

Benchmarking Workshop

Case study: Xerox

Xerox Corporation, incorporated on April 18, 1906, is a provider of digital print technology and related solutions. The Company has capabilities in imaging and printing, data analytics, and the development of secure and automated solutions to help customers improve productivity. The Company's primary offerings span three main areas: Managed Document Services, Workplace Solutions and Graphic Communications. Its Managed Document Services offerings help customers, ranging from small businesses to global enterprises, optimize their printing and related document workflow and business processes. Xerox Corporation designs, develops, and sells document management systems and solutions worldwide. It offers managed document services, including managed print services and multi-channel communication services, as well as a range of digital solutions, such as workflow automation services, content management, and digitization services.

Creation of the Benchmarking term by XEROX

The term 'Benchmarking' was coined by Xerox in 1979. At this time, Xerox realized that Japanese competitors sold copy machines at a price that was well below Xerox' production costs. As a result, Xerox conducted a market-related Benchmarking study (competitive Benchmarking) for its production department. The production costs, design and other attributes of all copy machines that were available on the market were studied and analyzed. This approach led to new, radical goals. Due to the success the manufacturing department had, Xerox conducted Benchmarking studies for all business areas. This was in 1981. In the same year, the logistics and distribution departments conducted Benchmarking projects that incorporated all industries.

The Xerox benchmarking methodology was a ten-step process (Camp, 1989).

- **Step I:** identify what is to be benchmarked. Xerox's benchmarking process first started in the photocopier manufacturing unit as part of an effort to assess its manufacturing costs. Benchmarking was in effect invented in the late 1970s, when a shocked Xerox decided to analyze the performance of its Japanese associate to discover how Eastern rivals could sell excellent photocopiers for less than it cost the parent to make them.
- **Step II:** identify comparative companies. Xerox first studied one of its Japanese affiliates, Fuji-Xerox, and later on Canon, Minolta and Toyota to determine whether the relative costs of their Japanese counterparts were as low as their relative prices (Finnigan, 1996).
- **Step III:** determine data collection method and collect data. The studies confirmed that US prices were higher than the Japanese ones. Japanese costs became the target for Xerox. However, the benchmarking process was only starting. Managers from the main plant visited Xerox's Japanese affiliates and saw what they were doing at the factory floor. Xerox then started collecting the information.
- **Step IV:** determine current performance gap. The information collected at the previous step is then used to determine the gap that might exist between Xerox's performance and the best in class.
- **Step V:** project future performance levels. From the gap analysis, projected future performance levels are determined and how these levels are going to be achieved and maintained is determined.

- **Step VI:** communicate benchmark findings and gain acceptance. All Xerox employees receive at least the basic 28-hour leadership through quality training and many were trained in advanced quality techniques. Over the last four years, Xerox has invested four million man-hours and \$125 million in its training program. Once a new benchmark has been established and incorporated for in future strategy, it is communicated to the rest of the organization so that others may also use it in their standard operating procedures.
- **Step VII:** establish functional goals. Xerox identified that purchased materials accounting for 70 percent of its product unit manufacturing costs, small strides could translate into significant quantifiable benefits. The company cut its supplier base from more than 5,000 in the early 1980s to 420 today. Defective components have been reduced from about 10,000 parts per million in 1980 to 225 today. Six of seven parts inspectors have been reassigned to other jobs, and 95 percent of supplied parts need not be inspected at all. Component lead-time is down from 39 weeks in 1980 to eight weeks last year. And the cost of purchased parts has been slashed by 45 percent. These goals were not necessarily all set at once but with the continuous process put in place for lowering costs they came more easily and without disruption.
- **Step VIII:** develop action plans. Concrete action plans need to be developed and Xerox developed these plans, resulting in the reduction in lead times and the quality improvement of the copiers.
- **Step IX:** implement specific actions and monitor results. Benchmarking has to be a coordinated plan. Specific action plans have to be drawn up and the results monitored to ensure that the required results are being achieved.

- **Step X:** recalibrate benchmarks. After having benchmarked Japanese industries, Xerox didn't stop there, it started looking at L.L Bean, the American Hospital Supply and Caterpillar. The results speak for themselves as Xerox is the only company in the world to have won all three major awards: Japan's Deming Prize, America's Malcolm Baldrige National Quality Award and the European Quality Award.