

## **Sustaining Reliability Gains**

In a prior column, I presented a case for a Reliability Improvement Policy. Such a policy and a plan developed, supported, and administered by company leadership at all levels is essential for beginning sustainable changes in the maintenance and reliability process. Sustaining improvements in maintenance and reliability should be the next concern of your leadership team as they develop and deploy a Reliability Policy.

Sustaining positive change is fairly easy if:

1. It is not an option.
2. It is a condition of employment because there is a compelling case that our business success or growth depends on the results of the change efforts.

Sometimes I wonder why so many maintenance and reliability improvement initiatives stop or go dormant in such a short time. Could it be that there is no honestly compelling reason to change? Could it be that everyone who should be leading the change process has not bought into it? Could it be that some are afraid of change... afraid of the unknown or do not want to change at all? Truth is, maybe it's all of those reasons, and more.

So, how do we sustain positive changes, innovations in maintenance and reliability in our organizations?

Sustainability of innovative work processes, be they maintenance or operations, have been promoted by many purveyors and “innovators” for decades. Sometimes, it is sales hype and other times it is wishful (or hopeful) thinking. Sustaining positive change in equipment, plant, and process reliability is a must in today's highly competitive and rapidly changing global economy. Sustaining positive change depends on people—you and me, senior leaders and plant floor people, mechanics and operators, all of us—buying into the new methods, adopting them, and sometimes changing our beliefs and behaviors in the workplace.

Reliability-Centered Maintenance, Total Productive Maintenance, Preventive Maintenance, Condition-Based Maintenance, Operator-Performed Maintenance, Life-Cycle Costing, Lean Manufacturing, Computerized Maintenance Management Systems...All of these represent some of the numerous changes in the ways companies and people take care of their equipment and facilities today. Have you seen some of your maintenance and reliability improvement programs come and go? Have you started on an improvement journey only to have it stall, go stagnant, and even stop all together? Well, it happens all the time in many businesses large and small all over the world.

Let's explore how individual attitudes throughout the organization—from senior leadership through plant floor employees—can affect the development and sustainability of maintenance and reliability changes in the workplace.

### **Individual Innovativeness**

Some people are more innovative and more adventuresome than others. Studies have shown that people all embrace change or new ideas at different rates. Take for example studies done by Everett

Rogers dating from the early 1960s up through the early 2000s. Rogers identified five groups of “adopters” of innovation:

1. **Innovators** represent the first wave of adopters (2.5%). They are venturesome, well educated, have multiple sources of information, and are willing to tolerate initial problems that may occur and are willing to seek solutions.
2. **Early Adopters** represent the next wave of adopters (13.5%). They tend to be the social leaders (popular, educated, visionary) who are looking to adopt new ideas that will lead to breakthroughs even though a high-risk, high-reward project may be the only way.
3. **Early Majority** represents the next wave of adopters (34%). They are motivated by evolutionary changes, rather than revolutionary changes, where their larger group adopts the changes together and is willing to move along quickly.
4. **Late Majority** represent the next wave of adopters (34%). They trend to be more skeptical, traditional, looking for price sensitive, ready-to-go, bullet-proof solutions to staying competitive. They don't want to fall too far behind.
5. **Laggards** represent the last wave to adopt (16%). Yes, they are the skeptics who cherish the status quo and do not believe that the innovation is any good at all. They are likely to block movements toward changes in their areas.

When an entire organization, a company, a department, or even a plant-floor crew is expected to quickly adopt innovative maintenance and reliability methods, the degree of “individual innovativeness” can greatly influence the success and sustainability of the maintenance and reliability gains.

Individual innovativeness should be carefully considered when striving for sustainable breakthroughs in maintenance and reliability performance using any innovative change process or work methods. Identifying the Innovators and Early Adopters in your organization to lead maintenance and reliability innovations will be essential to your success. Seek them out. Engage them as both formal and informal leaders.

### **Advocates of Change**

In many cases, transforming an organization from highly reactive or repair-based maintenance to highly planned, preventive, and proactive maintenance represents a significant work culture change. John Kotter, in his book *Leading Change*, estimates that 85% of corporate and company culture change efforts fail. In Kotter's analysis of successful and unsuccessful company change, he identified four categories of people:

1. **Advocates:** those who strongly support the change process and push its implementation
2. **Incubators:** those who understand the innovation and the need to change but are waiting to see if it will stick
3. **Apathetics:** those who don't know much about the innovation or the change process and don't believe it has anything to do with them or their jobs
4. **Resisters:** those who will actively block the change efforts

What would happen if senior leadership chose a mix of Incubators, Apathetics, and even Resisters to lead the change efforts? Not a “snowball’s chance...” of succeeding. What if senior leadership ensured that those leading the innovations were all Advocates who were willing to walk the talk? There would likely be no limit to what they could accomplish.

You can see how leadership of any change effort can easily be influenced by the mindsets, attitudes, paradigms of those tasked with leading change in the organization. Maintenance and reliability innovation leaders must also be aware of the other personal change dynamics at work in their workplace and consciously approach change accordingly.

### **Leading Sustainable Change**

Creating major change can be a challenge for any size organization. But what would happen if the change was not successful? What if the desired results were not achieved and sustained? In many cases, sustainability of maintenance and reliability is a must for business success. After years studying hundreds of businesses’ change efforts, successes, and failures, John Kotter identified an Eight-Stage Process for Creating Major Change. Two crucial aspects of these eight stages are this: Change starts with a compelling reason to change from the status quo, and change builds on this compelling foundation one proven stage at a time to create lasting change.

1. **Establishing a sense of urgency:** a real compelling business case for change and not a threat
2. **Creating the guiding coalition:** a true team with enough formal and informal power to lead the change
3. **Developing a vision and strategy:** where are we going and how will we get there
4. **Communicating the change vision:** face-to-face vision sharing and walking the talk
5. **Empowering broad-based action:** get rid of obstacles, and take educated risks
6. **Generating short-term wins:** very visible, very fast, rewarded, recognized and celebrated
7. **Consolidating gains and producing more change:** leverage the “wins” for more paradigm-shifting change
8. **Anchoring the new approaches in the organization:** show results and successes due to changes in behaviors at all levels and ensure leaderships’ ability to sustain the behaviors

But caution is in order when looking at this list: Each stage is sequential and builds on the former stage. The following stage will not be successful if the preceding step is flawed or incomplete.

The Guiding Coalition in the case of maintenance and reliability improvement is of utmost importance: The maintenance organization alone can rarely lead and deliver sustainable gains in reliability. This coalition must include all of the leadership stakeholders in the business (operations, finance, maintenance, engineering, quality, safety, environmental, labor union, et al).

### **The Bottom Line for Sustaining Gains**

Gaining senior leadership buy-in is a prerequisite to sustainable change if you believe breakthrough changes in maintenance and reliability methods are essential to ensure your business success. Sustainable gains must be led from a business perspective by senior leadership with clear expectations and accountabilities through all levels of leadership down to the individual work groups and employees. Let’s make sure that improvements in maintenance and reliability are 1) not

an option and 2) are a condition of employment because there is a compelling case and a sense of urgency that our business success or growth depends on the results of the change efforts.

###

**Resources used in the preparation of this column:**

- Everett Rogers, *Diffusing Innovation*, 1962, 1971, 1983, 1995, 2003
- John Kotter, *Leading Change*, 1996 (and several *Harvard Business Review* articles on the subject)

© 2008  
Robert M. Williamson  
Strategic Work Systems, Inc.  
PO Box 70  
Columbus, NC 28722  
RobertMW2@cs.com