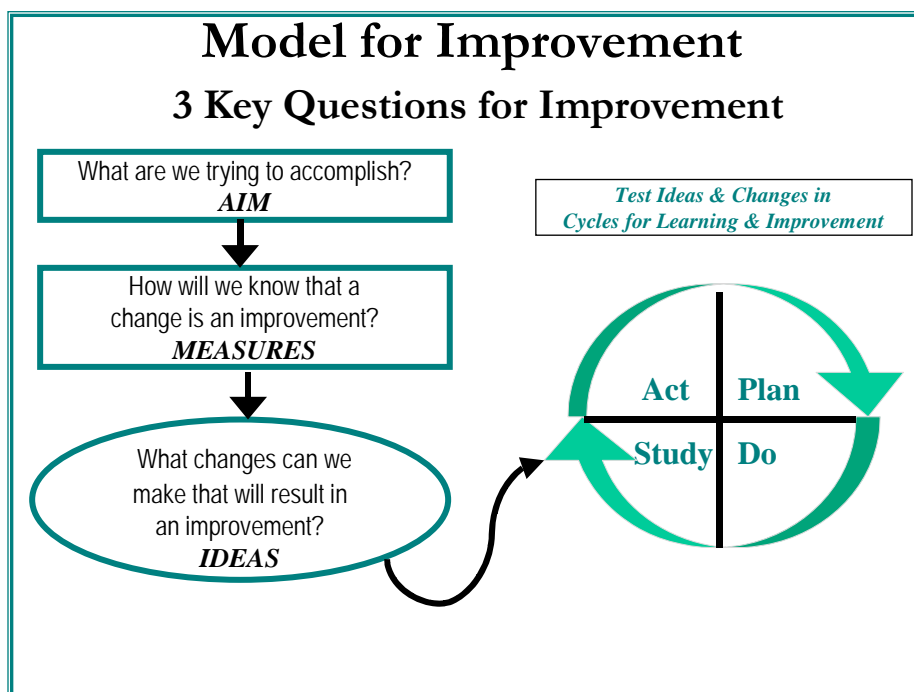


## The Model for Improvement Key Points

<i>Why A Model? What Purpose?</i>	<i>Improvement Principles</i>
<ul style="list-style-type: none"> <li>▪ Provide organizing structure to guide thinking</li> <li>▪ Ensure discipline and thoughtfulness</li> <li>▪ Support improvement principles</li> <li>▪ Facilitate improvement</li> <li>▪ Foster common language</li> </ul>	<ul style="list-style-type: none"> <li>▪ Listen to customers</li> <li>▪ Tap knowledge of the system and people in it</li> <li>▪ Understand processes and interactions in system</li> <li>▪ Use disciplined method in successive cycles to test changes</li> <li>▪ Test on small scale; move rapidly to improve</li> <li>▪ Measure to learn and to understand variation</li> </ul>



### Question 1: What are we trying to accomplish?

**AIM:** A specific, measurable, time-sensitive statement of expected results of an improvement process.

A strong clear aim gives necessary direction to improvement efforts, and is characterized as:

- Intentional, deliberate, planned.
- Unambiguous, specific, concrete.
- Aligned with other organizational goals or strategic initiatives.
- Agreed upon and supported by those involved in the improvement and leaders.

**Make your aim actionable and useful. Include:**

- A general description of aim - should answer, “What are we trying to accomplish?”
- Rationale/importance
- Some guidance for carrying out the work
- Specify target population and time period
- Measurable goals

**Question 2: How will we know that a change is an improvement?**

**MEASURES:** Measures are indicators of change. To answer this key question (“How will we know that a change is an improvement”), several measures are usually required. These measures can also be used to monitor a system’s performance over time.

In improvement, project measures should:

- Clarify and be directly linked to aims and goals
- Seek usefulness over perfection.
- Be integrated into daily work whenever possible.
- Be graphically and visibly displayed, usually as run charts.

