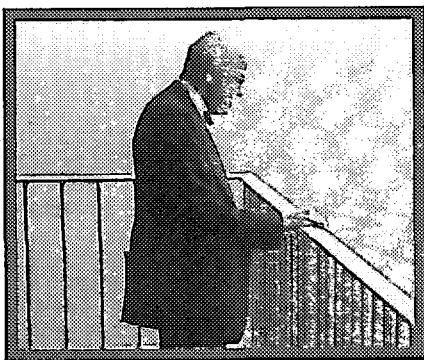


# The Architect

Joseph M. Juran  
1904 – 2008



**PIONEER. TEACHER. CONSULTANT. GURU.** Each of these words describes Joseph M. Juran,

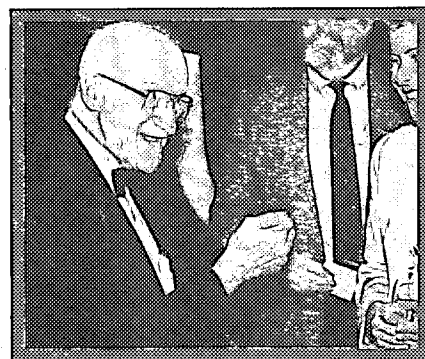
the man who became a giant in the world of quality management and changed how companies do business.

His lofty goal: to make things better. He wanted to improve everything he touched. Whatever he discovered along the way, he wanted to share. For Juran, there was always an idea to develop and build on.

“He always told me, [REDACTED],” Juran’s son, Donald, said days after his 103-year-old father died Feb. 28. “And he never was.”

Over the course of Juran’s remarkable 75-year career—during which, at age 24, he headed a corporation’s large inspection division, traveled millions of miles to share his message on quality, and founded a quality consulting organization at 75—he never let his age dictate the projects he tackled:

**COUNTER CLOCKWISE, FROM TOP LEFT:** Juran wrote hundreds of books and articles, and he served as a contributing editor for QP from 1968-79; Juran after a lecture at a 1985 conference in Portugal; Juran speaking at an ASQ event; Juran with just a handful of the estimated 20,000 people he taught in 34 countries during his career; Juran speaking at a reception at the University of Minnesota’s Carlson School of Management in 1998; Juran at an ASQ Annual Quality Congress.



# of Quality

- The elder statesman of total quality control consulted, lectured and wrote well into his 90s.
- Up until his death, he was working to complete another textbook, this time collaborating with one of his grandsons, David Juran. David Juran, along with Joseph De Feo, the Juran Institute's chief executive, said they plan to finish the book.

by Mark Edmund,  
associate editor

Maintain focus. Keep active. Never stop exploring—all in the name of quality.

"A typical trait of Dr. Juran (was) that whatever the age, he remained young because he never stopped listening," Tito Conti, president of the International Academy for Quality, wrote in a tribute to Juran.

Conti went on to describe an encounter with Juran in the 1990s at a standards forum in Europe. Juran sat in the front row for Conti's presentation, hungry for data and details.

"He did not want to engage his clear mind in the 'diagnostic journey' before getting a firsthand description of the facts and the environment in which they were emerging," Conti wrote.

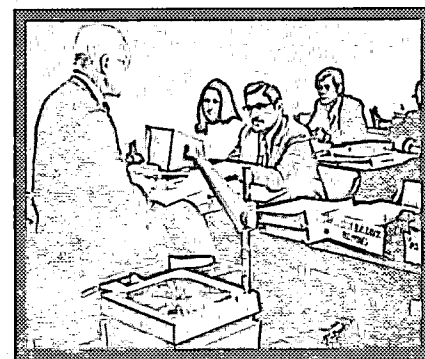


## Early years

Juran's thirst for discovery was something he could never seem to quench. Born Joseph Moses Juran on Dec. 24, 1904, in Romania, Juran immigrated to Minneapolis with his family eight years later to escape poverty and the threat of violence against Jews.

Nothing came easily, and his family struggled to improve its situation. As a young boy, Juran and his siblings worked hard to add to the family's income. Laborer, newspaper boy, grocery clerk and bookkeeper are just a few of the many jobs Juran held to help his family survive.

When he wasn't working, he stayed committed to earning a formal education. Again, it seemed his appetite for knowledge could not be satisfied. Teachers kept



moving him ahead to challenge and motivate him. In 1920, he began his studies at the University of Minnesota, majoring in electrical engineering.

But college proved a bit more challenging and, amazingly, maintaining a C average was sometimes a struggle. Juran had never really needed to study to make the grade, but now subjects required more effort. Of course, he continued to work jobs outside the classroom to make ends meet, which pulled time away from his studies.

