

Innovation insights

<http://www.psu.edu/president/pia/innovation/>

INNOVATION INSIGHT SERIES
NUMBER 10

Leading for Continuous Improvement

Executive Summary

This issue of Innovation Insights outlines the fundamentals of establishing and supporting teams to add value to the department or unit. It provides an overview of the role, responsibilities, and activities of the sponsor of an improvement team or initiative, especially in the initial stages of development and support of the team. It also addresses the roles of the team leader, team members, and facilitator, and provides guidelines and suggestions for implementing solutions and recognizing and documenting accomplishments. Finally, resources available at Penn State and one model for improvement are summarized.

Introduction

Continuous Quality Improvement (CQI) offers Penn State the opportunity to strengthen its three-fold mission of teaching, research, and service. CQI is both a philosophy and a set of guiding principles which represent the foundation of a continuously learning, developing, and improving organization, readily able to adapt to the changing needs of its constituents. The four hallmarks of Penn State's CQI effort are:

- a focus on service to stakeholders
- study of processes
- decisions based on data
- teamwork

Implementing CQI within an organization requires a significant ongoing effort on the part of all members throughout the organization. Leadership at all levels and within all units of the University is essential to sustain this effort and realize the many benefits of a long-term commitment to creating a quality culture. CQI is not an end in itself, but a means to develop the organization into a fully integrated system. Data collected in identifying areas for improvement support assessment initiatives and development of strategic plans. Development of a culture for improvement and assessment supports the execution of strategic plans.

CQI uses teamwork to accomplish its improvements. Working through teams brings a shared expertise and understanding of University systems and a mutual commitment to ongoing improvement. Empowering team members to identify improvements enhances the opportunity for professional development and accomplishment. In the words of one CQI team member, "The greatest aspect of the team was working with many different people from other backgrounds: the multicultural and multidisciplinary nature of the team."

But teams require leadership and support. As Peter Scholtes says in "Teams in the Age of Systems", "It's not hard to establish a lot of teams, just as it's not hard to plant a lot of seeds in a garden. The hard work of gardening and setting up teams is tending to them, nurturing them, supporting them, and preparing to process what they produce. Such direction, focus, challenge, support, and caretaking must come from leaders. It's part of the leader's new job."

Leading teams is an ongoing process requiring effort, commitment, and resources. However, it is an investment which can provide returns to both the department or unit and the individuals involved.

Sponsoring an Improvement Team or Initiative

Serving as the sponsor of an improvement team or initiative provides an opportunity to move into a coaching role to facilitate the growth of the unit and the professional development of the team members. Developing and implementing improvements, using Penn State's IMPROVE model or another model, gives a leader and manager the opportunity to find ways to more effectively use all resources - human, financial, information, and physical - while at the same time providing an opportunity for unit members to use and further develop their expertise in job-related functions, problem solving, and interpersonal skills. Implementing CQI allows those providing a service to improve that service when they see opportunities or needs, moving related decision making downward. It also helps them in developing their skills to recognize those opportunities and needs for improvement. Sponsors, administrators, directors, and senior managers provide teams with the guidance needed to achieve successful outcomes as they improve processes. Through this support and guidance, a sponsor can foster collaboration and strengthen people, facilitating long-term development of the organization as well as shorter term process improvement.

The process a team seeks to improve may be identified by the sponsor, by a team member, or another stakeholder. The team sponsor manages and allocates the resources involved in the process to be improved, and is the one with the authority to implement team solutions. A sponsor's activities fall into four major phases or stages:

- initiating the improvement of a process
- supporting the team
- implementing the team's solutions
- recognizing the team's accomplishments

Responsibilities of a sponsor may include:

- identification of critical processes and review of evaluation criteria
- identification of team members (often with the team leader)
- guiding the team to determine whether incremental improvement or reengineering should be considered
- defining constraints and available resources for the team
- communicating regularly with the team leader
- providing support and information to team members
- removing constraints and barriers to team efforts
- signing off at each step of the process or providing the team with additional guidance to reach sign off
- reviewing solutions from the team
- implementing solutions
- recognizing the team's accomplishments

Initiating Improvement of a Process

In the first phase, initiating the improvement of a process, actions of the sponsor include:

- identifying critical processes in the unit
- selecting a team leader
- identifying a team facilitator
- selecting team members (possibly with input from the team leader)
- issuing a charter/charge to the team
- defining parameters/criteria/constraints/limitations for the team's work

While there is no required order for completing these actions, generally the first stage will involve identifying a critical process to be improved, and determining whether a team would be an effective way to approach the improvement effort. Clarification of the charge, of criteria for the improvement, of constraints on the process, and identification of all team members may involve collaboration among the sponsor, team leader, team members, and team facilitator.

