CHAPTER 21

Service-Based Organizations: Customer Service at Its Best

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About This Chapter

Service industries are the subject of this chapter. Service industries deliver services to their customers rather than goods. Selected industries are discussed, including general insurance, health care insurance, call centers, business process outsourcing (BPO), and information technology (IT) outsourcing. The way to think about quality in service industries and the special problems encountered is fundamental to this chapter. Each service specialty addressed has a section on quality issues, metrics, and opportunities particular to the service specialty. References that are particularly useful to service industries are listed for further use.

High Points of This Chapter

The high points of this chapter are

1. Private service-producing industries make up 68.2 percent of U.S. gross domestic product (GDP).

2. Quality means having those features of a service that a customer desires while remaining free from deficiencies or defects in that service.
3. If initially faced with little or no reliable data, one must immediately take action to start gathering such data. This may seem daunting, but it is the only way. With clever foresight, it generally is not as daunting as it first appeared.
4. "Go slow to go fast." Be deliberate in your actions to improve quality. If it were that easy, it would have already been done.
5. Top management support is critical to the success of a quality service program.

Introduction

Service-based organizations refer to businesses serving customers through some means other than manufacturing or the production of goods. The Bureau of Economic Analysis, Dept. of Commerce reported that in 2008, the private goods-producing sector of the economy accounted for 19.8 percent of gross domestic product (GDP). In that same year, private services-producing industries accounted for 68.2 percent of GDP, as shown in Figure 21.1. Services account for more than two-thirds of the U.S. economy. The goods-producing segment of the economy is made up of agriculture, forestry, fishing, hunting, mining, construction, and manufacturing. The services-producing segment is made up of utilities; wholesale trade; retail trade; transportation and warehousing; information; finance, insurance; real estate, rental, and leasing; professional and business services; educational services, health care, and social assistance; arts, entertainment, recreation, accommodation, and food services; and other services, except government.

A full treatment of the whole service-based economy is not possible in this text. Selected industries will be discussed, including general insurance, health care insurance, call centers, business process outsourcing (BPO), and information technology (IT) outsourcing.

Quality in Service-Based Organizations

The definition of quality for service-based industries is the same as for other industries. Quality has two fundamental aspects. Quality means having those features of a product or service that a customer desires while remaining free from deficiencies or defects in that product or service.

Is quality more difficult in service-based organizations? Measuring quality in service-based industries is often perceived as more difficult than in manufacturing. Modern manufacturing is old, with many tracing its roots to the eighteenth century. By its nature, manufacturing has always relied on measurements, quantities, weights, etc. Measurements seem to be quantifiable and intrinsic to manufacturing. Service-based industries, however, have often relied on qualitative measurements, such as "good, better, best" and "economy, deluxe, and luxury."

	2005	2006	2007	2008
GDP	100	100	100	100
Government	12.6	12.5	12.6	12.9
Private goods-producing industries	19.7	19.8	19.3	18.9
Private services-producing industries	67.7	67.7	68.0	68.2

Figure 21.1 Value added by industry group as a percentage of current-dollar GDP by year. (*Bureau of Economic Analysis, Dept. of Commerce.*)

The Problem of "No Data!"

Indeed, a frequent first lament of someone starting a quality program in a service industry is that there is no data. Although it is true in some instances that there is little useful or accurate data when starting out on a quality program, there often is more data than we think. One should approach the IT department of the organization early in a quality improvement program. They often have vast quantities of data that are routinely collected but not disseminated. A quick query of existing databases may yield a surprising quantity of data. The veracity of all data should be checked before using it or relying on an analysis of the data.

