

# The Toyota Way to Lean Leadership:

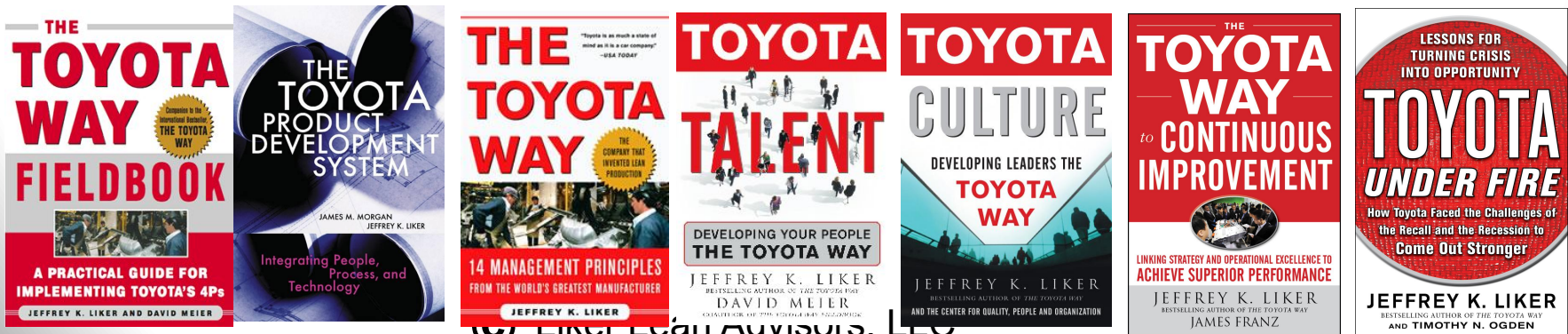
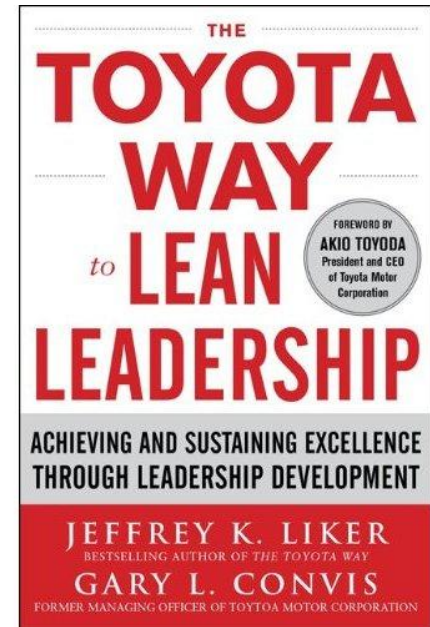
## Leading the Way to Continuous Improvement

*Jeffrey K. Liker*

Professor, Industrial and Operations Engineering  
The University of Michigan

Newest

*Briefings Media Group Webinar  
Moscow, Russia  
February 16, 2012*



# Agenda

- History and Background of Toyota and I
- TPS, The Toyota Way and Driving toward a Vision
- How do you Drive to the Vision?
- How do you Develop People with the Skills and Motivation Aligned toward the Vision?

# History and Background of Toyota and I



Master-Apprentice Craft Model



Striving for Perfection

# How I got here

- Boris and Lucy Liekara born in Kiev to a wealthy family
- Bolshivaks took their money... but some was hidden
- 1919-money used to smuggle out Boris and Lucy
- Lucy, pregnant with my dad, was accepted in the U.S.—she was a nurse (U.S. wrote down name “Liker”)
- Boris, a barber, had to go on to Cuba
- Lucy put my dad in foster care and went to Cuba
- All were reunited, struggled through the Great Depression in NYC, where my father met my mother, and all lived happily ever after.

# What allowed this success story to happen?

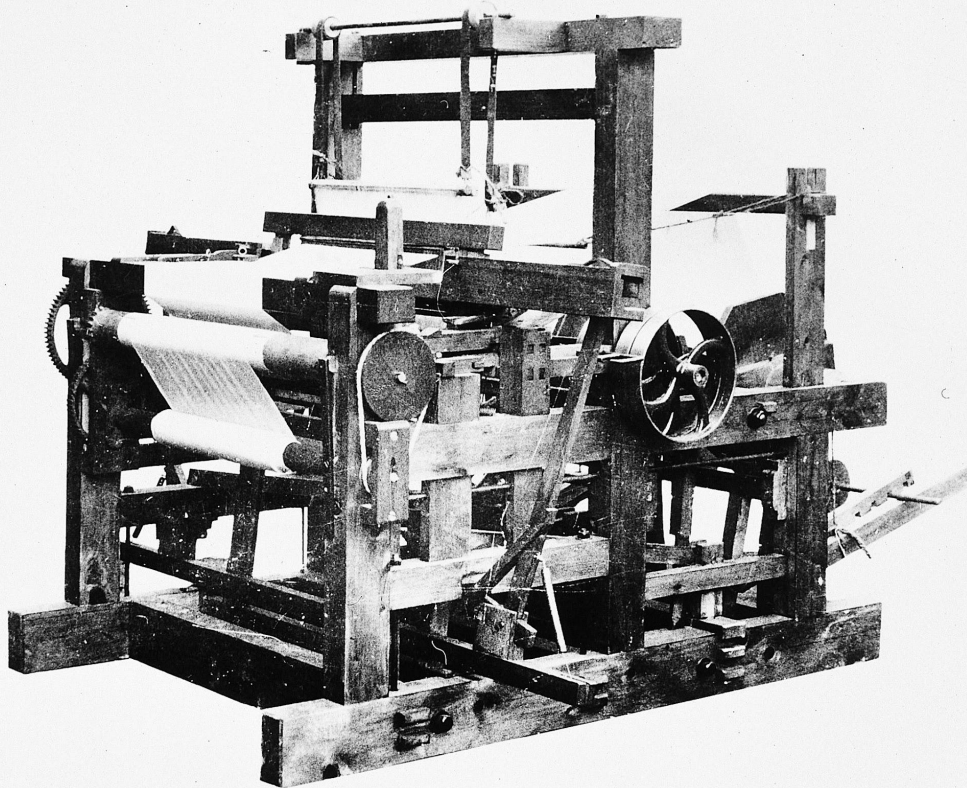
- Vision of a better future
- Planning
- Family members sacrificing for the family
- Incredible focus
- Aligned interests
- Determination and toughness
- Adaptive Problem solving

... Same characteristics made Toyota a great company!

## The Vision and Company Value of Toyota Started with its Founders

**“King of Inventors” in Japan inventing new kinds of looms  
(contribute to society, customer first/company second, respect for people,  
know your business, get your hands dirty, hard work, discipline, teamwork,  
and always innovation)**

Favorite Book: Samuel Smiles, Self-Help



Sakichi  
Toyoda

## Kiichiro Toyoda: A Seminal Speech

Kiichiro Toyoda announced at the opening of a Toyota Motor Company factory: *“I plan to cut down on the slack time in our work processes....* As the basic principle in realizing this, I will uphold the ‘Just in time’ approach.”

1937 - founded Toyota Motor Co.



**Kiichiro Toyoda**  
**Founder of Toyota Motors**

# Taiichi Ohno: A Manufacturing Genius

Taiichi Ohno and his team accepted Kiichiro Toyoda's Challenge by laboring non-stop to develop the Toyota Production System...through adaptive problem solving.