Identifying a Critical Process

As the one responsible for managing resources - funding, facilities, and personnel - a sponsor makes a significant commitment to the improvement process and wants to ensure that this investment is worthwhile. One way to do this is to focus on improving critical processes - those which are key to the mission, products, or services of the unit. What processes relate directly to customer or constituent needs, service and satisfaction? The issue for analysis and improvement needs to be carefully selected. Considerations include:

- organizational values
- all stakeholders - their needs and requirements
- unit vision
 - * stretch goals and breakthrough items
 - * alignment with organizational mission, vision, and goals
- unit key processes
 - * available process data
 - * possible evaluation criteria
 - * fit within the organizational system
- scope of the process - is it manageable?

Especially for the first improvement initiative in a unit, it is important that the effort have a high probability of success and be able to be completed in a relatively short time (four to six months).

The Office of Planning and Institutional Assessment can provide consultation services to clarify direction and expectations as critical processes are reviewed.

When to Use Teams

Before a team is charged to work on a critical process, it is useful to consider whether a team is the most effective way to address the issue. Teams are not always the answer, and, yes, there may be situations where it is better to use a working group, or no team at all. Teams should not be used for tasks that are simple or obvious, require the input of only one person or a group of individuals, or when a desired solution is in mind. It is appropriate to use teams to address complex tasks, those which exceed the ability of any one individual, or those which require contributions involving a variety of skills, knowledge areas, or perspective.

Peter Scholtes, in "Teams in the Age of Systems", provides a list of questions to consider when planning to establish and charge a team:

- Is the issue simple or complex? (Complex issues often require teamwork, and inputs from multiple perspectives.)
- Does the issue require a specific area of expertise or several experts from multiple disciplines? (The need for multiple areas of expertise warrants the use of a team.)
- Can it be completed quickly or will it take a longer time? (A team with more members will provide more continuity and "team memory" over time.)
- Does the issue involve a single function or is it cross-functional? (The team should reflect all functional areas if the process crosses functions.)
- Is the issue controversial? (Include potential dissenters on the team to address their concerns and increase the likelihood of their supporting the team's actions.)
- Will the implementation be easy or complex? (Implementers will have a better understanding of the change and the reasoning behind it if they are part of the team developing the solutions.)

Using teams can also support the professional development of team members. As R. Roosevelt Thomas, Jr. points out in *Redefining Diversity*, as an organization becomes more diverse and more complex, working in teams is one way to develop the new skills individuals need to contribute most effectively to the changing organization.

Selecting the Team Leader

Since team members come together to share their expertise and knowledge of the process under consideration, the team leader's role is to function primarily as a coordinator, not a decision maker. However, the team leader should be familiar with the process, and its stakeholders. He or she should be able to draw information from all team members throughout the improvement process, manage scheduling and record keeping within the team, and maintain communications and a working relationship with the sponsor(s). The team leader may also play a key role in selecting the other members of the team. The team leader's role includes:

- serving as the primary communication link between the sponsor and the team
- coordinating team logistics
- planning and evaluating team meetings with the team facilitator
- keeping official records of team activities
- providing access to any information the team needs regarding process improvement
- bridging to each next step in the improvement process

If the team leader supervises team members in their normal work activities, he or she needs to put that role aside during the team activities to allow for open communications without fear of reprisal.

