

The Wealth of Organizations

The “Voice of the Customer” replaces the “Invisible Hand” in guiding the marketplace

Laying the philosophical foundations for capitalism in the late eighteenth century, Adam Smith described an “invisible hand” guiding economic affairs to collectively increase the wealth and well-being of nations. As the twenty-first century approaches, modern capitalism can no longer rely on an unseen providence to ensure the proper allocation of scarce resources. The “voice of the customer” is now the key to business survival, not to mention prosperity.

Just as Smith’s *Wealth of Nations* discredited past economic policy and promoted the overthrow of institutions coming down from earlier times but unsuited to society in 1776, quality management principles are revolutionizing the way business is conducted today. Unlike *Wealth of Nations*, there is no single authority to define the emerging new paradigm. However, organizations like the Council for Continuous Improvement (CCI) provide an opportunity for examining a wide range of current practices.

Founded in California’s Silicon Valley in 1989, CCI has grown from a small group of hi-tech and defense firms who shared an interest in quality management to a broad-based consortium of companies committed to continually improving the quality of their products and services. At semi-monthly general sessions members meet to share ideas and experiences through a series of presentations, panel discussions, and work meetings. The presentations are summarized in proceedings which are published and distributed to all members. A survey of recent proceedings illustrates both the importance of satisfying the customer and the difficulty of determining what the customer wants.

Realizing the Importance of Customer Requirements

An executive vice president of a noted technology company told CCI members about his company’s early efforts to embrace the quality movement. They began to invest in training in 1986 and enthusiastically addressed many of the culture change issues raised by total quality management (TQM). “Measurements were taken. The TQM charts looked good. But the profits—and stock price—were going down,” the VP reported. Although there were many steadfast proponents of the quality program, engineers became cynical, and marketing people grew impatient.

Citing example after example of supposedly successful quality programs that did not produce success for the business, the executive acknowledged that they had been using their quality program to solve the wrong problems. They had not asked their customers what they wanted or if they were getting it. Finally, they focused on identifying customer needs as a critical step in their quest for better business practices. Professionally conducted customer surveys helped identify real problems and the quality program is back on track, as the company’s increasing productivity and stock price attest.

Establishing A “Customer First” Mentality

A semiconductor equipment supplier allocates 39% of its 4000 staff members to customer service and sales. “Our business requires globalization, so we are determined to become *the* world-class supplier. If you don’t have a worldwide service organization, it’s hard to hear the voice of the customer. Our intent is to have people in the field to listen,” stated their director of quality.

Customer satisfaction heads the company’s list of priorities for 1992-1994. They see process management and cultural values as the central issues in achieving customer satisfaction.

Marketing, product development, manufacturing, and sales & service are all part of the process. Customers and their requirements must be in view at every step. In sales & service, for example, an account management team is assigned to each key account to determine their requirements and measure their satisfaction. The team addresses maximized system performance in addition to core and value-added services. “We have to work together with our suppliers and customers to achieve quality. Don’t think for a moment that we can do it alone.”

Practicing Customer Relationship Management

Recognizing that customer relationship management criteria account for 30% of the scoring for the Malcolm Baldrige Award, an electronics company made customer relationship management its central focus when they re-engineered their business systems for continuous improvement. To determine if they were effectively managing their relationships with customers and using information gained from customers to improve strategies and practices, the company studied the Baldrige criteria. These criteria include: knowledge of customers and their requirements, data collection methods, systems for customer complaints and follow-ups, customer contact, methods of determining customer satisfaction, and determining future expectations for products/services. The company identified metrics as an area of particular concern for them.

With a variety of information-gathering methods available (like focus groups, outside research firms, a variety of internal and third-party surveys), the challenge is to distill the most effective tools (in terms of results and costs) and follow up with regular use of those tools. Common tools include mail and phone surveys (conducted at regular intervals and using consistent formats), feedback cards with products, and technical information centers with toll-free phone lines. Tracking on-time deliveries, buying behavior, and market share can be useful. Customer audits and national quality awards are important assessment tools.