1950's Toyota Production System Started

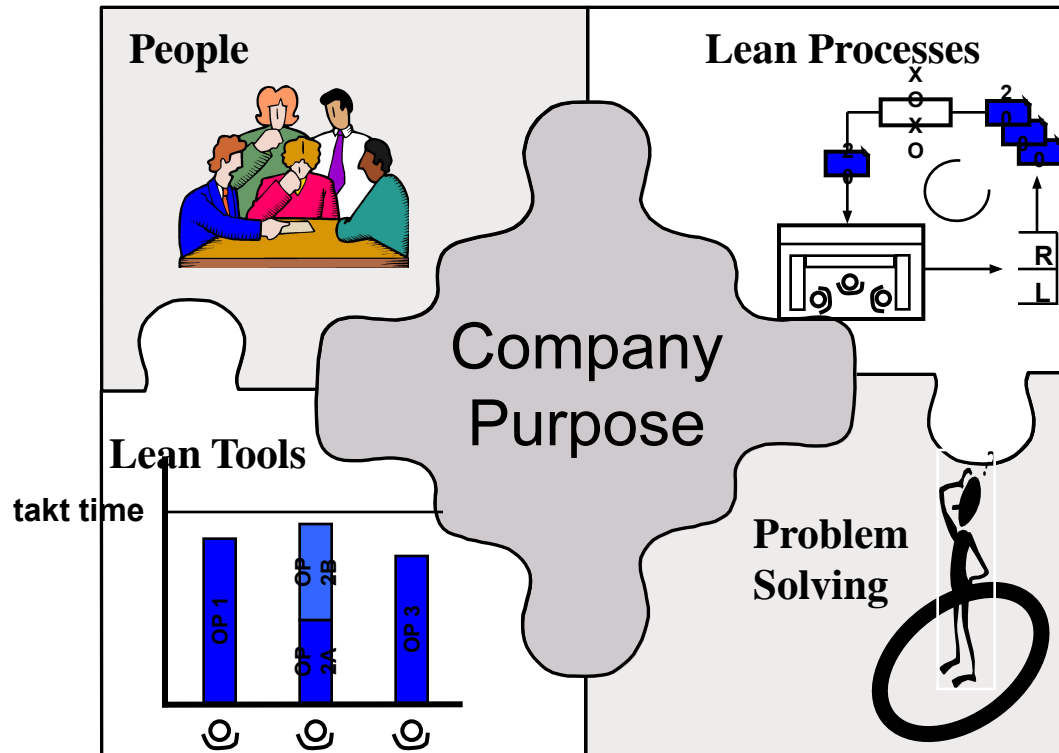
2012 Still developing



**Taiichi Ohno**



# TPS, The Toyota Way, and Driving toward a Vision



# The Origin of TPS Philosophy

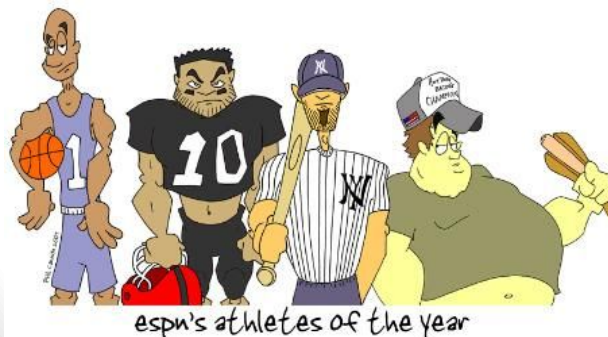
- We protect our own castle:
  - \* Products that consumers trust will sell
  - \* A company should operate with no-debt  
(Even a penny should not be spent if not necessary)
  - \* Continuous cost reduction is the only way  
for survival
  - \* Meeting challenges will make us stronger (catch up  
to Ford in productivity)

Eventually it was Written Down:  
*The Toyota Production System House*



# “Lean” (based on TPS) Launched a Global Movement

- Do more with less
- Healthy
- Agile
- Survivability
- Adaptable

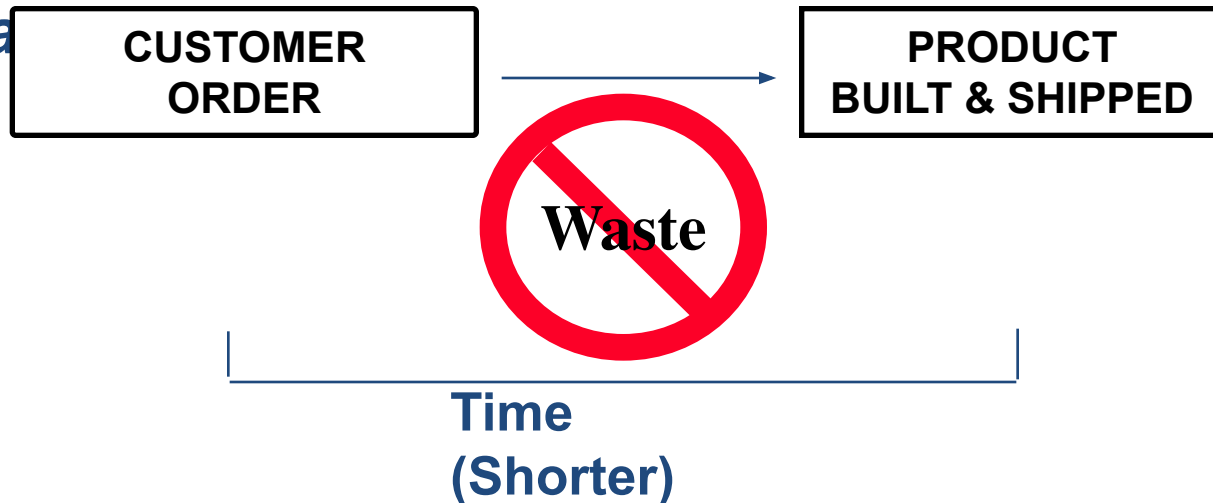


Half the Time, Labor, and Inventory  
1984

# BUT IT WAS OFTEN REDUCED TO A WASTE REDUCTION TOOL KIT

Shorten the time between the customer order and the product build / shipment by eliminating *waste* of waste.