Identifying the Team Facilitator

The Office of Planning and Institutional Assessment can identify an appropriate facilitator who is familiar with the IMPROVE model if an external facilitator is desired. He or she works with the team and guides them through the improvement process while at the same time maintaining a neutral position regarding the team's specific recommendations. The team facilitator:

- assists the team leader in planning team activities and evaluating team meetings
- coaches the team in use of the improvement model and appropriate analytical tools
- facilitates productive group dynamics
- brings in outside advisers as necessary
- serves as a neutral third party to maintain the team's focus

Selecting the Team Members

The team should be composed of those people who are most familiar with the process being improved, and willing to invest time and energy in improvement efforts. Team members should be ready, willing, and able to:

- participate fully in team meetings
- complete assignments in preparation for team meetings
- make decisions based on facts and data
- maintain an open mind when considering alternatives for process improvements
- commit to the philosophy of process improvement
- follow the ground rules set by the team

In selecting those who will be on the team, look for those who are:

- involved in the process being addressed
- committed to the process
- interdependent on each other
- interested in improvement

- motivated to be on the team
- knowledgeable about the process
- and who, as a team, are involved with the entire process from beginning to end

Chartering/Charging the Team

The team charter or charge is a brief document that defines the team's task for all involved, and provides additional information on limits and resources available. The sponsor may want to develop the charter with the team and team leader, with input from key stakeholders, to ensure that all agree on the issue, responsibilities, authority, and time frame.

Items to address in the charter include:

- identification and clear definition of the process to be studied
- identification of the team sponsor, team leader, and team members
- general expectations for team results (e.g., recommendations, a streamlined process, measurable improvements in the process)
- resource constraints for the team's work
- time constraints for the team's work, and expected completion date
- planned communications between the sponsor and the team

As Peter Scholtes points out in "Teams in the Age of Systems", no team is entirely autonomous or entirely advisory; but both the team and the sponsor should be clear where these lines are drawn. Lack of regular communication between sponsor and team can lead to unrecognized divergence from expected final products, and wasted resources in final recommendations which cannot be implemented.

Cross-Unit Teams

If the team is a cross-functional or cross-unit team, there will be additional up-front activities to lay the ground work, identify multiple sponsors, and reach agreement on shared objectives, outcomes, and constraints. Multiple sponsors with differing expectations, unclear charges, or unstated constraints can lead to frustrated, unproductive teams.

Constraints

Most sponsors impose some limitations or boundaries on the solutions or recommendations the teams can suggest. A team needs to be told at the beginning of the improvement process of any constraints or limitations related to:

- funding
- hiring
- time
- space and facilities
- sensitive issues and areas
- possible solutions that the sponsor views as not realistic

and the team needs to be kept up to date about changes in these areas which occur while they are working.

Time is a key factor in continuous improvement, and needs to be addressed very deliberately at the start of the improvement process. Teamwork takes time, and both the sponsor and the team members need to recognize and acknowledge this. Team members need to understand and be assured that the time they spend working on team-related improvement efforts, whether in team meetings or outside of the meetings, is valued, and is as important as their "regular" work. Their success will be measured not in how quickly they can identify improvements, but in the quality of the solutions.

Initial Team Training

The amount and type of training the team needs, and how it is scheduled, will be determined by the experience of the team leader and team members, complexity of the issue, and projected time to complete the project. The Office of Planning and Institutional Assessment can schedule team training for all members of the team to ensure clarity about roles, responsibilities, and the team charter, and to become familiar with an improvement approach. This training can be scheduled in a half-day format. Alternatively, it can be incorporated into the team's first meetings. Sponsors usually attend at least part of the team training.

Team Database

The Office of Planning and Institutional Assessment maintains an on-line database of innovation and improvement teams at Penn State. Teams are encouraged to add themselves to this database when they start, and update their information as they progress. The database can be accessed from the Office of Planning and Institutional Assessment's web site at <http://www.psu.edu/president/pia/database/index.htm>.

Supporting the Team

While sponsors do not attend regular team meetings, they do play a critical role in supporting the team. The sponsor should continually ask him or herself: "What can I do to maximize my support for the team as they develop and work?"

As the team progresses through a structured approach, a sponsor's primary tasks are: 1) to sign off on each step, as the team reports findings and plans the next step; or 2) to provide them with additional guidance when the sponsor cannot sign off on a step. The key role is to provide coaching and counseling, support and encouragement to ensure that the team's work is an effective use of resources - time, personnel, and funds. It is important to communicate regularly with the team leader about the team's progress. The teams are exploring new ground, broadening their perspective as they learn from each other's expertise, and developing solutions that fit within the parameters provided. Through regular communications with the team leader, the sponsor can provide additional information and support in a timely manner.

Team Development

The four stages of group development - form, storm, norm, perform (Tuckman 1965) - are well known. Once a team is formed, it progresses through these stages, albeit at its own pace. If development progresses smoothly, members grow from a group with multiple individual agendas to a team with shared goals and identity. Part of the role of the sponsor is to monitor the group's progress in development as a team, and provide assistance when progress is not smooth.

