Linda M Cook Bio

- Lean/Agile Coach at Fortune 500 Companies, focused in Financial Services Sector
- Certified Scrum Master 2003
- Advanced Scrum Master 2005
- Lean Six Sigma 2007 @ Villanova University

Applying Lean Techniques in the Office - Learning To See Waste

Agenda

- Lean – whadda ya mean?
- Waste – what is it?
- Lean Principles
- Lean Practices
- Learn to see WASTE
- Toast Kaizen Video & Exercise
- More on WASTE
- Problem Solving using the 5 Why's

Define Lean

- Lean means elimination of waste
- Lean creates process speed by eliminating waste
- Lean improves efficiency quality by eliminating waste (minimizing time, capital invested, and cost)
- Lean = continuous improvement

Waste – What is it?

- Any process, machine, product that does not create value for the customer
- MUDA – Japanese term for waste
- Why bother – it is estimated that 90% of all activity is waste

Reasons Why Services are Full of Waste

- Service processes are usually slow process
  - Slow processes are prone to poor quality
  - Cost of Slow processes = 50% waste
- Processes are slow because there is too much work in progress (WIP)
  - Items in progress can spend 90% of their time waiting for the next step
  - Drives cost up
- Slow processes tend to have 80% of the delays caused by 20% of the processes

Seven Simple Rules/Principles

- **Eliminate Waste**: spend time only on what adds real customer value
- **Amplify Learning**: When you have tough problems, increase feedback
- **Decide as late as possible**: Deliver value to customers as soon as they ask for it
- **Deliver as fast as possible**: Deliver value to customers as soon as they ask for it
- **Empower the team**: Let the people who add value use their full potential
- **Build integrity in**: Don’t try to tack on integrity after the fact – build it in
- **See the whole**: Beware of the temptation to optimize parts at the expense of the whole

Waste – How to see it

- Learn to see waste
- Learn to see your job as a process or set of processes
  - Look at the product and follow the path from the inception/request to /delivery fulfillment
- Look at the entire system first
- Map the process to find how it operates today (really operates not how you think it operates) and look for wasted time and efforts
- Start by removing excess inventory (supplies)

Kaizen

- Japanese word that means to make small changes for the better
  - Kai means change
  - Zen means good
- Changes are best when they are created by the person doing the work
- The person doing the work uses their own common sense and intuition

Eight Wastes of Manufacturing

- Inventories
- Over Processing
- Overproduction
- Transport
- Waiting
- Motion
- Defects
- Underutilization of Employees

Note: Seven Wastes defined by Taiichi Ohno, eighth waste term coined by Ben Chavis, Jr.

Eight Wastes of Software Development

- Partially Done Work
- Extra Processes
- Extra Features
- Task Switching
- Waiting
- Motion
- Defects
- Underutilization of Employees

Note: Seven Wastes of SD defined by Mary Poppendieck

Video

TOAST KAIZEN

- Narrated by Bruce Hamilton, 2006 Shingo Price Recipient and President of GBMP
- Produced in 2007 by the Greater Boston Manufacturing Partnership

Watch closely and look for examples of waste.

Waste Questions

- Do you agree that this ‘waste’ is really waste? Why or why not?
- Whether or not you agree that the item is a waste, estimate how much time it consumes in an average week.
- What can or should be done to reduce that time?

Ask Yourself

- What is slowing you down or getting in the way of doing a good job?
- What would help things move faster, better, cheaper?

Exercise

- List your top 5 activities
- Rate them from a customer perspective on a scale of 1 – 5 (low – hi)
- Think of low scoring items as waste
- Take the lowest scoring item and plan to cut the time in half

Problem Solving Step One

- When you encounter a problem –stop and fix the problem first, then return to your regular activity.
- Never pass the defect or problem along to the next step in the process, or the next person in the workflow.

Sphere of Influence

- Lean principle break down barriers
  - Understand Lean thinking
  - Create a coalition (like minded folks)
  - In the face of resistance, address the fear
  - Accommodate with minimal waste
  - In the face of indifference, get started

Lean Practice - Discipline of the 5's

- **Sort** (when in doubt, throw it out)
- **Straighten** (labeling, color coding, filing)
- **Shine** (keep cleaning supplies handy, replace worn, torn, items not working)
- **Standardize** (create layouts, write checklists)
- **Sustain** (create a new work habit, check it regularly – at least once a week)

Problem Solve using the 5 Why's

When you identify a problem/bug/bottleneck, ask why 5 times to get to the root cause of the problem, then correct the problem.

Example: Defect found in testing

- Why the defect happened/exists
- Why the new problem caused the defect
- Why wasn't it tested
- Why was there time pressure
- Why someone thought the time pressure was necessary

References

Lean Software Development: An Agile Toolkit, Mary and Tom Poppendieck, 2003, Addison Wesley

Toast Kaizen: video, by Bruce Hamilton, produced by Greater Boston Manufacturing Partnership, 2007, www.gbmp.org

Toyota Production System: by Taiichi Ohno

Lean Six Sigma for Services: by Michael George, 2003, McGraw-Hill

Lean Thinking: by James P. Womack and Daniel Jones, 2003, Simon and Schuster

Learning To See Waste

Thank you!

Linda Cook
Project.cooks@att.net