

Chapter 1

As I put the finishing edits on my second book to discuss one of my two favorite topics, which are leadership and innovation, the book's final crafting reaffirmed to me that even though leadership and innovation are two very different topics and are unquestionably worthy of their own in-depth exploration, when viewed from an inventive perspective, the two are undeniably interdependent, and the importance of innovation leadership cannot be overly stated. So important is this truth that it has become indelibly imprinted in my mind and in my innovation philosophies. Yes, innovation and leadership have been independently written and discussed in fantastic detail for obvious reasons, but it must also be unmistakably understood that truly successful innovation requires influential leadership. To further this point, even my own personal innovation leadership, which has evolved and matured over thirty years, has taken on a new meaning as I have refined the final chapters of this book.

In attempts for readers to better appreciate the writings in this book and to increase the understanding of who I am, it's briefly worth establishing the backdrop of my career and highlighting my credentials. I have productively spent my entire career in the field of research and development, ranging from detailed design engineering to the creation and structuring of a world-class new product development franchise. I began from truly humble beginnings as the third of four children in a modest family upbringing with no extra monies to attend college. Dinner conversations focused on family. They were not about establishing the expectations for higher education such as college but were more focused on learning a respectable professional trade. Shortly after high school, I became a tradesman in the offset printing industry, which showed impressive early progress. However, approximately three years later, I chose to pursue my certificate as a mechanical drafter from ITT Technical Institute, which allowed me to get my foot in the door at my first engineering company. Thereafter, in order to further advance my career, I attended Northeastern University's evening school for the next ten years while working full-time. My exceptional work ethic and emotionally intelligent leadership skills quickly led to my first management position in my mid-twenties and even before I had earned my associate degree. A decade later, I graduated from Northeastern University with a Bachelor of Science degree in mechanical engineering, with an accomplished management history and coincidentally with no outstanding school bills. My career path as a drafter began, and after numerous increasing positions of responsibility, I progressed to the senior director of research and development at Medtronic, one of the world's largest medical technology companies. The years at

Medtronic's Surgical Technologies Sector allowed me to help grow a \$100 million business into an approximately \$2.0 billion division during one of the most challenging economic environments since the Great Depression. Living through this uniquely challenging time in American history where the average company was either having layoffs or downsizing in attempts to remain solvent, Surgical Technologies was able to show double-digit growth consistently during my fourteen years with the company. This consistent and impressive growth rate presented me with an outstanding experiential learning venue, a model of continuous learning, and a notable innovation history.

During that time, I continued to embrace education and learn from a variety of venues including company-sponsored education in the form of lunch and learns, required job training, graduate-level studies, executive education (Wharton School, University of Pennsylvania; Michigan Ross School of Business; and Opus College of Business, University of St. Thomas), and MDA executive leadership coaching. I also learned by reading copious leadership, business, and innovation books, which receive credit throughout my writings. My responsibilities at Medtronic included being accountable for the sustained revenue protection of over \$1 billion, a budget worth tens of millions of dollars, hundreds of new product launches per year; team recognition including winning Medtronic's prestigious Technical Contributor of the Year Award four times (Novus Citric Acid Zwitterionic Surfactant, PowerEase Pedical Screw Driver, TriVantage EMG Tube, and NuVent EM Sinus Dilation System); intellectual property cochairperson of a three-hundred-patent portfolio; oversight of multiple R & D locations; a reporting structure of hundreds of personnel across the country; and the personal innovation of over thirty patent applications and more than twenty granted US patents while working for one of the world's preeminent, multibillion-dollar medical device companies.

To this day, I continue to read, learn, and evolve my leadership and innovation philosophies; and I hope that this book is beneficial to the next generation of innovation professionals. As I alluded to at the onset of this chapter, leadership and innovation warrant their own discussions and merit individual focus. However, as declared earlier, they are not mutually exclusive either. The two are clearly interdependent, and as you read further, you will begin to better understand how, in my opinion, when properly merged together, they lead to a more profitable innovation culture.

The leadership style I've evolved is highly effective because of its easy-to-understand and straightforward application. Each one of us as we grew up where subjected to countless phrases, sayings and idioms. In my first book,

Mantra Leadership: Don't Become the Emperor with No Clothes! ¹, Copyright 2014, I introduced first time readers to this basic aged learning technique and how it applies to everyday business. Mantra Leadership creates essential "rules" useful in the management of small teams to executive presence. Because people learn by observation, training, feedback and repetition; I have effectively adopted many years of leadership into these essential leadership rules. The system is a simple, consistent, easy to teach, leadership tool with executive brevity and proven results. Mantra Leadership highlights essential emotionally intelligent leadership skills necessary to create an honest and transparent culture. The resulting positive business culture creates an environment of true team synergy and can increase productivity by as much as 30% or greater². These same proven techniques were of course integrated into my innovation leadership philosophies which are shared in Mantra Design: Innovate, Buy or Die!