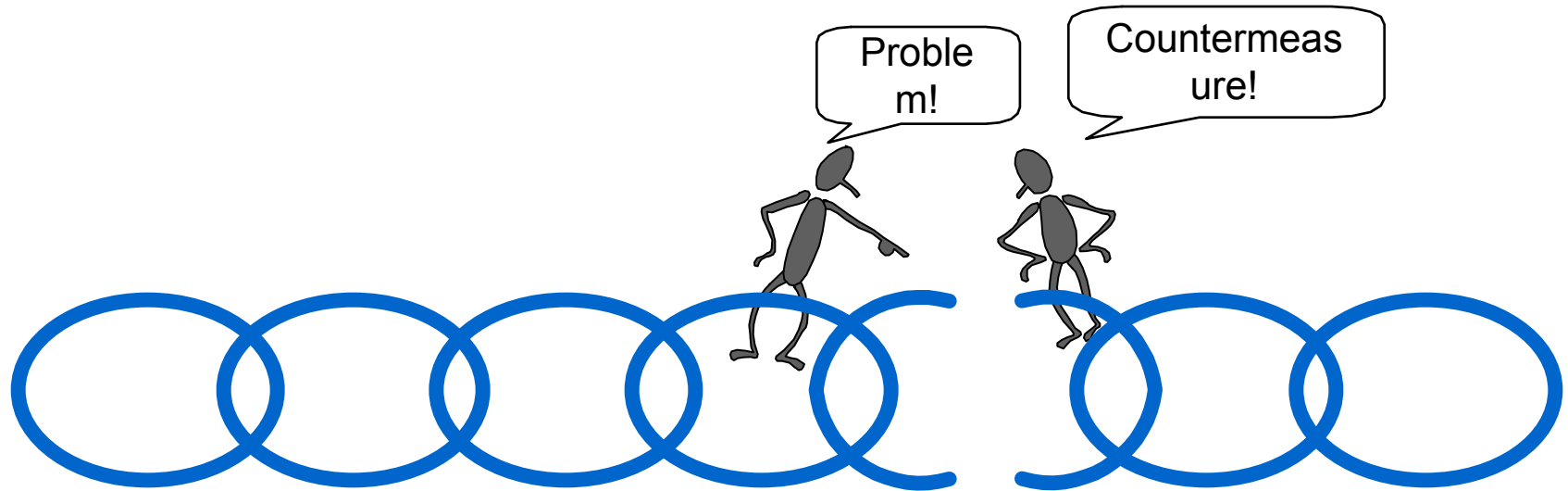
*Lean  
Manufa*



# *The Real Genius of TPS*

Tightly linked processes

Problems cannot hide



Source: Glen Uminger, Toyota Motor Manufacturing North America

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# What is real TPS?

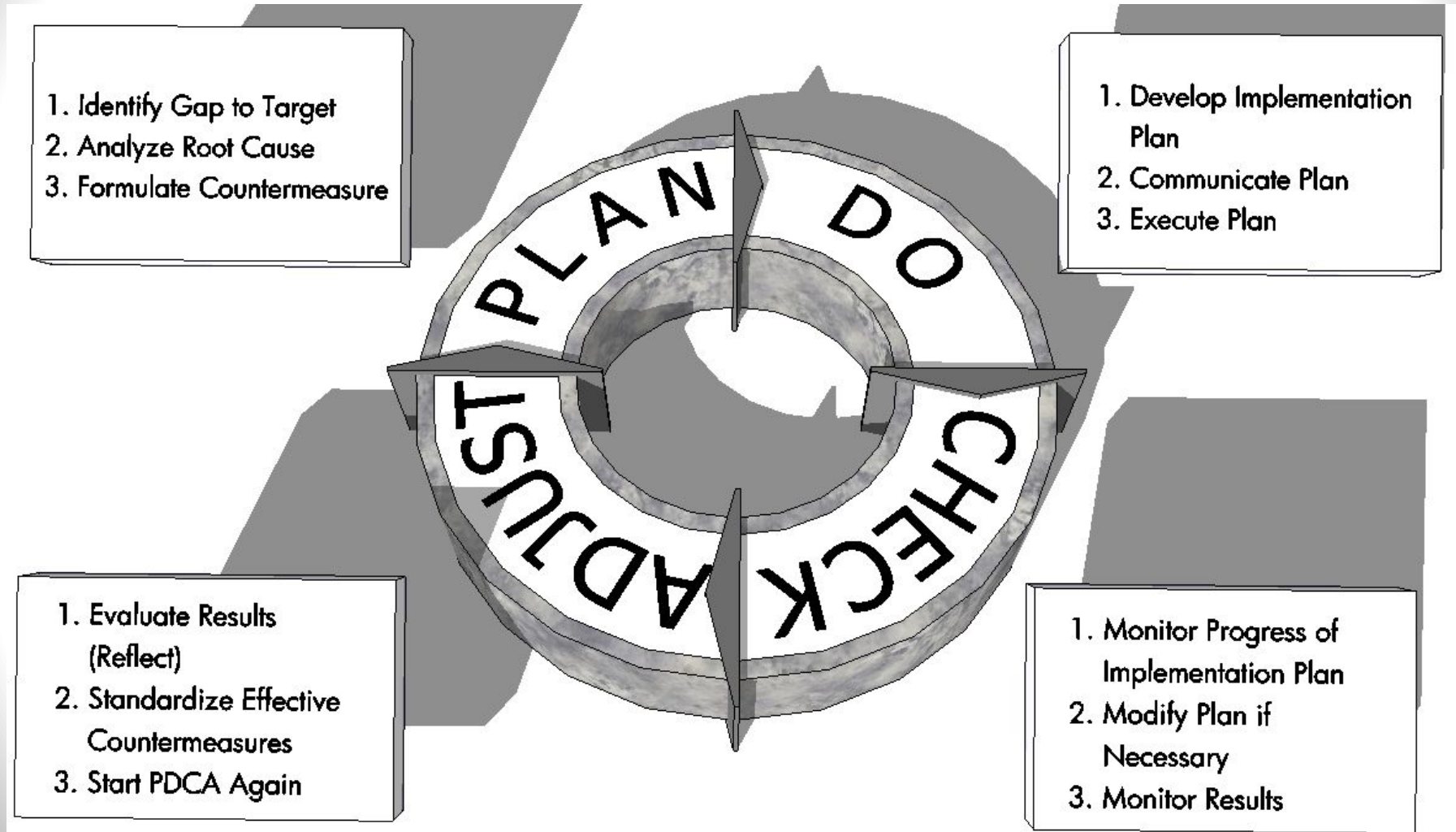
A Mindset of Continuous Improvement in all Employees

**Identify  
problems**

**Identify and  
Test  
solutions**



# PDCA Problem Solving is the Core of Lean Thinking



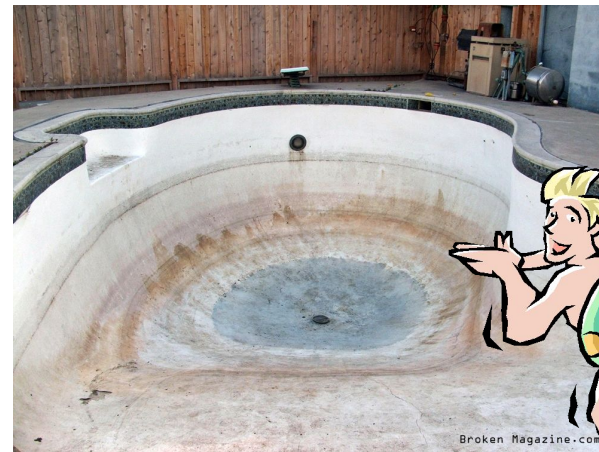
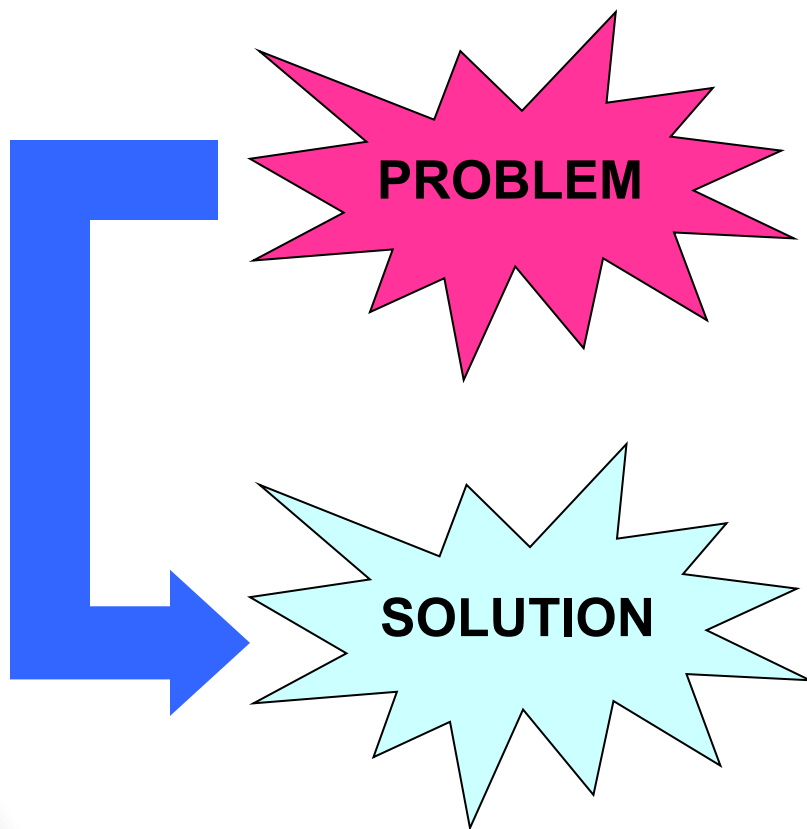