## JURAN IN HIS OWN WORDS

Joseph M. Juran's take on different quality related subjects.

### On the cost of poor quality:

"In the U.S.A., about a third of what we do consists of redoing work previously 'done.'"

### On the definition of quality:

"Quality is fitness for use."

### On quality control:

"For quality in the sense of freedom from deficiencies, the long-range goal is perfection."

### On innovation:

"Improvement means the organized creation of beneficial change; the attainment of unprecedented levels of performance. A synonym is 'breakthrough.'"

"To achieve improvement at a revolutionary pace requires that improvement be made mandatory—that it become a part of a regular job, written into the job description."

### On standards/standardization:

"Without a standard, there is no logical basis for making a decision or taking action."

### On top management commitment:

"Observing many companies in action, I am unable to point to a single instance in which stunning results were gotten without the active and personal leadership of the upper managers."

### On total quality management (TQM) implementation:

"The recipe for action should consist of 90% substance and 10% exhortation."

### On TQM leaders and managers:

"All managerial activity is directed at either breakthrough or control. Managers are busy doing both of these things, and nothing else."

"Had Deming and I never gone there, the Japanese quality revolution would have taken place without us ... the unsung heroes of the Japanese quality revolution were the Japanese managers."

Source: Hella Gomes, *Quality Quotes*, ASQ Quality Press, 1996.

Juran graduated in 1924 and started his career in Cicero, IL, accepting a job as an engineer at the Hawthorne manufacturing plant of Western Electric, the former manufacturing arm of AT&T. It was there he began his career in quality.

## The journey begins

At the time, Juran never realized that what he would be doing had anything to do with quality. A week into the job at Hawthorne, he was assigned (perhaps randomly) to the inspection branch of the plant. Two years later, he joined Western Electric's new inspection statistical department, one of the first in industrial history. Still in his early 20s, he was promoted to a managerial position, then to division chief.

From there, Juran's career evolved to include earning a law degree (as a backup employment alternative during the Depression) and moving to Western Electric/AT&T's headquarters in New York to work in corporate engineering.

Shortly after the attack on Pearl Harbor, he was granted a temporary leave of absence from Western Electric to work for the Lend Lease Administration, which procured and leased arms, equipment and supplies to World War II allies. Juran's job in Washington, DC, involved finding ways to improve purchasing and budgeting activities and breaking up paperwork logjams in the government program. The temporary leave from Western Electric eventually was extended from the original six-week absence to four years.

## A consultant like no other

Juran left Washington, DC, in 1945 to start a new chapter in his career, teaching industrial engineering at New York University as a professor and department chair. Four years later, he started his own freelance consultancy, devoting his time and energy to quality management, looking beyond just statistics to encompass the human side of quality.

Quality to Juran was also about management, human beings and human interaction. "SQC (statistical quality control) applies only to technicians," explained Jungi Noguchi, a former executive director of the Japanese Union of Scientists and Engineers (JUSE). "Juran applied quality to everybody, from managers to clerical staff."

Essentially,

as Juran called it, cultural resistance.

# Juran: Long Life, Lasting Contributions

**Dec. 24, 1904**

Born in Braila, Romania.

**1912**

Immigrated with family to Minneapolis. Got first job (of 16 held before age 20) selling *Minneapolis Tribune* at streetcar stop.

**1917**

Became naturalized U.S. citizen.

**1925**

Served as second lieutenant in the U.S. Army Signal Corps Reserve, Signal Intelligence Division, performing cryptanalysis; later promoted to captain.

**1926**

Joined Western Electric's new inspection statistical department, one of the first in industrial history. Married Sadie Shapiro. The couple eventually had four children and numerous grandchildren and great-grandchildren.

**1928**

Promoted to first managerial job, chief of quality inspections (new Western Electric department of 40 inspectors who randomly checked work of product inspectors).

**1929**

Promoted at 24 years old to chief of Western Electric's inspection results division, overseeing five departments.

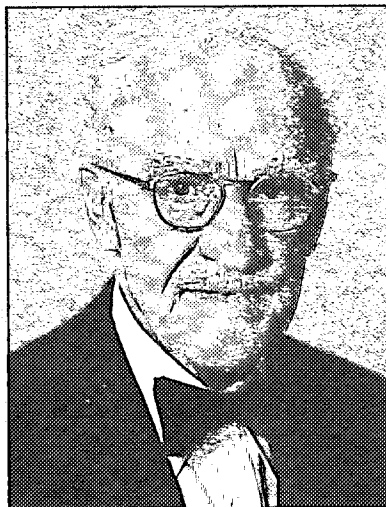
**1937**

Moved to New York to become corporate industrial engineer at Western Electric/AT&T headquarters; also became active in professional organizations such as the Society for the Advancement for Management, American Management Assn. and American Society of Mechanical Engineers.