How can a sponsor nurture a group so that it develops into a fully functioning team? James Kouzes and Barry Posner, in *The Leadership Challenge*, suggest several guidelines.

Foster collaboration - promote cooperative goals and build trust among all involved.

- Use "we" rather than "I".
- Increase interpersonal interactions within your unit and with other units.
- Focus on gains, not losses.
- Include others in planning and problem-solving.
- Go first - set the example and take risks.

Strengthen people - give power away, provide choice to those enabled, provide them a means to develop their competence, assign them significant responsibilities, and offer them visible support.

- Move decision making to the lowest level possible.
- Make sure delegated tasks are relevant.
- Train and educate.
- Share information.

- Assist followers in networking.
- Publicize followers' accomplishments.

In addition, the sponsor should be consistent in actions and words, making sure that daily actions provide the team the support they need.

- Monitor the team's progress.
- Communicate with the team leader on a regular basis.
- Act as consultant/coach - help resolve problems that may be slowing the team.
- Motivate and encourage the team.
- Protect the team's time.
- Track the team's paperwork.
- Sign off on status reports and feedback - in a timely manner.
- Provide guidance in prioritizing possible solutions.
- Provide the team with access to information and personnel to research their issue.
- Keep the team leader informed about changes in management direction or available resources.
- Approve additions and deletions to the team membership as they are requested by the team.
- Discuss results of each step in the improvement model with the team leader; if unable to sign off, explain the reason, clarify what is necessary to achieve sign off, look for win-win, collaborative resolution of each issue.

External support and training for the team is available through the Office of Planning and Institutional Assessment. CQI services include 'just-in-time' tools training specifically tailored to a team's requirements and schedule. Consultation services are also available for the team leader, facilitator, sponsor, and/or the entire team, whichever is most effective.

Implementing Team Solutions

As the sponsor and the team develop a plan to translate recommendations into actions, implementing solutions may be the most difficult step. It's important to remember that this step represents another occasion to enable others and provide them an opportunity for growth and development. The team has a hands-on chance to learn about the planning process - identifying action items, individuals responsible for completing them, and target dates for accomplishment. Actions at this stage include:

- reviewing the team's final report
- implementing all approved solutions in a timely manner
- calling the team back together if problems in implementation occur (if the original team is not the group implementing the solutions)
- identifying future improvement opportunities

Team Report

The team report is an important way to document team accomplishments and share results so that others may benefit. It briefly describes the process under study, identifies the customer(s) and customer concerns, presents the issue statement, lists tools used, and describes solutions and implementation plans. Reports are tailored to the specifics of each team and the process improved, but key elements include:

- identifying information: college or unit sponsoring the team, team name, names of team sponsor, leader, members, and facilitator, when the team was formed
- team charge and constraints: the critical process under study, requirements for the solution, job titles or other indicators of the relationship of team members to the critical process
- initial research: identification of the customer and summary of the customer needs/satisfaction data gathered
- issue statement written and performance measure(s) identified
- map of the process

- root causes identified
- solutions identified and implementation plans
- tools appropriate to the process and/or approach
- contacts for additional information

One way of sharing these accomplishments is by ensuring that information about the team, from their start, through recommendations, implementation, and measures of improvements, is included in the Office of Planning and Institutional Assessment's on-line team database.

Recognizing Team Accomplishments

Finally, it is important to recognize the team for their accomplishments. While completion of the improvement process will in all likelihood give the team a sense of satisfaction, sharing their results publicly will reinforce the significance. Some of the ways the team can be recognized are:

- publicly acknowledge the team's accomplishments - in staff meetings, newsletters, bulletin boards or other available vehicles
- share the team's successes both inside and outside the department
- reward the team's efforts – through letters of recognition which can be included in performance appraisals, certificates, lunches, or other celebrations

The Provost and the Office of Planning and Institutional Assessment also recognize the accomplishments of innovation and improvement teams annually, through Quality Expos, Quality Issue Forums, or other appropriate university-wide means.

Lessons Learned

Experience with Penn State's improvement efforts has led to the following suggestions.

