Chapter 3

Capturing Marketing Insights and Forecasting Demand

In this chapter, we will address the following questions:

- 1. What are the components of a modern marketing information system? (Page 35)
- 2. How can companies collect marketing intelligence? (Page 36)
- **3.** What constitutes good marketing research? (Page 37)
- 4. How can companies accurately measure and forecast market demand? (Page 42)
- 5. What are some influential developments in the macroenvironment? (Page 45)

Marketing Management at Campbell Soup Company

The Campbell Soup Company's iconic red-and-white soup can represents one of the most famous U.S. brands. Recently, though, overall consumption of canned soup has declined 13 percent, and the firm's market share has dropped from 67 percent to 53 percent. To help stop the sales slide, Campbell's set out to better understand the habits and tastes of 18- to 34-year-olds. Executives visited "hipster market hubs" to observe Millennials during "live-alongs," where they shopped and ate at home with young consumers, and "eat-alongs," where they dined with them in restaurants. The key insight: Millennials love spices and eat more exotic food than their parents—they just can't cook it at home! The solution: a new line of Campbell's Go! Soup—ready-to-eat, boldly-flavored meals sold in pouches (and at a price more than three times the basic red-and-white line). Since the target market is tech-savvy, the product line was promoted entirely online on music and humor sites, gaming platforms, and social media. \(^1\)

Virtually every industry has been touched by dramatic shifts in the economic, sociocultural, natural, technological, demographic, and political-legal environments. In this chapter, we

consider how Campbell's and other firms can collect and store information, conduct marketing research, develop good forecasts to support marketing management, and analyze trends in the macroenvironment.

The Marketing Information System and Marketing Intelligence

The major responsibility for identifying significant marketplace changes falls to the company's marketers. Marketers have two advantages for the task: disciplined methods for collecting information and time spent interacting with customers and observing competitors and other outside groups. Some firms have marketing information systems that provide rich detail about buyer wants, preferences, and behavior.

Every firm must organize and distribute a continuous flow of information to its marketing managers. A **marketing information system** (MIS) consists of people, equipment, and procedures to gather, sort, analyze, evaluate, and distribute needed, timely, and accurate information to marketing decision makers. It relies on internal company records, marketing intelligence activities, and marketing research.

Internal Records and Database Systems

To spot important opportunities and potential problems, marketing managers rely on internal reports of orders, sales, prices, costs, inventory levels, receivables, and payables.

The Order-to-Payment Cycle The heart of the internal records system is the order-to-payment cycle. Sales representatives, dealers, and customers send orders to the firm. The sales department prepares invoices, transmits copies to various departments, and back-orders out-of-stock items. Shipped items generate shipping and billing documents. Because customers favor firms that can promise timely delivery, companies need to perform these steps quickly and accurately.

Sales Information Systems Marketing managers need timely and accurate reports on current sales. Walmart operates a sales and inventory data warehouse that captures data on every item for every customer, every store, every day and refreshes it every hour. Marketers must carefully interpret sales data, however, to avoid drawing wrong conclusions.

Databases, Data Warehousing, and Data Mining A customer database is an organized collection of comprehensive information about individual customers or prospects that is current, accessible, and actionable for lead generation, lead qualification, sales, or customer relationship management. **Database marketing** is the process of building, maintaining, and using customer databases and other databases (products, suppliers, resellers) to contact, transact with, and build relationships with customers. Information captured by the company is organized into a **data warehouse** where marketers can capture, query, and analyze data to draw inferences about individual customers' needs and responses. Marketing analysts use **data mining** to extract from the mass of data useful insights about customer behavior, trends, and segments.

The explosion of data brought by the maturation of the Internet and mobile technology gives companies unprecedented opportunities to engage customers. It also threatens to overwhelm decision makers. "Marketing Insight: Digging into Big Data" describes opportunities and challenges in managing massive data sets.² On the other hand, some customers may not want a relationship with the company and may resent having personal data collected and stored. The use of *behavioral targeting* to track customers' online behavior for marketing purposes allows advertisers to better target online ads—but some consumers object to the practice. Chapter 17 discusses database marketing in the context of direct marketing.

marketing insight

Digging into Big Data

n one year, people store enough data to fill 60,000 Libraries of Congress. YouTube receives 24 hours of video *every minute*. Manufacturers are putting sensors and chips into appliances and products, generating even more data. However, more data are not better unless they can be properly processed, analyzed, and interpreted. And therein lies the opportunity and challenge of Big Data, data sets that cannot be effectively managed with traditional tools.

One industry expert, James Kobielus, sees Big Data as distinctive because of: *Volume* (from hundreds of terabytes to petabytes and beyond); *Velocity* (up to and including real-time delivery); *Variety* (encompassing structured, unstructured, and semi-structured formats such as messages, images, and GPS signals); and *Volatility* (with hundreds of new data sources in apps, Web services, and social networks).

