

# Business Case for Demand Planning

Gartner RAS Core Research Note G00211630, Mike Griswold, Kevin Sternecker, 18 March 2011, R3604 03312012

Understanding and responding to the demand signal is at the heart of demand-driven retailing (DDR), yet many organizations struggle with multiple, disconnected forecasting processes. With the ability to improve customer satisfaction, increase inventory productivity and enhance collaboration with trading partners, demand-forecasting initiatives should be a top priority. Here, we provide insights into the benefits, help you quantify the value and provide a case study that highlights the business advantages of demand forecasting.

## Key Findings

- According to a recent Gartner and RIS News survey, only 20% of Tier 1 respondents have up-to-date, demand-planning capabilities.
- For many retailers, demand-forecasting initiatives will begin with significant data collection, cleansing and coordination efforts.
- When done well, demand-forecasting initiatives can increase on-shelf availability by 20% to 30%, improve inventory productivity by 3% to 5%, reduce obsolete inventory by 10% to 15%, and increase revenue and gross margin by 1% to 3%.

## Recommendations

- Tackle the forecasting process and ownership questions first before making technology decisions.
- Capture benchmarks by category for forecast accuracy, on-shelf availability, inventory levels and obsolete inventory at distribution centers (DCs) and stores.
- Conduct “as-is” analysis to determine how many demand-forecasting processes exist within your organization (hint: if you find only one, you’re probably not looking hard enough).
- To drive supply chain excellence, forecasts must be meaningful in representing true channel demand. They must be accurate, timely, reliable and actionable to different stakeholders.

## ANALYSIS

Changing shopper preferences and yearly double-digit, e-commerce growth make demand planning more difficult than ever before. Additionally, several factors compound the forecasting challenge for many retailers:

- With merchants using optimization to drive assortment, price and space decisions, often with multiple forecasting engines that source data differently, the combined effects of these strategies are impossible to determine.
- Typically, there is no clear owner of the forecasting process. Instead, there are multiple owners of multiple forecasts, leading to confusion about the number against which to execute.
- Incomplete, immature and competing pockets of data diminish forecasting effectiveness.

Over the past 12 months, technology providers have made significant progress in delivering scalable and user-friendly demand-forecasting solutions for retailers. Gartner's interviews with retailers and technology providers reveal five common types of forecasting requirements (see Figure 1). Unfortunately, most organizations treat each type separately, and they often have different software engines predicting demand. There's no single point where all the forecasts come together in a comprehensive view.

## A Unified Forecast Enables Key Merchandising Activities and Helps Build the Business Case for Demand Forecasting

The typical retail supply chain responds fairly well to predictable demand patterns. With a stable set of data that includes seasonality and trending, base demand levels can be predicted fairly accurately, and replenishment transactions can occur in a predictable and cost-effective manner. With promotional activity and complexity on the rise, the demand signal for many retailers is anything but stable. Add to this a growing abundance of merchandising optimization capabilities, each with its own "forecast," and the retailers' ability to calculate and respond to the demand signal accurately at the shelf is only further complicated.

Reinforcing the point on merchandise optimization, "The State of Retail Merchandise Optimization for Assortment, Space and Life Cycle Price" noted that organizations seeking to become more demand-driven are investing in software that provides optimization capabilities in key merchandising areas, such as assortment management, space allocation and price determination. Although these factors lead to decisions on consumer presentation (that is, merchandise display and pricing), they are largely determined independent of each other and, in many cases, are different by teams within a retail merchandising organization. What's missing is a rationalization process that synchronizes and coordinates these independent decisions.

Figure 1. Forecast Types and Maturity

Forecast Type	Retail Maturity	Technology Maturity
<b>Base (nonpromoted), including seasonality, trend, etc.</b>	3 to 4	3 to 4
<b>Promotional (including markdown)</b>	1 to 2	4
<b>Short-life product (two weeks to 120 days)</b>	1 to 2	2 to 3
<b>New product launch</b>	1	2 to 3
<b>Life cycle forecasting, with emphasis on end of life</b>	1 to 2	1 to 2

1 = Least mature  
4 = Most mature

Source: Gartner (March 2011)

Given these conditions, most retailers lack a demand-sensing solution that can provide a reasonable expectation of future demand, given the multiple merchandising decisions. For example, when a merchandising team creates a compelling assortment at an attractive price point, we can expect the demand for that product to increase based on the cumulative effects of these merchandising decisions. Unfortunately, many organizations lack a coordinated technology that can understand the resulting change in demand.

Achieving demand-driven maturity requires a new approach to consumer demand forecasting. This approach senses the expected demand of each discrete decision, understands the distinction between sales channels, anticipates the impact of the decisions and creates a unified or single view of the demand. For example, when demand for a given item/location is expected to increase by 5% due to a customized assortment, decrease by 2% due to a decrease in selling space and increase by 1% due to price decisions, a sophisticated demand-modeling engine calculates the total forecast demand. Today, retailers artificially influence the forecasts by adding a lift/decline factor to the forecasting engine for the most significant items (a limited subset) in their assortments.

It's the migration to this single, or unified, perspective on demand that will move retailers from a Stage 2 (anticipating) to a Stage 3 (collaborating) level of demand-driven retail maturity (for more on demand forecasting maturity, see "Demand Forecasting: Getting to a Single View of Customer Demand"). Many technology providers

we speak with are already working to unite the various forecasting tools they've built or acquired over the years into a single view of demand. In the meantime, retailers should focus on organizing and cleaning up their data, determining a single owner for the demand-planning process, and identifying the key metrics they'll use to gauge demand-planning accuracy.