*Note these system or project measures are not the same as the “study” measures for PDSA cycles described below.*

**Question 3: What changes can we make that will result in an improvement?**

**IDEAS:** Ideas for change or **change concepts** to be tested in a P-D-S-A cycles can be derived from:

- Evidence - results of research / science
- Critical thinking or observation of the current system
- Creative thinking and extrapolations from other situations

When selecting ideas to test, consider the following:

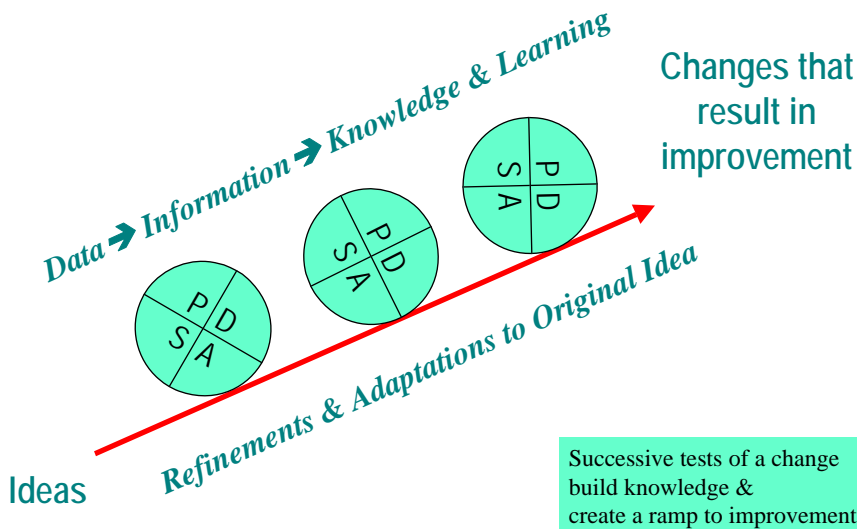
- Direct link to the aim
- Likely impact of the change (Avoid low-impact changes.)
- Potential for learning
- Feasibility
- Logical sequencing
- Series of tests that will build on one another
- Scale of the test (e.g., 3 times NOT 30)
- Shortness of the cycle (1 week NOT 1 month)

**Tips to make the most of PDSA cycles and tests of change:**

- ✓ Always document the questions you want to address and make a prediction prior to doing a PDSA
- ✓ Scale down size of test (e.g., # of people involved)....A “cycle of 1”
- ✓ Do more cycles, at a smaller scale and faster pace instead of fewer, bigger, slower
- ✓ Test with volunteers or “friendly audience” first
- ✓ Don’t need to seek buy-in or consensus for the test – particularly early on
- ✓ Collect useful (and only just enough) data during each test

- ✓ Test over a wide range of conditions prior to implementation
- ✓ Think a couple of cycles ahead -- plan multiple cycles to test and adapt change
- ✓ Learn from failures as well as successes
- ✓ For "failed" tests (prediction not confirmed), ask these questions:
  - Was test conducted well?
  - Does the change tested need modification in our setting?
  - Were measures sufficient to detect improvement?
  - Was prediction/theory wrong?
- ✓ Engage leadership support when implementing

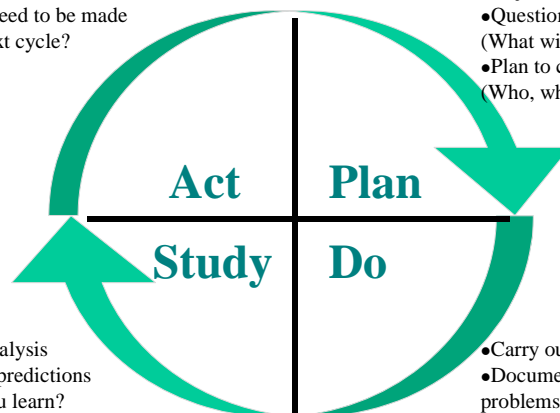
## Repeated PDSA Cycles To Test A Change



## Test Ideas & Changes in Cycles for Learning & Improvement

- What refinements or modifications need to be made
- What's the next cycle?

- Objective
- Questions& predictions (What will happen & why)
- Plan to carry out the cycle (Who, what, where, when)



- Complete analysis
- Compare to predictions
- What did you learn?
- What conclusions can you draw from this test?

- Carry out the plan
- Document experience, problems, surprises
- Collect data as planned; begin analysis