If there truly is little or no data available, or if it is corrupt and unreliable, then one must start gathering new data that will be useful. As with all change, suddenly starting to gather data where none had been gathered before can be alarming to employees or customers or both. There is a natural fear of change of being measured when one has not been measured in the past. Appropriate introduction of change methodologies should be used prior to gathering new data to allay such fears. If this step is skipped and misunderstanding of the real purposes of gathering the data exist, it can doom a quality program from the start. Too many individuals taking time out to just gather data or explain the purpose of gathering the data or the value of a quality system may seem a waste of time. The eagerness of the starting moment may be hard to resist. Keep in mind the old saying that applies well here: "Go slow to go fast." This saying is applicable to quality improvement efforts. This does not mean to imply that one should drag one's feet or that implementation of a quality program is slow. It simply means that to do things poorly fast is not an improvement.

Management Support

As in all industries, top-down management's understanding, appreciation, and support of any organizationwide quality program is mandatory. It starts at the top. If only nodding approval or a "let's wait and see" attitude is perceived by the employees, a quality improvement program will fail. The employees watch what management does much more than what management says. A quality council made up of senior executives should be established to oversee the quality improvement program as soon as possible. They should meet regularly, quarterly would be a desirable interval. Their interest and guidance to the program will speak loudly to the organization.

General Insurance Industry

The general insurance industry includes organizations offering insurance to individuals and groups for property, casualty, workers' compensation, and automotive insurance products.

Quality Issues

Insurance involves the sale of a promise by an insuring organization to the insured. There can be many misinterpretations of just what that promise was in the event of a loss at a later time. From the customer's point of view, quality involves an accurate understanding of the terms and bounds of that promise—neither more nor less. A mistake on the customer's understanding can mean disappointment and significant monetary loss. A mistake on the insurer's interpretation of the promise can mean loss of business or great economic loss.

Both parties must be absolutely clear on what exactly is being underwritten. The onus is on the insurer to know as much as possible about the insured. To be incorrect means that the insurer will lose money on claims or lose business. The insurer needs accurate, timely, and relevant data to describe the risk of underwriting the loss. Data quality is key.

Correct assessment of risk is ultimately to the insured's advantage also. Policy language needs to be crisp, neither too much nor too little, for both parties to have adequate understanding of the underwriting specifics. The insured's view of quality will vary greatly. For instance, the more affluent the insured, the larger the deductible relative to the insured amount will influence the sense of quality features to the insured. The insurer must be clear on making an apples-to-apples comparison of cost and benefit to the insured. The insured can lose business to competitors who imply the same benefit but at reduced cost when in fact they have, for instance, increased the deductible to attain that lower cost.

Income and expense are important metrics to the insurer. However, all must be balanced against risk. If, for instance, a low-paid and low-skilled worker is used to adjust claims, a serious mistake by the low-cost employer can be many times the cost of a higher-paid, competent employee. Cutting costs must be balanced against higher indemnity costs. Costs cannot be looked at solely without reference to other metrics.

Metrics

Typical metrics in the general insurance industry include:

- Income-to-expense ratio
- Monies held back to pay for future claims
- Expense versus indemnity cost
- Cycle time for processes, tasks, and subtasks
- Count or rate of customer phone calls per period
- Adherence to standard practices

Opportunities

The future holds many opportunities for the general insurance industry. If capital markets remain tight, there will be a trade-off of decisions between capital-intensive automation and manual operations. Business process outsourcing (BPO) has not been utilized as fully in the insurance industry and presents opportunities. BPO has potential to lower costs and increase revenues and customer satisfaction for the industry. (BPO is a service also discussed in this chapter.) The popular quality improvement programs such as Operational Excellence, Lean, and Lean Six Sigma (LSS) have been used in the industry, but there is more potential benefit to be gained. A corporatewide quality program should be considered. Full use of the LSS tool kit, such as parametric and nonparametric statistics, regression, and design of experiments, should be made. Multiple regression could also be used as a predictor for events. Logistic regression could be used for the probability of events. There is an opportunity for more testing and the piloting of solutions on a small scale to reduce risk until the solution is proved effective on a broader scale.

Health Care Insurance

Health care insurers provide medical insurance to client corporations and individuals. They have several constituent groups, including patients, doctors, health care providers, client organizations and individuals, hospitals, and government regulators. It is a complicated business with many players. At the time of this writing, the U.S government is considering a major overhaul to the way health care and health care insurance is delivered and paid for.