- Start small with a process that people care about improving.
- Relate process improvement initiatives to the unit's strategic planning goals.
- Be patient - the first team will need time to learn how to work together as a team and learn the CQI tools. Subsequent team efforts will probably take less time.
- Be realistic and clear with the team about constraints. If they operate within the constraints, be prepared and willing to implement their solutions.
- Communicate - teams with multiple sponsors can be dysfunctional if sponsors don't communicate regularly and haven't reached agreement on goals and outcomes.
- Don't underestimate the value of a neutral facilitator from outside the unit. Often team leaders, although well intended, are too closely tied to the process to see opportunities for change.
- When choosing a team leader, look for someone who is foremost a good listener and has the ability to keep the playing field level.

Resources at Penn State

The Office of Planning and Institutional Assessment can:

- identify a team facilitator
- schedule team training
- and provide
 - o consulting services
 - o facilitator training
 - o 'just-in-time' tools training

The Office of Planning and Institutional Assessment also maintains a library of CQI and leadership and management resources, in printed, audio, and video formats, which are available at any time.

For more information, visit our web site at <http://www.psu.edu/president/pia/> or call 814-863-8721.

The Penn State IMPROVE Model

The Penn State IMPROVE model provides a systematic approach for studying and improving specific work processes. The model typically is used by a Continuous Quality Improvement (CQI) team composed of seven to nine individuals who work most closely with that process and understand its operation.

The Penn State IMPROVE model evolved from the combined experiences of team members and CQI trainers in structured problem solving. It is meant to be a guide for CQI teams. Through experience we have learned the value and importance of flexibility, and teams are encouraged to use their best judgment in adapting the model to their needs.

PENN STATE'S IMPROVE MODEL

- I** - Identify and Select Process for Improvement
- M** - Map the Critical Process
- P** - Prepare Analysis of Process Performance
- R** - Research and Develop Possible Solutions
- O** - Organize and Implement Improvements
- V** - Verify and Document Results
- E** - Evaluate and Plan for Continuous Improvement

© 1994 The Pennsylvania State University

This model has been developed by and cannot be used or reproduced without permission of the Office of Planning and Institutional Assessment, Penn State University.

Additional information on the IMPROVE model can be found in the Office of Planning and Institutional Assessment's Innovation Insights #7, "A Structured Approach to Organizational IMPROVEMENT."

Additional Information and References

- Burton, Terence T. and John W. Moran, *The Future Focused Organization*, Prentice Hall PTR, Englewood Cliffs, NJ, 1995.
- Donnellon, Anne, *Team Talk*, Harvard Business School Press, Boston, MA, 1996.
- Katzenbach, Jon R. and Douglas K. Smith, "The Discipline of Teams", *Harvard Business Review*, March-April 1993, pp. 111-120.
- Kouzes, James M. and Barry Z. Posner, *The Leadership Challenge*, Jossey-Bass, San Francisco, CA, 1995.
- Maddux, Robert B., *Team Building: An Exercise in Leadership*, Crisp Publications, Inc., Menlo Park, CA, 1992.
- Parker, Glenn M., *Cross-Functional Teams*, Jossey-Bass, San Francisco, CA, 1994.
- Pokras, Sandy, *Rapid Team Deployment: Building High-Performance Project Teams*, Crisp Publications, Inc., Menlo Park, CA, 1995.
- Rees, Fran, *How to Lead Work Teams: Facilitation Skills*, Pfeiffer and Company, San Diego, CA, 1991.
- Schein, Edgar H., *Organizational Culture and Leadership*, Jossey-Bass, San Francisco, CA, 1985.
- Scholtes, Peter R., "Teams in the Age of Systems", *Quality Progress*, December 1995, pp. 51-59.
- Thomas, R. Roosevelt, Jr., *Redefining Diversity*, American Management Association, New York, NY, 1996.
- Tuckman, Bruce, "Development Sequence in Small Groups," *Psychological Bulletin*, 1965.

This information was originally published as a separate brochure, "Leading for Continuous Improvement," in 1997 and first reissued in 1999. It is now being republished in 2005 to integrate it into the Office of Planning and Institutional Assessment's Innovation Insight series.

For more information, contact the Office of Planning and Institutional Assessment at 814-863-8721 or psupia@psu.edu, or visit our website: <http://www.psu.edu/president/pia>.

The services of the Office of Planning and Institutional Assessment are provided free of charge to The Pennsylvania State University and are adapted to the specific needs of departments or individuals.