I will repeatedly differentiate and emphasize innovation leadership because of my strong philosophical beliefs that leadership plays an essential ingredient in profitable innovation. Further, I will illustrate where possible the striking differences in attempt to portray its importance when compared to innovation management. The blending of two words with very different meaning into a unique connotation of its own is the onset to show a clear distinction behind the meaning of innovation leadership. I have effectively spent the last three decades of my career leading research and development teams in the successful introduction and protection of innovative and profitable new products and technologies. I can point to countless next-generation platforms that have become market-share-leading innovations, which continue to generate hundreds of millions of dollars and are protected by well-crafted intellectual property. In attempts to share the special difference that leadership brings to innovation, let's begin with their definitions. Wikipedia, the free online encyclopedia,³ defines leadership and innovation as follows:

Leadership is a process of social influence in which one person can enlist the aid and support of others in the accomplishment of a common task.

Innovation is finding a better way of doing something. Innovation can be viewed as the application of better solutions that meet new requirements, in-articulated needs, or existing market needs.

To my appreciation, there continues to be a healthy debate between

the difference of being a leader or manager, and let me assure you that there are indeed clear distinctions between the two. In essence, any employee who is competent in their job can be promoted to a manager position. However, just because you have a reporting structure does not make you an effective leader, never mind a good one. Anyone with positional authority can provide direction and assign work-related tasks to the individuals reporting to them. However, a leader over time refines a definitive subset of emotionally intelligent skills that enable a unique presence that resonates with personnel who want to help that leader and their teammates achieve a greater success. Leadership presence creates a culture and a following that changes the work environment paradigm from performing a task because they have to, to personally accepting the responsibility to exceed management's expectations in completing their assignments. Leadership empowers individuals to embrace the strategic vision and become a complementary force in efforts to help the larger whole become greater than the sum of the individual pieces. Leadership innovation creates a powerful intangible, which harnesses inventor's desires to exceed your customer's expectations and succeed at all costs compared to creating an innovation process, which some manager is responsible for its oversight.

A basic innovation process is indeed essential to ensuring that any aspiring growth company has the proper structure, personnel, and processes in place to support their new product introductions. However, just having a process in place does not ensure innovation success. Great innovation companies have unique cultures created from special leaders who have attracted exceptional talent and have successfully energized their collective creative juices to solve their customer's unmet need. These properly channeled personalities work together synergistically within a well-defined process to identify unmet need that can be commercialized into profitable innovation. Innovation leadership supplies the magical and special emotionally intelligent pixie dust necessary to exceed your customers' expectations in the introduction of next-generation technologies. Perhaps the personification of innovation leadership is the example of Steve Jobs, Apple Incorporated's late cofounder, chairman, and CEO.

By definition, an innovation process is a structured collection of processes and tools intended to proceduralize a company's new product development introductions into the commercial marketplace. Wikipedia⁴ defines innovation management and innovation leadership as follows:

Innovation management is the management of innovation processes. It refers both to product and organizational innovation.

Innovation management includes a set of tools that allow managers and engineers to cooperate with a common understanding of processes and goals. Innovation management allows the organization to respond to external or internal opportunities, and use its creativity to introduce new ideas, processes or products. It is not relegated to R & D; it involves workers at every level in contributing creatively to a company's product development, manufacturing and marketing.

By utilizing innovation management tools, management can trigger and deploy the creative capabilities of the work force for the continuous development of a company. Common tools include brainstorming, virtual prototyping, product lifecycle management, idea management, TRIZ, Phase- gate model, project management, product line planning and portfolio management. The process can be viewed as an evolutionary integration of organization, technology and market by iterating a series of activities: search, select, implement and capture.

Whereas the more powerful intangible leadership brings to your innovation process is described as follows:

Innovation leadership involves synthesizing different leadership styles in organizations to influence employees to produce creative ideas, products, services and solutions.

The key role in the practice of innovation leadership is the innovation leader. Dr. David Gliddon (2006) developed the competency model of innovation leaders and established the concept of innovation leadership at Penn State University.

As an approach to organization development, innovation leadership can be used to support the achievement of the mission or vision of an organization or group. In a world that is ever changing with new technologies and processes, it is becoming necessary for organizations to think innovatively in order to ensure their continued success and stay competitive. In order to adapt to new changes, "the need for innovation in organizations has resulted in a new focus on the role of leaders in shaping the nature and success of creative efforts." Without innovation leadership, organizations are likely to struggle. This new call for innovation represents the shift from the 20th century, traditional view of organizational practices, which discouraged employee innovative behaviors, to the 21st.

century view of valuing innovative thinking as a “potentially powerful influence on organizational performance.”

Having emphasized and highlighted the differences between innovation leadership and innovation management, I will naturally continue to share my own personal experiences, techniques, and philosophies in an effort to help bridge the gap from a mediocre innovation process to the creation of that special innovation culture. Clearly, leadership and innovation bring a genuine emotional excitement to me, which has helped fuel my passion for work over these last thirty years. And in attempts to as seamlessly as possible introduce many of my leadership philosophies, I will periodically make reference to the leadership mantras from my prior book, *Mantra Leadership: Don't Become the Emperor with No Clothes!* However, in attempts to prevent annoying readers with a continuous reference to my book, I will simply use quotations before and after the bold text mantra with a superscript reference.

Let's begin our innovation journey and reveal the secrets to profitable and sustained innovation.