# 'Get It Done' Mentality Destroys the PDCA cycle



# Avoid the number one Trap!

Jumping from “problem” to “solution” without clear understanding and analysis



# So how did a university professor get obsessed with studying a single case study—Toyota?

- Interest in sociotechnical systems in 1970s
- Frustrated by sociotechnical systems—all social, no technical
- Invited to join UM US-Japan Auto Study in 2002
- Learned that Toyota was best Japanese automaker
- Began building relationships—the Japanese way
- Got hooked on the many lessons to learn from Toyota's long and deep experience and wisdom

# A Tale of TPS in Two Plants

Both helped by TSSC in 1990s

- Plant 1: Top Leadership committed, spread across first plant, then company, leading to huge profits and growth
- Plant 2: Great cell with team functioning like Toyota team members—never went beyond the one cell

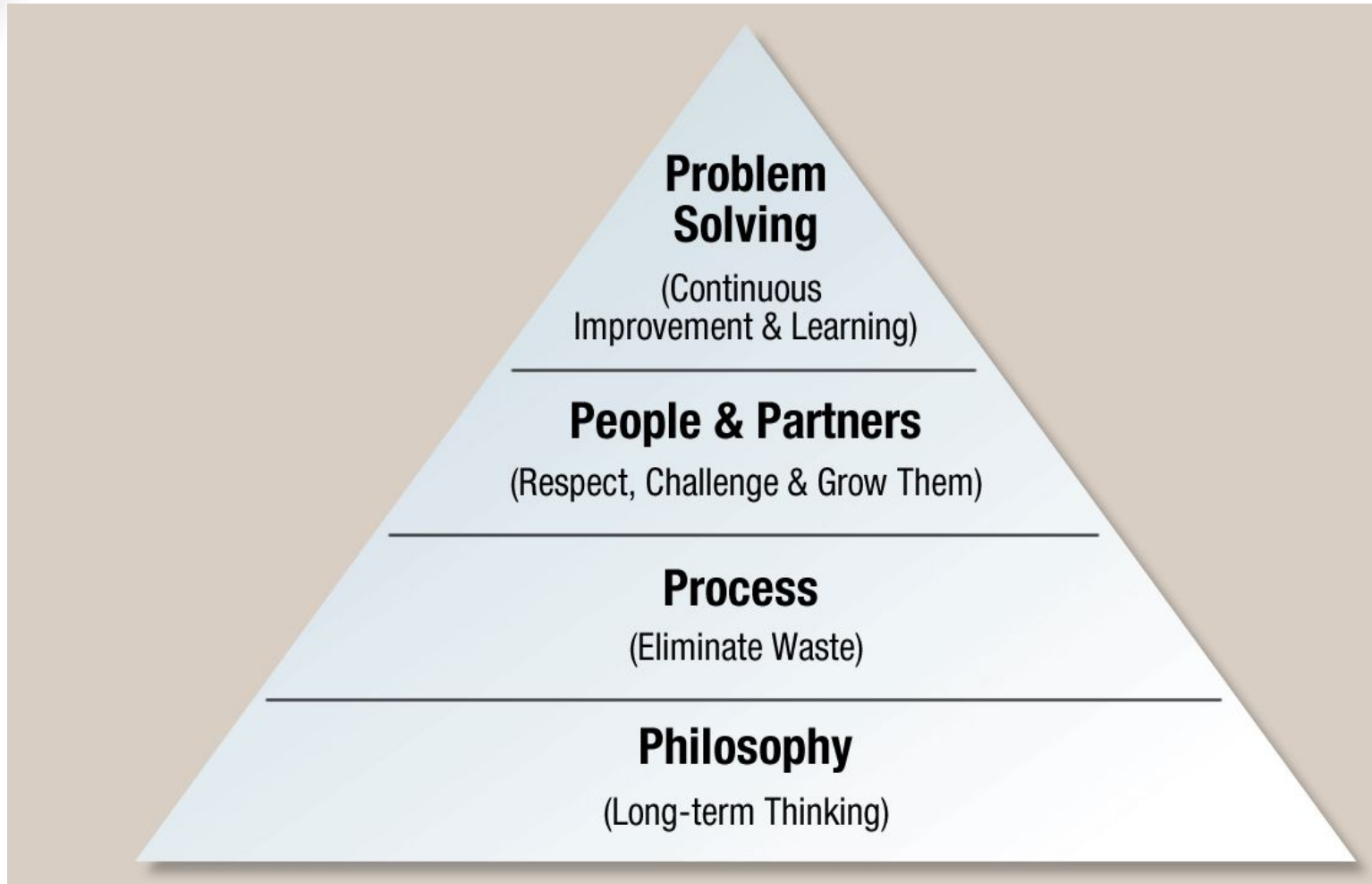
## Why Difference?

# Why don't more firms get to lean as a system?

- View lean only as a technical “toolkit”
- Focus on only short-term results
- Fail to develop people
- Move too fast--skim the surface
- Inconsistent, weak leadership direction
- ***Miss the philosophy!***

NOTE: ALL THESE WEAKNESSES POINT TO LEADERSHIP ISSUES!

# The 4 Ps of 'The Toyota Way'



# Philosophy

***Base management decisions on a long term philosophy, even at the expense of short term financial goals***

*Toyota mission:*

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- **Serve Society and Customers through exceptional quality automobiles**
- **Contribute to the economic growth of the country and community in which it is located (external stakeholders)**
- **Contribute to the stability and well being of team members through job security and personal development (internal stakeholders)**
- **Contribute to the overall growth of Toyota**

# TOYOTA global vision

Toyota will lead the way to the future of mobility, enriching lives around the world with the safest and most responsible ways of moving people.

Through our commitment to quality, constant innovation and respect for the planet, we aim to exceed expectations and be rewarded with a smile.

We will meet our challenging goals by engaging the talent and passion of people, who believe there is always a better way.





