THE CUSTOMER VALUE PROPOSITION SHOULD DRIVE SUPPLY CHAIN DESIGN:
AN EXAMPLE IN MASS RETAILING

A successful company typically starts with a deep understanding of customer needs in a segment and translates these needs into a value proposition. Then it develops its supply chain capability to deliver on its value proposition. Many companies have a clear and compelling customer value proposition but fail to reap the benefits because their supply chain capabilities are inadequate and their supply chains are not correctly linked to their customer value proposition. In this article, we will use examples in mass retailing to illustrate the link between value propositions and supply chains. Fundamentally there are two value propositions: price-based and value-based. There are two supply chains: flow-based and batch-based. We argue that aligning the customer value proposition with the supply chain model is critical to a company’s competitiveness.

Five key dimensions in mass retailing

In the retail business, a customer wants the right product, at the right time, in the right place, and at the lowest possible price. To translate these needs into supply chain capabilities, mass retailers should consider the product variety, the product assortment, the type of brand (manufacturer vs. private label), availability levels, and the cost of goods sold. From a supply chain perspective, various combinations of these five factors can describe the value propositions of different retailers.

The best indicators of variety are the number of product categories and the number of stock-keeping units (SKUs). Wal-Mart and Tesco, for example, offer a wide range of product categories – from food and clothing to garden equipment and home electronics – with the value proposition promising a one-stop shopping experience. In contrast, Trader Joe’s, a US-based chain of specialty grocery stores owned by German retailer Aldi Nord, mainly offers a limited range of food items – some of which a consumer may not find in regular grocery stores. Retailers also need to decide how many brands or sizes to offer within a specific product category or subcategory. Compared to Wal-Mart, Aldi and Lidl offer very limited product choices within a category. Generally, for a given volume, increasing variety creates a more complex and expensive supply chain.

In terms of product assortment, there are fixed and variable assortment retailers. The vast majority of items sold by fixed assortment retailers are constant – customers expect to find them every time they shop – while a relatively small percentage of items are short-lived SKUs such as seasonal clothing or one-time bundles. These retailers provide
standard products in standard sizes, and the store layout is such that customers know where to find the products. Variable assortment retailers, by contrast, offer some standard products, but a much higher proportion of the offering is variable and changing. Even if the category is constant, the SKUs within the product category may change. Wal-Mart is an example of a fixed assortment retailer, Costco of a variable assortment retailer. Fixed assortment supply chains are generally more expensive than their variable assortment counterparts, mainly because they have to cope with demand uncertainty. When a variable assortment chain is out of an item, it replaces the item with another SKU, which means it can hold less stock.

A closely related set of issues revolves around manufacturer brands versus retailers’ own brands. The 7-Eleven chain sells a high proportion of manufacturer brands, while Aldi sells primarily private labels. Wal-Mart and Tesco have traditionally been retailers with strong manufacturer brands, although recently they have moved more toward their own brands. Private labels mean retailers do not need to pay a manufacturer brand premium and have more flexibility to source at the lowest cost, perhaps by taking up a supplier’s spare capacity.

In terms of availability, high availability means that all the items are almost always in stock; there are very few stockouts. Overall Wal-Mart has very high product availability, while Trader Joe’s has relatively low product availability. High availability costs the retailer significantly more because more inventory is required to prevent stockouts.

The cost of goods sold includes the cost of the items themselves plus other supply chain costs, such as inventory, warehousing, logistics and the like. Naturally the effectiveness of sourcing impacts the cost of individual items.

These five dimensions are not independent of one another. The choice a retailer makes in one implicitly determines or limits the choices it can make in another. Thus, without increasing costs, if the retailer chooses a variable assortment strategy, availability for a specific SKU will be compromised. The availability of a bundle of eight Colgate jumbo sized tubes of toothpaste for $8 offered in Costco cannot be guaranteed everyday, whereas customers can always find a single tube of Colgate regular sized toothpaste at the lowest price in any US Wal-Mart store. The most important implication is that a company’s customer value proposition should determine its supply chain choices.

Value-based and price-based customer value propositions

If we focus on mass retailing, essentially there are two fundamental customer value propositions. One offers the lowest possible price with an efficient shopping format; the other offers the highest possible value with shopping excitement.

Everyday low price, always

The well-known value proposition of Wal-Mart – not only the world’s largest retailer but also the world’s largest company – is “everyday low prices.” Behind this value proposition is also an implicit promise of high product variety (35,000 SKUs in a typical store; 100,000 in a superstore), fixed assortment, a mix of branded and private labels, and the lowest possible cost of goods sold with extremely high availability. In other words, customers know that whatever and whenever they buy, it is at a favorable price. Shopping is predictable and efficient; customers can buy at any time and the price will stay reasonably constant. They can expect to satisfy almost all their basic needs from food to clothing to home furnishings at one store. Moreover, all the items are almost always in stock. Once or twice a year, Wal-Mart brings one-time special deals to the market, which are communicated to customers as such, and there is no rain check for them.

The move toward more private label brands at Wal-Mart is consistent with the company’s evolving value proposition. In the early days, it was everyday low prices on manufacturer brands that brought people into the stores. But now, the Wal-Mart brand itself is more powerful,
with great drawing power – to get people into the stores. And – once there – they are finding Wal-Mart products next to brand name products, where the only difference seems to be the price. This allows Wal-Mart to sell its own brands at higher margins than manufacturer brands.