Some companies are harnessing Big Data. UK supermarket giant Tesco uses the 1.5 billion pieces of data it collects every month to set prices

and promotions; U.S. kitchenware retailer Williams-Sonoma uses its customer data to customize versions of its catalog. Amazon reports generating 30 percent of its sales through its recommendation engine ("You may also like"). On the production side, GE set up a team of developers in Silicon Valley to improve the efficiency of the jet engines, generators, locomotives, and CT scanners it sells. Even a 1 percent improvement in the operation of commercial aircraft would save \$2 billion for GE's airline customers.

Sources: Schumpeter, "Building with Big Data," *The Economist*, May 28, 2011; Jessica Twentyman, "Big Data Is the 'Next Frontier,'" *Financial Times*, November 14, 2011; Jacques Bughin, John Livingston, and Sam Marwaha, "Seizing the Potential of Big Data," *McKinsey Quarterly* 4 (October 2011); "Mining the Big Data Goldmine," Special Advertising Section, *Fortune*, 2012; "Financial Brands Tap Big Data," www.warc.com, September 13, 2012; Thomas H. Davenport, Paul Barth, and Randy Bean, "How 'Big Data' Is Different," *MIT Sloan Management Review* 54 (Fall 2012), pp. 43–46; Andrew McAfee and Erik Brynjolfsson, "Big Data: The Management Revolution," *Harvard Business Review*, October 2012, pp. 60–68; Ashlee Vance, "GE Tries to Make Its Machines Cool and Connected," *Bloomberg Businessweek*, December 10, 2012, pp. 44–46.

Marketing Intelligence

A marketing intelligence system is a set of procedures and sources that managers use to obtain everyday information about developments in the marketing environment. The internal records system supplies *results* data, but the marketing intelligence system supplies *happenings* data. Marketing managers collect marketing intelligence by reading books, newspapers, and trade publications; talking to customers, suppliers, distributors, and other company managers; and monitoring online social media. Table 3.1 shows eight ways to improve the quality and quantity of marketing intelligence.

Companies that make good use of "cookies," records of Web site usage stored on personal browsers, are smart users of targeted marketing. Many consumers are happy to cooperate: Not only do they *not* delete cookies, but they also expect customized marketing appeals and deals once they accept them.

The Marketing Research System

Marketing managers often commission formal marketing studies of specific problems and opportunities, like a market survey, a product-preference test, a sales forecast by region, or an advertising evaluation. It's the job of the marketing researcher to produce insight to help

TABLE 3.1	Improving Marketin	ng Intelligence
Action		Example
Train and motivate the sales force to spot and report new developments.		Have sales representatives observe how customers use products in innovative ways, which can lead to new product ideas.
Motivate distributors, retailers, and other intermediaries to pass along important intelligence.		Intermediaries are closer to the customer and can offer helpful insights, such as observing that certain consumers switch to different products during specific seasons.
Hire external experts to collect intelligence.		Use mystery shoppers to uncover problems with quality, services, and facilities.
Network internally and externally.		Buy competitors' products, attend open houses and trade shows, read competitors' published reports, and collect competitors' ads.
Set up a customer advisory panel.		Invite the company's largest, most outspoken, most sophisticated, or most representative customers to provide feedback.
Take advantage of government data.		Check U.S. Census Bureau data to learn about population swings, demographic groups, regional migrations, and changing family structure.
Buy information from outside research firms and vendors.		Obtain data from well-known suppliers such as Nielsen and NPD.
Collect marketing intelligence on the Internet.		Check online forums, distributor feedback sites, customer complaint sites, blogs, and social media for comments and opinions about competing goods and services.

the marketing manager's decision making. *Marketing insights* provide diagnostic information about how and why we observe certain effects in the marketplace and what that means to marketers.³

Gaining marketing insights is crucial for marketing success. To improve the marketing of its \$3 billion Pantene hair care brand, Procter & Gamble researched women's feelings about hair, using surveys with mood scales from psychology, high-resolution EEG research to measure brain waves, and other methods. As a result, the company reformulated Pantene products, redesigned packages, pared the line down, and fine-tuned the ad campaign.⁴

Defining Marketing Research

The American Marketing Association defines **marketing research** as "the function that links the consumer, customer, and public to the marketer through information—information used to identify and define marketing opportunities and problems; generate, refine, and evaluate marketing actions; monitor marketing performance; and improve understanding of marketing as a process. Marketing research specifies the information required to address these issues, designs the method for collecting information, manages and implements the data collection process, analyzes the results, and communicates the findings and their implications."⁵

Most companies use multiple resources to study their industries, competitors, audiences, and channel strategies. They normally budget marketing research at 1 percent to 2 percent of company sales and spend much of that on outside firms. Marketing research firms fall into three categories. Syndicated-service research firms such as Nielsen gather consumer and trade information, which they sell for a fee. Custom marketing research firms design studies, implement them, and report the findings. Specialty-line marketing research firms provide specific services such as field interviewing.