# BREAK



# How do you Drive to the Vision?



# ***The Most Important People are the people that touch the product, or the customer.***

**The rest of us exist to set them up for  
success.**



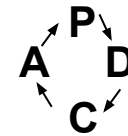
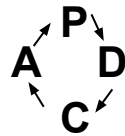
Invest in team members  
as your most valuable  
appreciating asset

# Develop Leaders who Live the Values and Philosophy



## 1. Commit to Self Development

Learn to live True North values through repeated Learning Cycles

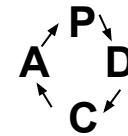
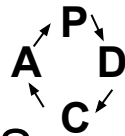


### TRUE NORTH VALUES

Challenge  
Improvement Mind Set  
Go and See  
Teamwork  
Respect for Humanity

## 2. Coach and Develop Others

See & Challenge true potential in others through Self-Development Learning Cycles



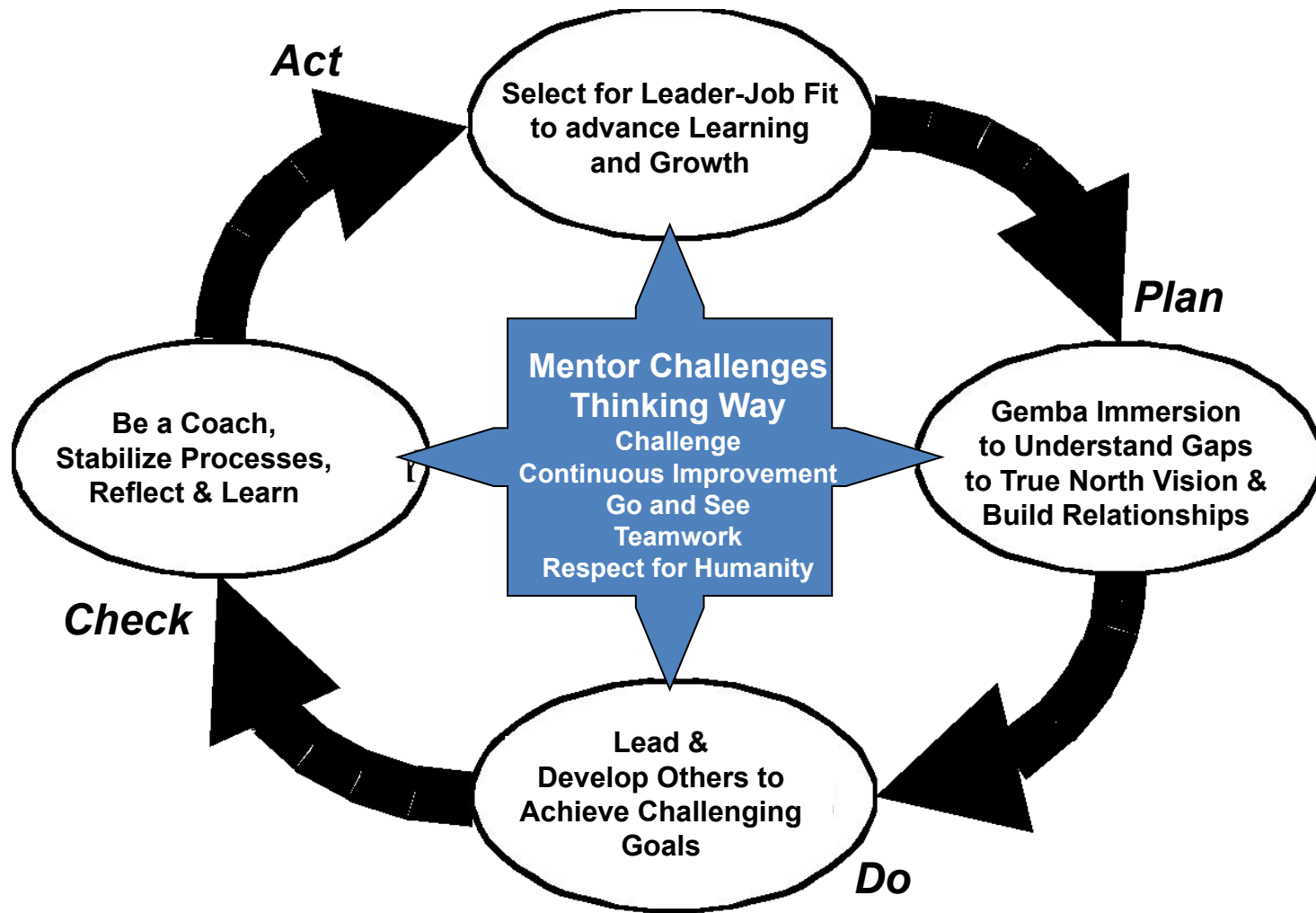
## 3. Support Daily Improvement

Build local capability throughout for daily Management & Improvement

## 4. Create Vision and Align Goals

Create True North vision & align goals vertically and horizontally

# Leadership Self-Development Learning Cycles (PDCA)



NOTE: Toyota leaders go through repeated cycles of self development over their careers taking on increasing challenges under the guidance of a mentor.

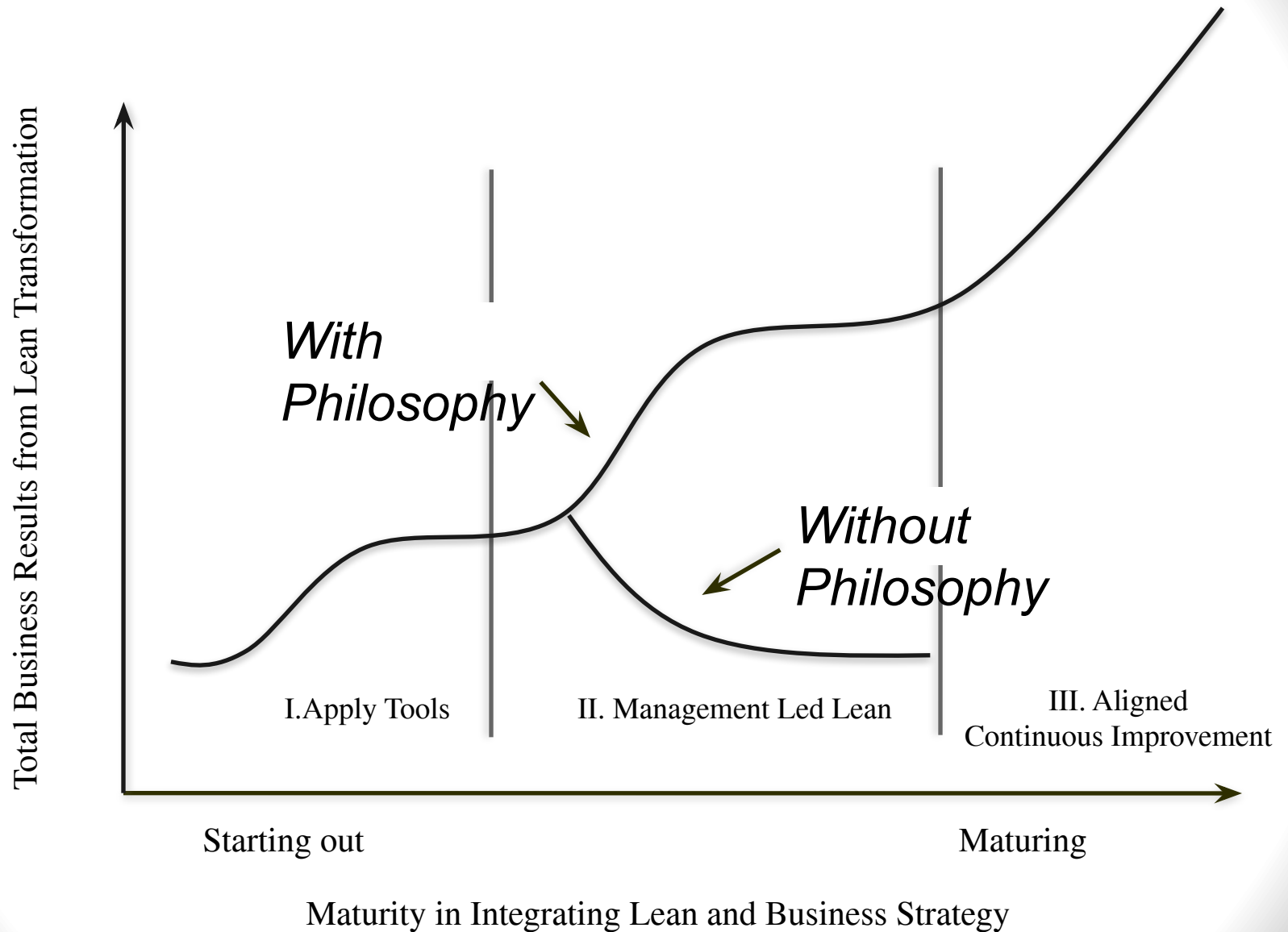
# The Liability of Charisma--Jim Collins