To support the value proposition of low price/guaranteed availability of regular items, Wal-Mart uses a very efficient supply chain. Its approach to suppliers is generally one of hard-nosed negotiation, where prices are continually squeezed, the suppliers are held to ever-tighter measures of delivery performance, and supply chains are optimized using highly detailed real-time information and the latest technology. To a large extent, the innovations are focused on “doing the same things better,” in that the emphasis is on optimization and cost reduction in the supply chain.

**We shop the world for you**

Trader Joe’s has locations in most of the larger population states in the US. Behind its slogan “We shop the world for you” is the implicit promise of relatively few product categories, a variable assortment, a high proportion of private labels, and the best value with relatively low SKU availability. Both Costco and Trader Joe’s add to the shopping experience by giving the customer a sense of finding something unexpected at excellent prices. For example, the wine “Two-Buck Chuck” sold by Trader Joe’s tends to be fairly good wine, of which the manufacturer has an excess supply, but does not wish to reduce the perception of the brand by flooding the market with it. A key element of the value proposition is “treasure hunting.” Customers are never quite sure what variable assortment items will be available. Further, the “treasures” are in limited supply – if a customer sees something she wants, she must buy it now.

This value proposition appeals to some customer segments that are different from those served by Wal-Mart. For example, the family income of Costco shoppers is more than double that of Wal-Mart’s. Customers at Trader Joe’s can be characterized as having a spirit of adventure and being inclined to try new products. The store’s loyalists include an eclectic assortment of foodies, college students, sugar fiends and health nuts.

Another fundamental difference between price-based and value-based retailers is that much of what is purchased is discretionary in the value-based segment. The customer rarely needs these items immediately – larger quantities are often purchased (e.g. eight tubes of toothpaste not one). A related issue is the share of disposable income, or the extent to which these retailers keep customers from buying elsewhere. When someone buys eight tubes of toothpaste, it will be a long time before more is purchased – anywhere. Similarly, if someone buys Alaska king crab legs at Costco, there will be one less trip to the local fish market, but the customer might be more likely to return to Costco in the near future to see if the same, or a similar, deal is available.

To support a value proposition of exciting shopping value, the procurement organization for variable assortment retailing needs to find and deliver the “treasures.” To support a value proposition of exciting shopping value, the procurement organization for variable assortment retailing needs to find and deliver the “treasures.” Trader Joe’s aims to carry only products that it can buy and sell at an outstanding price, even if it means that the items change from week to week. This means the company must interact with a larger set of suppliers, sometimes even for a one-off deal. The quantity is also different each time. Rather than making routine purchases over some time to replenish stock, the retailer often buys all that the supplier has for sale – in one batch. In turn, this merchandise is put into the stores for as long as it takes to sell it.

Varied assortment retailers like Costco, Aldi and Trader Joe’s do also sell standard items such as bread and milk, which require supply chain processes similar to those used by fixed assortment companies such as Wal-Mart. One of the major differences might be a willingness to tolerate somewhat higher probabilities of stockout. After all, customers do not expect to find every item every time. The interaction with a supplier like Colgate might be fairly standard for some special package (e.g. eight tubes of toothpaste), but the interaction might also
include opportunistic buying: What do you have that you would like to sell at a good deal (we will buy it all)?

Store replenishment at Trader Joe’s is quite different than at Wal-Mart. For variable SKUs, there is little “reordering,” since items change all the time. At the store level, Wal-Mart is executing its plan as efficiently as possible, while Trader Joe’s is responding to discovered opportunities in the most attractive way.

Different customer value propositions require different supply chains

There are two fundamental approaches to supply chain design: flow-oriented or batch oriented, although in practice there is not a clear demarcation and most firms will have a combination of the two.

The classic, or flow-oriented, supply chain such as that at Wal-Mart is set up on the premise of a relatively fixed series of recurring transactions, shipments, payments, and other conditions. It is typically evaluated with standard metrics such as OTIFNE (on time, in full, no errors), inventory turns (for both the customer and the supplier), speed, quality issues, and responsiveness to unusual situations, e.g. promotions.

As already noted, the flow-oriented supply chain tends to strain factory capacities, largely because it needs to ensure variety and availability. Many of the costs are hidden, imbedded in the operating structures of the suppliers, but they are real.

The batch-oriented supply chain is most appropriate for situations where the source of supply changes rapidly – with no predictable timing – because the retailer is pursuing good deals and providing a variable assortment. For such retailers, like Costco and Trader Joe’s, each good deal needs to be individually priced, contracted, and its logistics details determined. Instead of a continuing series of shipments, there is one batch, which either needs to be delivered to the retailer’s distribution center or else distributed directly from the supplier to the individual retail outlets.

Compared with the flow-oriented supply chain, there is no expectation of long-run retail support (or end customer provision) of this item. Instead the focus will be on the overall contribution of this SKU, the cash-to-cash cycle, and the extent to which this “deal” builds store traffic. In terms of procurement, there will be a greater need for prospecting to find the “treasures.” In a batch-oriented supply chain the price of the goods is the focus, with less attention on SKU availability. The variable assortment retailers in essence provide a risk service to the suppliers, allowing them to sell rather than scrap excess capacity and excess inventory.

As we have seen, the supply chain requirements to support the price-based value proposition (flow-oriented) are very different from those for the value-based proposition (batch-oriented). To attract customers, mass retailers have to be clear about their value propositions. To deliver what they promise, they must align their supply chains accordingly – something that the stores discussed here have done very effectively.

1 In memory of our colleague Tom Vollmann.