**1941**

Discovered work of Vilfredo Pareto (on the distribution of wealth among a few families) during benchmarking visit to General Motors' headquarters.

Began work in the statistics division of the Lend Lease Administration; on loan to the World War II effort originally for only six weeks, starting on Christmas Day (just after the attack on Pearl Harbor).



**1942**

Appointed assistant administrator in charge of the reports and records division of Lend Lease, which asked Western Electric to extend Juran's leave of absence then and each year thereafter during remainder of war.

**1945-49**

Began management consulting on a per project basis with Wallace Clark's consulting company, assisting clients such as Gillette, the Hamilton Watch Co. and a division of BorgWarner.

**1946**

Became founding member of the American Society for Quality Control (ASQC) and of the editorial board of *Industrial Quality Control*, the society's publication.

**1949-79**

Started his own freelance consultancy with about 40 clients, including International Latex Co., Bausch and Lomb Optical Co. and General Foods Corp.; over four decades, client list grew to include dozens of North American and international organizations, such as Armour & Co., Otis Elevator Co., Xerox Corp. and the U.S. Navy.

**1950-91**

Took 178 trips abroad to lecture, consult, teach courses and attend quality conferences in 34 countries, addressing more than 20,000 managers and specialists

and logging more than 5 million air miles.

**1951**

Published first edition of *Quality Control Handbook*, based on knowledge gained from consulting work on managing for quality (became Juran's *Quality Handbook* by its fifth edition).

**1968-79**

Served as contributing editor to *Quality Progress* from its launch as ASQC's flagship publication; also published the first of many articles in QP, "Operator Errors—Time for a New Look," on what he called the "zero defects fad" of the 1960s.

**1979**

Incorporated the Juran Institute, at first to invest in transferring his store of quality knowledge into a set of 16 videotapes, which became part of a "Juran on Quality Improvement" package that also included 50 workbooks, two leaders' manuals and three books. The institute eventually expanded to offer consulting services, workshops, papers and additional books and tapes.

**1981**

Received Japanese emperor's award of the Order of the Sacred Treasure, Second Class (highest award available to a non-Japanese), for the "development of quality control in Japan and the facilitation of the U.S. and Japanese friendship." Named honorary member of ASQC.

**1987**

Became chairman emeritus of the Juran Institute, stepping down from position of chairman and CEO.

**1988-91**

Served as founding member of the Malcolm Baldrige National Quality Award Board of Overseers.

**2003**

Published memoirs, *Architect of Quality*.

**Feb. 28, 2008**

Died of natural causes in Rye, NY, at the age of 103. Survived by wife of 81 years, Sadie, along with many children and grandchildren.

"Already a man of high professional standing and of major business and governmental experience, the very fact of Joseph Juran's placing his personal emphasis upon quality brought enormous attention and meaning to the subject of quality, which previously had been thought of as a technical factor in inspection," Armand V. Feigenbaum, president and CEO of General Systems Co., wrote in a remembrance of Juran.

## "Heaven will get better."

—Joaquim Donizetti Donda

In 1951, the first edition of the *Quality Control Handbook* was published, establishing Juran's reputation as the authority on quality. During this decade, his standing in the business world reached new heights as he became a respected consultant, lecturer, author and leader in quality management.

At that point in history, the business world included postwar Japan. In the early 1950s, JUSE had invited W. Edwards Deming to talk on statistical quality methods. A short time later, the group invited Juran to lecture on quality control.

From that point, there was no stopping the quality movement. Combined, the Deming and Juran lectures and

courses helped propel Japan toward becoming a quality and economic powerhouse in the late 20th century.

After building a loyal following in Japan, the quality movement began spreading throughout the world.

...e contribution of Joseph Juran," Feigenbaum wrote.

### Key contributions

Adding the human element to quality will always be considered one of Juran's greatest accomplishments.

Juran said during his last interview with QP four years ago. "At the time, I didn't realize I was contributing to it, but in retrospect, I believe that's what I'll be remembered for after I'm gone."

Here's a modest sampling of other contributions the quality community will remember as Juran's greatest accomplishments:

- The Pareto principle, or 80-20 rule, which Juran applied to quality, stating that 80% of problems come from 20% of causes, and that management should concentrate on the 20% (what he called the "vital few and the useful many").

## CONNECTING WITH JURAN

Joseph M. Juran touched everyone in the quality community with his theories and writings. But the ivory tower was never his home. He connected with so many people on a personal level.