### Improved Demand-Forecasting Processes Deliver Significant Business Benefits

Even with signs of economic recovery, the criteria for evaluating initiatives remain unchanged. Projects still must pass three checkpoints:

- Business benefits can be tied directly to the financial statements (for example, income statements, balance sheets and cash-flow statements).
- Benefit streams begin within nine to 12 months.
- A change management program is included that can be embraced by the business.

Although the evaluation criteria remain consistent across retail segments, our research tells us that different segments see different primary and secondary benefit areas (see Figure 2).

Figure 2. Demand-Forecasting Benefit Areas

Value Driver	Fast-Moving Consumer Goods	Specialty	Mass Merchandise	Department Store
On-shelf availability	P	—	P	—
Inventory	P	—	P	—
Obsolete inventory (shrink)	—	P	—	P
Sales	S	S	S	S
Gross margin	—	P	—	P
Productivity	—	P	P	P

P = Primary benefit area  
S = Secondary benefit area

Source: Gartner (March 2011)

To help quantify the business impact of demand forecasting, we spoke with 15 organizations (i.e., retailers and technology providers) with above-average experience in demand forecasting to gather insights into the range of potential benefits. The potential results in Figure 3 are most applicable to organizations just beginning or relatively new to demand forecasting.

Finally, to provide a more personalized example of how to craft the business case for demand forecasting, we've summarized a recent initiative at a leading "bricks-and-clicks" beer, wine, spirits and accessories retailer.

### JustEnough Provides BevMo Demand-Forecasting Capabilities

When Beverages & More (BevMo) first opened a handful of stores in 1994, basic forecasting and replenishment capabilities served the company's needs. These stores, which are typically 10,000 square feet in well-trafficked retail areas in major metropolitan markets throughout California and Arizona, provide competitively priced alcoholic and nonalcoholic beverages that complement products such as specialty foods and snacks, cigars, glassware, and related bar and wine accessories. Through BevMo.com, a leading bricks-and-clicks beverage lifestyle website, customers can purchase items for home or office delivery, or for pick up within an hour from their local store.

With 110 stores and millions of loyalty customers, these early capabilities no longer supported the company's maturing business. Operating in a traditional three-tier distribution model consisting of suppliers, distributors and retailers, BevMo needed to enhance its current forecasting and replenishment processes. BevMo's growth, while exciting, also identified several challenges with current processes:

- Forecasting at an item/location was not a core competency.
- The process to review forecasting exceptions was time-consuming and inefficient.
- Suggested reorders weren't considered dependable and therefore not accepted.
- The reorder algorithm wasn't well understood and didn't accommodate the nuances between fast- and slow-moving items.
- The special order process tended to be unplanned and inefficient, consuming an inordinate amount of the allocation specialists' time.

Recognizing the need to improve inventory utilization, support growth and expected sales increases, and balance the workload at the store level, BevMo turned to JustEnough for help. Several other factors influenced BevMo's decision to partner with JustEnough:

- JustEnough provides an easy-to-use, Excel-like user interface.
- It provided the detail level needed to run the business, but not overwhelm the user at the same time.
- The JustEnough application supported existing business processes and required minimal customization.

Figure 3. Demand-Forecasting Benefit Examples

Value Driver	Potential Results
<b>On-shelf availability</b>	20% to 30% reduction in out-of-stocks
<b>Inventory</b>	15% to 30% reduction in inventory across store and distribution center
<b>Obsolete inventory (shrink)</b>	10% to 15% reduction in obsolete inventory (fewer markdowns)
<b>Sales</b>	1% to 2% increase due to improved availability
<b>Gross margin</b>	3% to 5% improvement due to improved availability and more full-price sales
<b>Productivity</b>	5% to 10% improvement, able to forecast with greater detail and scrutiny, with equal to fewer full-time employees

Source: Gartner (March 2011)

- It could support BevMo's aggressive implementation timeline: The project began in July 2009, with the application up and running by November 2009. All in-scope categories were up by January 2010.

JustEnough's Demand Management solutions help retailers, distributors and brand owners shape and forecast customer demand, plan assortments, allocations and inventory. They also help execute on those plans. In addition to BevMo, JustEnough's customers include Kenneth Cole (Allocation and Replenishment of inventory), Levi Strauss (Merchandise & Assortment Planning), Kraft Foods (Sales Forecasting), and IDS Group (Li & Fung) and Nissan (Inventory Planning). Finally, JustEnough's capabilities can be deployed via cloud, on-site or mobile platforms.

Using JustEnough, BevMo centrally manages forecasting and replenishment activities for all commodities, with the exception of beer. JustEnough creates forecasts and recommends orders reviewed by allocation specialists. Although recommended orders are reviewed today, BevMo expects these orders to require less review and become more "hands free" over time.

Fully operational since January 2010, BevMo has realized benefits in the following areas:

- JustEnough provides the ability for the existing team of allocation specialists to do more at a greater level of detail.
- There was support for the migration from a commodity approach to planning, to a more customer-focused, district approach.
- There's 30% less time spent on replenishment.
- There's availability of more efficient and relevant information, such as site-specific forecasts and inventory requirements, to support new stores.

Tom Cruise's 1996 movie Jerry Maguire inserted into our day-to-day lexicon, "Show me the money!" – a phrase clearly embraced by most CFOs. Improving your demand-planning processes can show your organization the money by delivering significant business benefits: 15% to 30% inventory reductions, 1% to 3% revenue increases, 20% to 30% improvements in on-shelf availability and 10% to 15% reductions in obsolete inventory. This will certainly be music to your CFO's ears.