## *Confront the Brutal Reality*

“The moment a leader allows himself to become the primary reality people worry about, rather than reality being the primary reality, you have a recipe for mediocrity, or worse. This is one of the key reasons why less charismatic leaders often produce better long-term results than their more charismatic counterparts.

\* From Good to Great

# Results as Lean Evolves Depend on Leadership Philosophy



# How do you Develop People with the Skills and Motivation Aligned toward the Vision





# Working to Achieve Standards is the foundation for continuous improvement and employee development

## Coercive vs Enabling Bureaucracies-Employee Empowerment

### Social Structure

		Social Structure	
		Coercive	Enabling
Technical Structure	High Bureaucracy	<p style="text-align: center;"><b>Coercive Bureaucracy</b></p> <ul style="list-style-type: none"> <li>• Rigid rule enforcement</li> <li>• Extensive written rules and procedures</li> <li>• Hierarchy controls</li> </ul>	<p style="text-align: center;"><b>Enabling Bureaucracy</b></p> <ul style="list-style-type: none"> <li>• Engage employee</li> <li>• Rules and procedures as enabling tools</li> <li>• Hierarchy supports organizational learning</li> </ul>
	Low Bureaucracy	<p style="text-align: center;"><b>Autocratic</b></p> <ul style="list-style-type: none"> <li>• Top down control</li> <li>• Minimum written rules and procedures</li> <li>• Hierarchy controls</li> </ul>	<p style="text-align: center;"><b>Organic</b></p> <ul style="list-style-type: none"> <li>• Empower employee</li> <li>• Minimum rules and procedures</li> <li>• Little hierarchy</li> </ul>

# Enabling Structure is a Balance between Mechanistic and Organic

## MECHANISTIC BUREAUCRACY

- Systems focus on performance standard to highlight poor performance.
- Everyone follows the standards exactly: deviations punished.
- Specialists plan and monitor standards.
- Standards are instructions to be followed, not challenged.

## ENABLING STRUCTURE

- Performance standards used to identify problems for group problem solving
- Standards are guidelines to be improved on.
- Standards are visible and controlled by work groups.
- Standards are a target to work toward through kaizen



The Lean Approach

Source: Paul Adler, USC

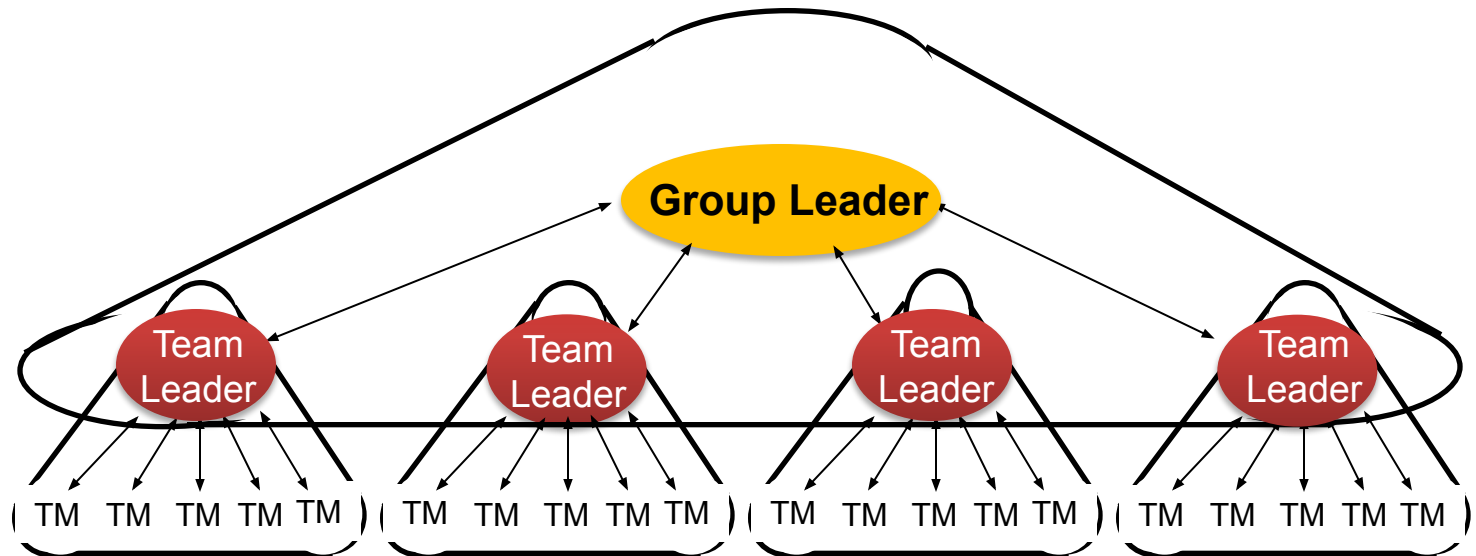
# Use visual control so no problems are hidden

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- Visual control systems are about improving value added flow
- Visual control tells us at a glance if we are deviating from the standard.



