the disposal of assets and minimize the risks of losing annuity customers.

The MOM framework minimizes the amount of product that is retired by building quality into the production process and minimizes excess inventory in the system. Product must be thoughtfully retired to maximize salvage value and spare parts that can generate revenue.

There is some risk associated with the refurbishment of products. Refurbished products can cut into the sales of newer models. Customers may delay upgrading to a company's newer models if they are getting too much value in refurbished goods. Companies must carefully balance the refurbishment effort against product lifecycles and new product rollouts.

Risk must be minimized across all areas of the customer annuity supply chain not only in retirement and re-furbishment. Risks can be found in many forms including susceptibility to business disruptions, SLAs and their financial impact, as well as environmental issues and the disposal of assets.

The three step approach

By leveraging the three step approach outlined in the reminder of this White Paper (see Figure 3), the benefits of a customer annuity program – maximize risk, optimize operations, and maximize profitability – may be realized more rapidly.

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Step one - Rapid assessment: To improve a customer annuity program a company must first understand the condition of its existing operation. This is critical to the creation of a comprehensive solution, and requires that within two weeks the members of the consulting team engage in a rapid assessment analysis for the client. Using their findings as a baseline, the team then leverages the MOM framework to determine how the client's customer annuity program compares to industry leaders and other best-in-class programs. To transform a customer annuity program, the consultants evaluate and prioritize a portfolio of potential initiatives including a high-level implementation plan in tandem with a quantifiable business case.

Results:

Figure 3

- Key observations and MOM scorecard
- Customer annuity benchmarking
- · Portfolio of quantified customer annuity opportunities
- High-level implementation plan

Step two - Design: By leveraging the Rapid Assessment results the consultants can quickly mobilize and work with a client to redesign high-priority customer annuity opportunities. Critical to the design process is the development of "To-Be" process blueprints, design of customer annuity performance metrics, and good definition of infrastructure requirements including technology and/or third party partners. A leading differentiator for UPS Supply Chain Solutions is their ability to reach into the UPS enterprise for best practices and performance benchmarking to quickly assess solution costs.

Results:

- Documented blueprint of "to-be" processes
- Required technology support "enablers"
- Alignment of potential customer annuity partners (third parties, etc.)
- Detailed implementation plan with key milestones
- Customer annuity performance metrics to measure programs' success

Step three - Implement: Successful execution of a customer annuity program requires precise process implementation and management of infrastructure changes as well as key stakeholder buy-in and communication. In addition to implementing process change, the consultants provide overall program management that includes change and partner integration management as well as technology enablers. During implementation, and in order to measure the program's rollout and operational success, the consultants deploy defined performance metrics. When appropriate, the intellectual capital and resources of UPS and UPS Supply Chain Solutions can be leveraged to operationalize all or part of a customer annuity solution which could improve and accelerate the rapid benefit realization for the client.

Results:

- Process and partner implementation
- Metrics deployment
- Program management including change management, project management and technology enabler management

Conclusion

The after-sales-service market represents an enormous opportunity for companies, and particularly high-tech manufacturers, to capture lost profits and create an annuity stream of revenue from customers. The obstacles to overcome are not insignificant and they require change management, a complete understanding of the supply chain, and a framework to follow for execution. The MOM framework and approach address the unique challenges high-tech companies face when developing best-in-class customer annuity programs.

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To learn more about how our experience in supply chains and consulting can help your business, please contact us:

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About UPS Supply Chain Solutions

By aligning a client's business strategies with its operating processes, UPS Supply Chain Solutions can create high-performance supply chains that from inception to implementation generate real, hard-number values and quick benefit realization. This distinguishing capability, our experience in solving real-world challenges, and the resources of UPS enable us to set strategies, design and build solutions as well as implement, operate, manage and synchronize your world of commerce.