Identifying the Voice of the Customer

Quality function deployment (QFD) is a very powerful statistical tool for identifying the voice of the customer and making sure that everyone in the organization hears that voice. In a lively presentation, the chief statistician for a major aircraft manufacturer showed a CCI audience how his company uses QFD to reduce costs & cycle time.

“QFD is a system used to translate customer requirements into directly related company engineering requirements (or response requirements for a service company). We want to be able

to quantify the customer's requirements and turn them into actionable, measurable items." Since QFD was introduced in company training in 1988, it has become their principal tool for responding to requests for proposals. In that time the win rate (proposals won vs. proposals submitted) has climbed from 50% to 80%.

Using a family of matrices, QFD plots "whats" (what does the customer need) against "hows" (how can the company respond to those needs) to study the relationships among competing whats and hows. As a work tool, these matrices aid integrated thinking and planning. As documentation, they provide a means to capture and preserve the engineering thought process and to communicate this thought process to new team members and management.

Translating Customer Needs into Actionable Goals

The quality manager for an international fiber optics cable supplier shared his company's unique methodology for translating customer needs into quantifiable, actionable goals. Since they have a relatively small customer base composed of very large companies, they conduct extensive performance evaluations with their major customers.

Large organizations have diverse requirements and important information may be widely dispersed throughout the organization. To help obtain and coordinate the necessary input, the cable company asks the assistance of a key person at the customer's location. This "customer coordinator" will be someone in the process with significant knowledge of both the customer's company structure and the cable company's products. The customer coordinator agrees to give four to six hours of personal time to the evaluation process. Together they develop an evaluation matrix to elicit customer feedback, first defining which customer departments have valid knowledge of their products and performance, then selecting appropriate performance evaluation subjects for each department.

With this matrix the cable company prepares individual evaluation questionnaires for each selected department, using the customer's terminology to describe products. Evaluators are asked to rate the company as excellent, acceptable, marginal, or unacceptable in each of the subjects listed. Although additional comments are solicited, the form can be completed by checking off the appropriate boxes. By using customer language, making the form easy to complete, and including only items pertinent to the evaluator, they encourage prompt, complete responses. The customer coordinator distributes and collects the completed forms, reviews the feedback, and returns the form to the company. "At some point in time," noted the quality manager, "the customer coordinators begin to think we must be pretty confident to send this questionnaire out to the people they have chosen and let them be the first to see the results."

Responses on the evaluations are converted to numbers. The data can be sorted as needed — by department, by subject, geographically, etc. Some criteria will be more important to a given customer than others, so raw scores are weighted to produce composite results. Any comments volunteered by the evaluators are also captured at this stage. Using these customer "report cards", they can identify actionable items and develop action plans.

Understanding how customer wants fit into business needs

A large manufacturer of consumer products faced a very different sort of problem. In designing a new manufacturing facility for the northeastern United States, they wanted the needs of external customers to be taken into account. Simply defining the customers was the first hurdle. In this case the customers were defined not as the retail consumers or end users, but as those groups directly served by or affecting the proposed facility: brokers, chains, convenience stores, carriers, etc. Since their products are carried by over 8000 stores within the distribution area, choosing representative facilities to visit posed another challenge. With guidance from the sales department, a simple Pareto analysis of the account size, and a little common sense, they selected twenty-two specific stores and three brokers for on-site interviews.

Interviews were conducted by two-person teams drawn from plant or work systems design teams. This eliminated any translation of customer requirements by a third party. Questions were developed by the entire interviewing team as a group so that everyone understood the reason and intent behind each question. With multiple interviewers, uniform questions provide more uniform answers, facilitating data management afterwards. To capture the thought behind the customer response, they used the affinity process, taking extreme care to keep the true intent of the customer voice. These comments were then grouped and translated into the design criteria by the normal QFD process.

Hearing Aids

Some suggest that customer relationships are often overlooked because they are hard to quantify, and the traditional product focus mistakenly assumes that better products alone can bring better sales. CCI members, however, have access to the tools and collective experience that make listening for the voice of customer a very rewarding experience. For more information on the Council for Continuous Improvement, call them at 408-283-1300.

*by Marc Miyashiro
2/10/93*