# Toyota Work Groups at the Heart of Continuous Improvement



## Notes

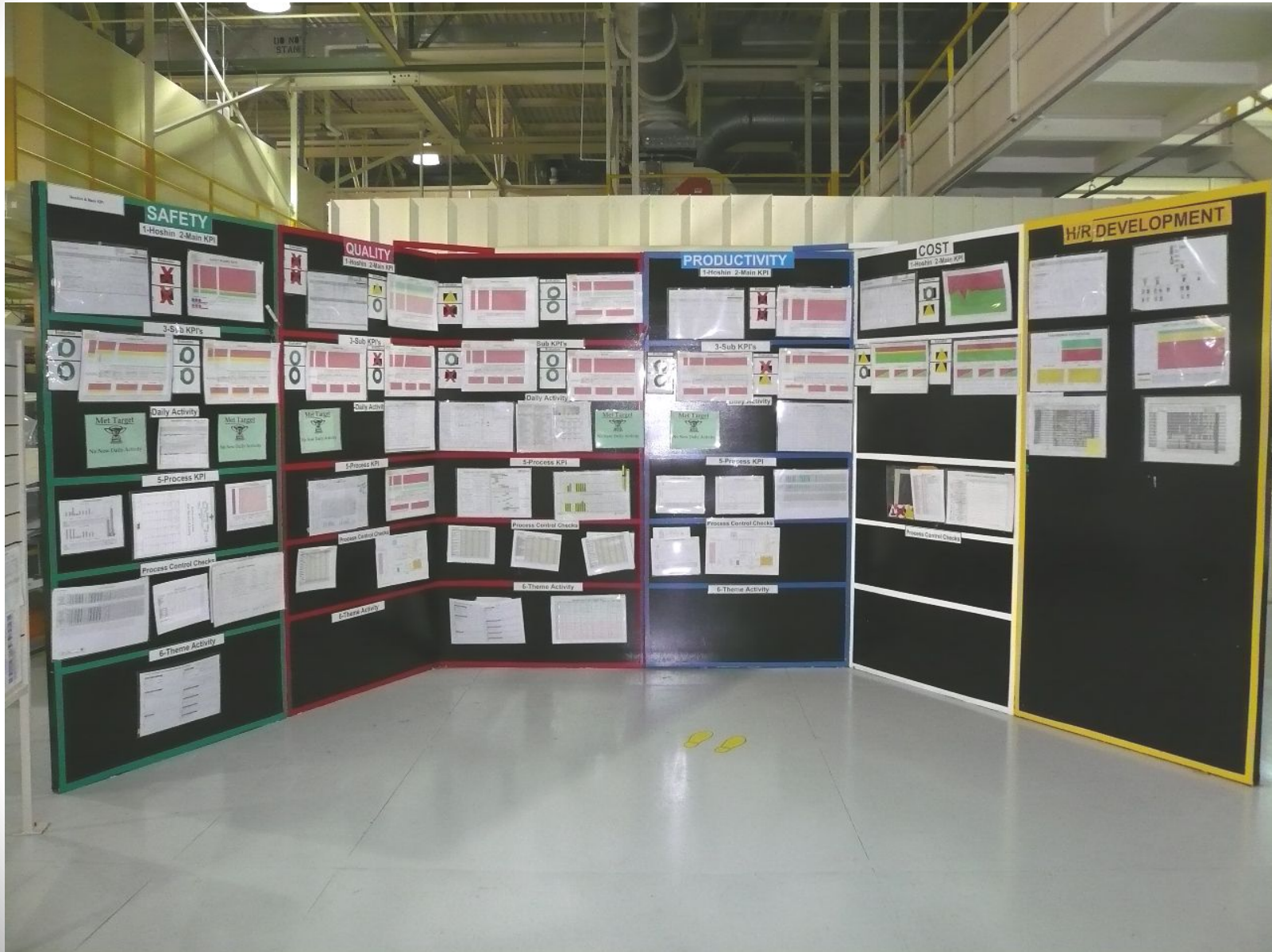
Ideal TL:TM Ratio= 1:5

Group Leader (GL) = 1st level of management

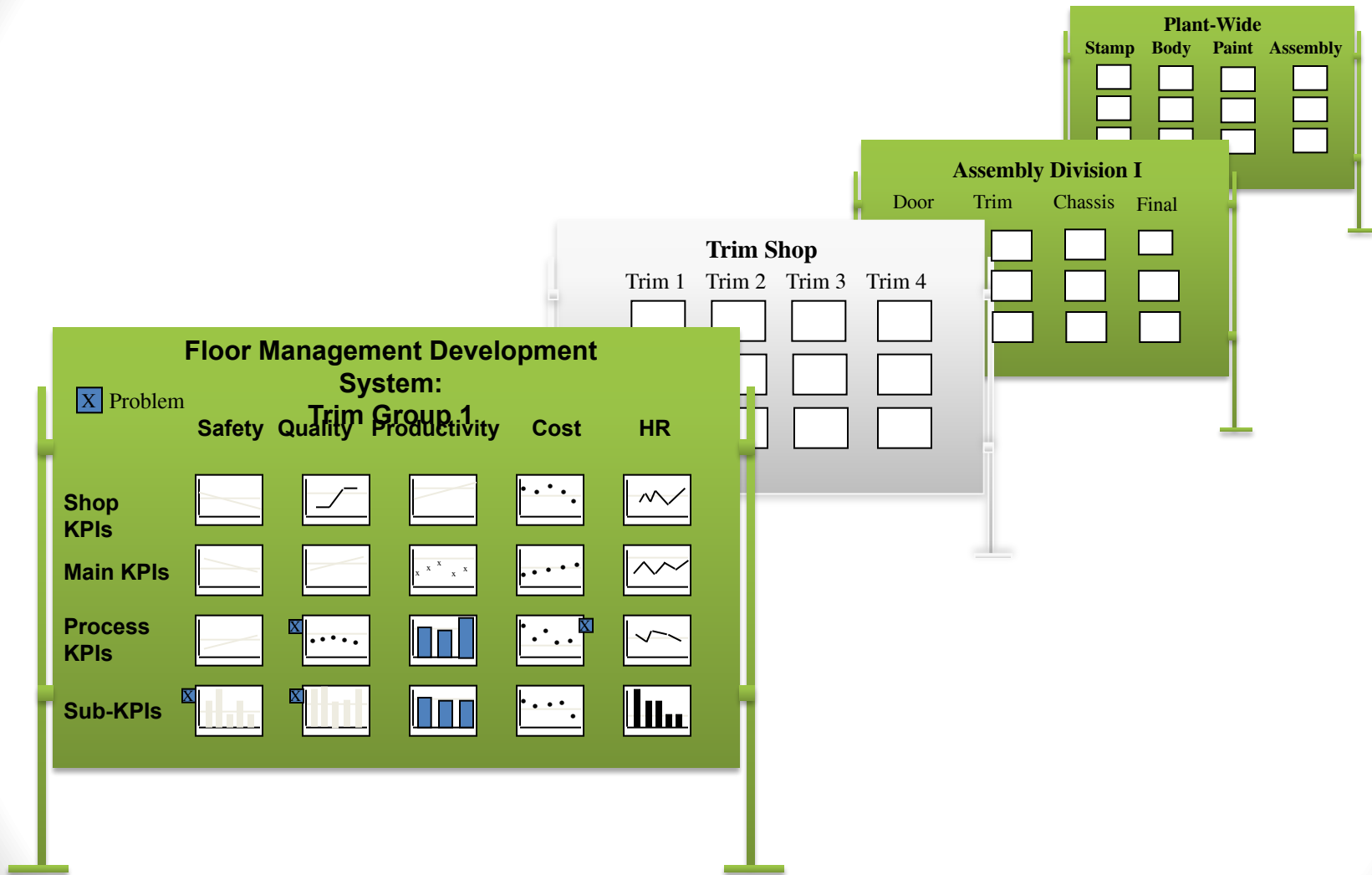
Team Leader (TL) = Alternates working production and leadership roles.