Shortly after his death, QP invited readers to share their thoughts on Juran. Here are some excerpts from those who had the good fortune of knowing or meeting the quality legend.

### Encouraging

"He told me to remain focused and keep on chugging until I reach 100 years in age just like him. I smiled back at him. We both had a big smile looking at each other for several seconds.

He then turned toward me and shook my hand one more time ... His departing

comment—... is still ringing in my head."

—Madhav Sinha

"At a time when the field of quality was often contentious and our new Baldrige effort was still fragile, Dr. Juran was a steadying influence, bringing credibility and confidence to our work.

His services and leadership within the first Board of Overseers were a key foundation for our early work, enhancing the award's stature in the U.S. and around the world."

—Curt Reimann, first director of the Baldrige National Quality Program

### Gracious

"The last time I saw him was in the White

House when the first Baldrige Awards were given, and his first words to me were, 'You should be proud of what you accomplished to bring this award about.' Typical graciousness by a great man. The world and I will miss him."

—Jack Grayson, founder, American Productivity and Quality Center

### Humorous

Stu Hunter visited Juran late last year, arriving unexpectedly during lunchtime.

"If you had told me you were coming, we could have had lunch together. Now you'll have to watch me eat mine," Hunter recalls Juran saying.

He was obviously working hard, his desk covered with papers. It was the first time I had seen Joe in several years and although he was slower afoot there was

- The Juran trilogy, the philosophy that outlined three components of managing for quality: planning, control and improvement.
- Juran's *Quality Control Handbook*, considered the standard quality reference.
- Hundreds of papers, articles and speeches, as well as more than 30 books, some of which have been translated into at least 12 languages.

"Dr. Juran made a huge difference in the world by his promoting, teaching, writing books, and lecturing on quality for all walks of life," wrote Mickey Christensen, president of TQM Systems. "He was truly one of the major players in the movement to go from planned obsolescence or early failure to one of quality first."

Juran knew the movement could never—and should never—end. Perhaps this realization fueled his drive to maintain focus, remain active and never stop exploring.

"My job of contributing to the welfare of my fellow man is the great unfinished business," he wrote in his 2003 memoir, *Architect of Quality*.

"Dr. Juran has inspired all of us as quality professionals," wrote Mohamed Zairi, a professor at the University of Bradford in England and the Juran chair in total quality management from the Juran Foundation.

nothing, literally nothing, lacking in his mental agility. I departed amazed at the man's vitality.

Rare events, wonderful rare events, do occur."

—J. Stuart Hunter, professor emeritus, Princeton University

### Committed


"Dr. Juran wrote that the purpose of the (Juran) Institute is to improve the quality of society. He said, 'Whatever you do make sure it improves society. Don't just do it for the sake of profit.'

A true leader is not just there to lead a company. They must have a purpose. I hope to continue to build upon the foundation of true leadership which Dr. Juran embodied."

—Joseph A. De Feo, president and CEO, the Juran Institute

## THE JURAN MEDAL

The Joseph M. Juran Medal is presented by ASQ to the individual who exhibits distinguished performance in a sustained role as an organizational leader personally practicing the key principles of quality and demonstrating breakthrough management. The first medal was awarded in 2000. The 2007 winner of the Juran Medal is Sister Mary Jean Ryan, president and CEO, SSM Healthcare, St. Louis.



"He has helped pave the way for an exciting future for our profession, and we owe it to him to continue his work by helping his 'unfinished (business)' to make an even bigger leap in the 21st century."

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### Towering presence

In a letter written to Juran, Tom Pyzdek recalls listening to Juran at an ASQ conference.

"I was surprised by how small you were, physically. On the dais, however, you were a giant as you told those of us assembled there that we had a big responsibility to help America recover her position as the world's quality leader. By the way, you looked great in your tux!"

—Tom Pyzdek

### Uplifting

"Dr. Juran changed many lives. He did so through his books, videos, recordings, papers and public addresses. He did so by simply striking up a conversation with a stranger at a conference. He changed lives by setting an extraordinary example.

Through his deeds. His generosity. His wisdom. His unselfish focus on humanity. And his unrelenting goal to pay back a debt to society for the opportunities presented to him over the years. Everything he said or did represented the kind of human qualities we would all like to emulate."

—Howland Blackiston, Juran's grandson-in-law and producer of the Juran documentary, "An Immigrant's Gift"

Upon hearing the news of Juran's passing, Joaquim Donizetti Donda, an ASQ member, simply wrote:

"Heaven will get better."

To view the full text of these tributes and more contributions, visit [www.asq.org/juran/comments.html](http://www.asq.org/juran/comments.html).



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SOURCE: Qual Prog 41 no4 Ap 2008

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