Quality Issues

The numerous interested parties in health care insurance complicate this business. The ultimate aim is to provide timely and effective treatments and disease prevention to patients in a cost-effective manner. Among health care providers, medical facilities such as hospitals, and the insurers, the insurers often have the best and most complete data. Who is the customer depends upon which interested party to health care one asks. The interested parties are sometimes at cross purposes also.

Opportunities

Health care insurance is amenable to Lean and Six Sigma quality programs. With the wealth of data available to the health care insurers, significant analysis of the data and improvements can be made. Quality projects often have very large dollar significance and impact for even small improvements.

Metrics

Metrics used in health care insurance include:

- Turn-around time of claims
- Improperly denied claims on appeal
- Effectiveness of care
- Access/availability of care
- Satisfaction with the experience of care
- Health plan stability
- Use of services
- Cost of care
- Health plan descriptive information

Call Centers

Call centers can be either internal call centers or third-party call centers run as a service business to other businesses. This discussion will focus on third-party call centers, although much would apply to internal call centers also. Call centers receive requests and complaints and handle transactions for the end-user customers of client organizations.

Quality Issues

The end users want their issues handled swiftly and satisfactorily. The client organizations want the same as their customers—and at the lowest possible cost. Third-party call centers are in a competitive business. Call centers focus on good person-to-person communication. The third-party call center wears the hat of the particular client they support. The more the call center can transparently appear as the client organization, the better for all parties involved in the transactions. Most agents represent just one outside client to enhance this perception.

Opportunities

Call centers lend themselves well to quality improvement programs because there is so much accurate data that is collected by computer. This makes analysis easier. However, due

to the competitive cost pressures, a careful balance must be struck between service delivery and quality programs. There is only so much labor for both tasks. Consequently, call centers lend themselves well to part-time quality project teams. Call centers need to stay lean by definition. A few years ago, call centers were almost all by phone communication, with some mail and e-mail. With the recent advent of social media, that model is changing. Customers are using social media such as phone texting, Facebook, and Twitter. Call center customers have more technological choices with regard to interaction than they had a short time ago. This phenomena is still evolving, but is expected to change call center operations.

Off-shoring has been a recent phenomenon in call centers also. The reason for that is primarily cost. But quality as measured by both the client and the customer cannot suffer. When conducting call center operations globally, the same metrics, measured in the same way, must be used.

Metrics

Common metrics of call centers include:

- Profit margin (corporate and by client)
- Interactions/labor hour
- Average handle-time (AHT)
- Call waiting time
- Call abandonment rate
- First call resolution rate
- Call "quality"
- Forecast accuracy
- Client service level agreement (SLA) metrics
- Percent of transactions through self-service
- Percent of service offshore
- Customer satisfaction scoring

Computer and IT Services

Computer and IT services lend themselves to business-to-business relationships. Many years ago, most organizations had their own internal IT departments. Now it is common for organizations to outsource some or all IT functions to contract vendors. This service can include processes such as hardware and software procurement, installation, maintenance and inventory, help desk services, server processes, desktop, and specialty software issues. As computing has gone from special case and one-offs to more off-the-shelf and standardized, IT has become more of a commodity function best left to specialists while an organization focuses on its core competencies, products, and services. Organizations providing IT services may have their employees on site, off site at a central location reached by phone or web interface, or a combination of both.

Quality Issues

IT service organizations frequently have to repair systems and fix problems. There is a difficulty many times identifying the root cause of the problem versus fixing and chasing the symptoms of the problem. The symptoms of the IT problem are most frequently reported by end users.

Metrics

Metrics for computer and IT services include:

- SLA metrics
- Mean time between failures (MTBF)
- Availability to the end user
- Mean time to repair

Opportunities

Computer and IT service organizations can make good use of Lean and Six Sigma quality improvement programs. In addition, Design for Six Sigma (DFSS) programs may be of use for designing new software or developing system specifications. IT service organization contracts are usually governed by strict SLAs that usually have financial consequences. Unfortunately, SLA metrics are often chosen for ease of measurement and clarity rather than the more difficult metrics that really drive end-user customer satisfaction. SLAs set the minimal level of service to avoid a penalty. Client organizations want "faster, cheaper better" from the IT service providers, and the quality of data available to the IT provider is often poor. Ironically, every call may be logged, but specific information for later analysis is often missing. For instance, the fact that a particular server has failed several times in the last few months may not be readily available, just that a particular server failed with no reference to its history.

In addition, information may be in a record but in the wrong field and therefore missed. In recent years client organizations have been hiring multiple IT vendors where previously all work would go to one vendor. In fact, the client may have to issue multiple tickets for essentially the same outage if they contract with multiple vendors. This has made communications among the IT vendors difficult due to terminology and practices. International Association for Standardization (ISO) and the Information Technology Infrastructure Library (ITIL) standards have been useful in resolving multivendor problems. As client organizations have gone global, their IT service providers must also be global with 24/7 support. Lean and Six Sigma both have applicability to IT service providers as part of their quality improvement program. The programs have to be worked in carefully, however, as clients are impatient during actual outages. Therefore, improvement program projects have to be completed outside of outage situations.

Business Process Outsourcing

Business process outsourcing (BPO) refers to the growing practice of one organization outsourcing some number of its processes to a third party to execute the selected processes. This has often been done for so-called back-office processes, but it can include primary functions such as sales, order fulfillment, and other activities, putting the third party in direct contact with the end user or customer. The organization that contracts out its service is sometimes referred to as the "client" organization. The person or organization that is the end user is often called the "customer." The third-party or BPO organization delivers the service. The client organization uses a BPO organization because it does not want to do the task or the BPO organization specializing in the service can execute the tasks cheaper or with better quality or both.

Quality Issues

Using a BPO organization allows the client organization to concentrate on their core competency, such as product development or marketing. Live dialogue between the third party

and a customer is not always required for processes such as credit card and check transactions. The BPO resource is sometimes located deliberately offshore from the client's location. This may be for reduced costs or a time zone advantage or both. There is a greater risk of language, culture, or communication difficulties when choosing an offshore BPO. In effect, the BPO organization "the client organization" to the customer for all practical purposes. When the distinction between the BPO organization and the client organization is transparent to the customer, this can truly be a winning solution for all three parties.

Metrics

When dealing with multiple offshore, near-shore, and domestic BPOs, special attention must be given to universal metrics. Universal metrics must be evenly applied and commonly understood globally. BPO organizations often include the following metrics:

- Transaction defect rate or, conversely, transactions free of defects expressed as a percentage
- Reduced variation in processing expressed as a mean value and standard deviation
- Transactions per time unit per agent
- Interactions per labor hour
- Customer satisfaction scores

Opportunities

BPO organizations primarily deal with people relationships. They are naturally staffed by employees with good people skills. This is a good thing. In the complex world of the BPO, however, strong analytical skills are needed as well. As a BPO organization matures and faces stiffer competition, presenting a good face to the customer is not enough. Customers expect a global high standard of quality. Client organizations want high quality also but will insist on quality at a lower cost each year. Systematic quality improvement programs such as Lean and Six Sigma are well suited to BPOs in their efforts to improve quality and reduce costs. During economic downturns, client organizations increase their reliance on and use of BPO organizations in order to reduce costs while maintaining or even improving service levels to customers.

Transactional Operations of Any Organization

Whether one is in a service industry directly or not, all businesses have "internal service" departments or functions. These functions can be treated as "internal service industries." For example, an internal call center or help desk will have many of the same considerations while pursuing a quality program as a business involved in third-party call center services. Internal service departments should be included even in nonservice industry businesses as part of a corporatewide quality initiative.

Other Service Industries

Many service industries, in addition to those discussed in this chapter, are good candidates for quality programs. Organizations in hospitality, retail sales, financial services, banking, airline, and travel industries, for example, can make good use of quality programs to increase profits and market share through superior customer satisfaction.

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