Team Member (TM) = Production worker

Continuous Improvement means a little better every day:  
Visual Management Boards for Each Work Group (Toyota, Kentucky)



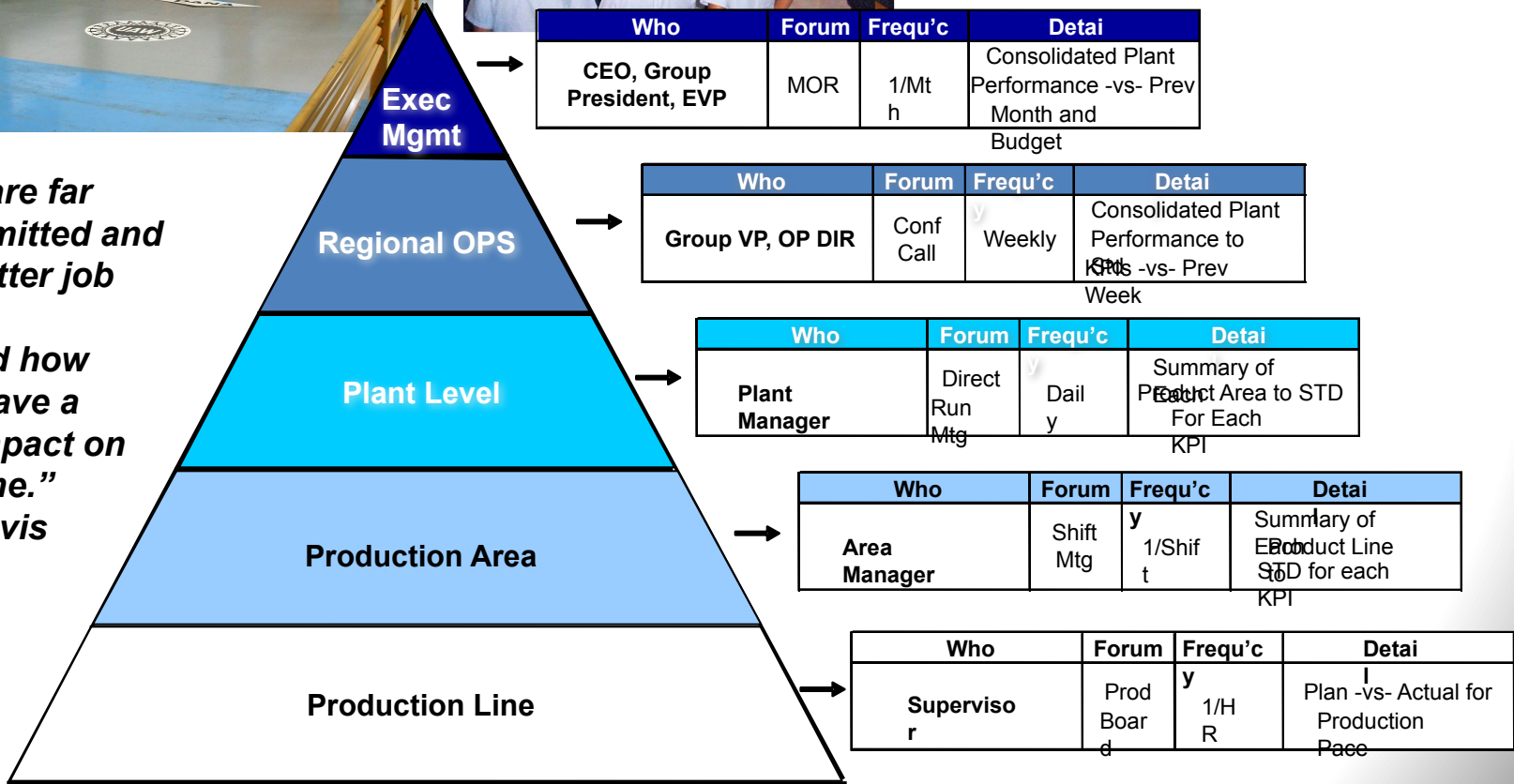
# Visual Metrics Aligned from Top to Bottom to meet Annual Plan (Hoshin Kanri)



# Visualization & Striving to Meet Aligned Standards



*“Workers are far more committed and do a far better job when they understand how they can have a positive impact on the outcome.”*  
 --Gary Convis



# Comparison between MBO and Hoshin Kanri

<b>Management by Objectives</b>	<b>Hoshin Kanri</b>
<b>Short-Term, No Philosophy</b>	<b>Long-Term, Strong Guiding Principles</b>
<b>Results Oriented Evaluation of Effort</b>	<b>Concerned with Results and Process with Focus on People Development</b>
<b>Top down Communication</b>	<b>Top down Direction Setting and Bottom-up flow of Information and means</b>
<b>Directive</b>	<b>Participative</b>
<b>Primarily Authority Oriented</b>	<b>Primarily Responsibility Oriented</b>



# Lean Leaders are at the gemba, Asking Questions, listening thoughtfully



**Bad news first**

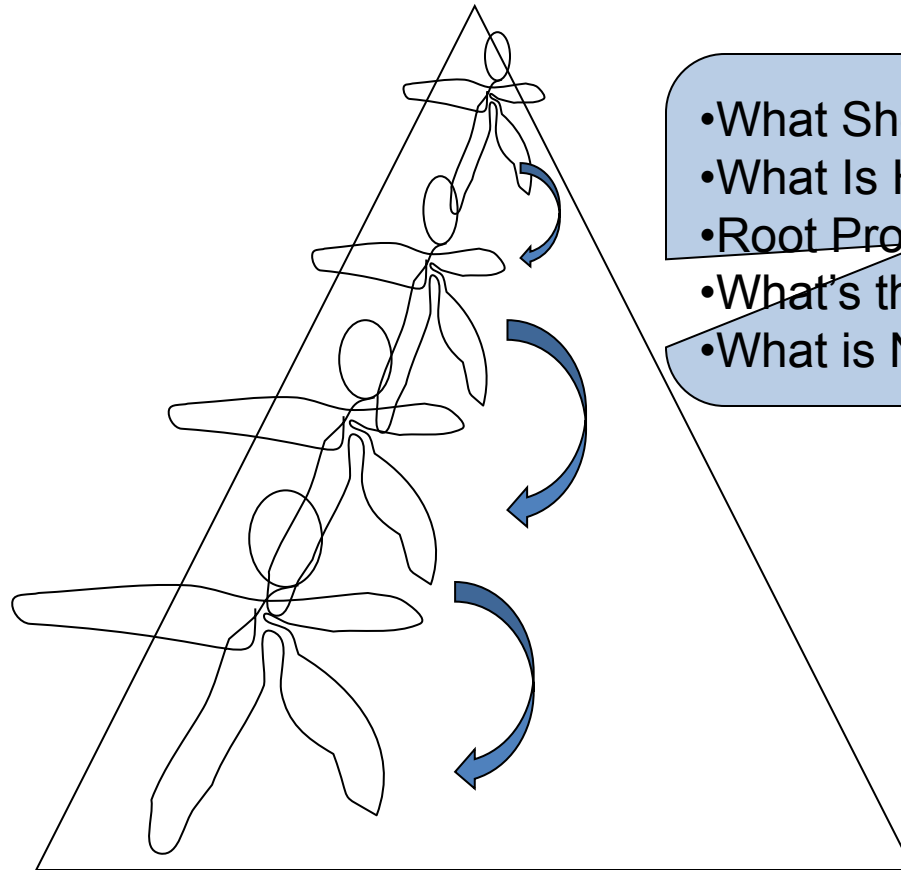
**Every concern is legitimate**

**Let's focus on facts**

**And figure this out together**



# Chain of Modeling and Coaching, NOT Chain of Command



- What Should Be?
- What Is Happening?
- Root Problem?
- What's the target?
- What is Next Step?

See Mike Rother, Toyota Kata

**Leaders at all levels practice the same basic patterns of coaching and modeling behavior to Teach values everyday**

# Leadership takes expertise. Will any of these teachers or students become an expert in a 2-Week Training Course?



Master Chef &  
Students



Soccer Coach going over  
pla



Coaching Girl's Basketball  
Team



Teaching  
Violin

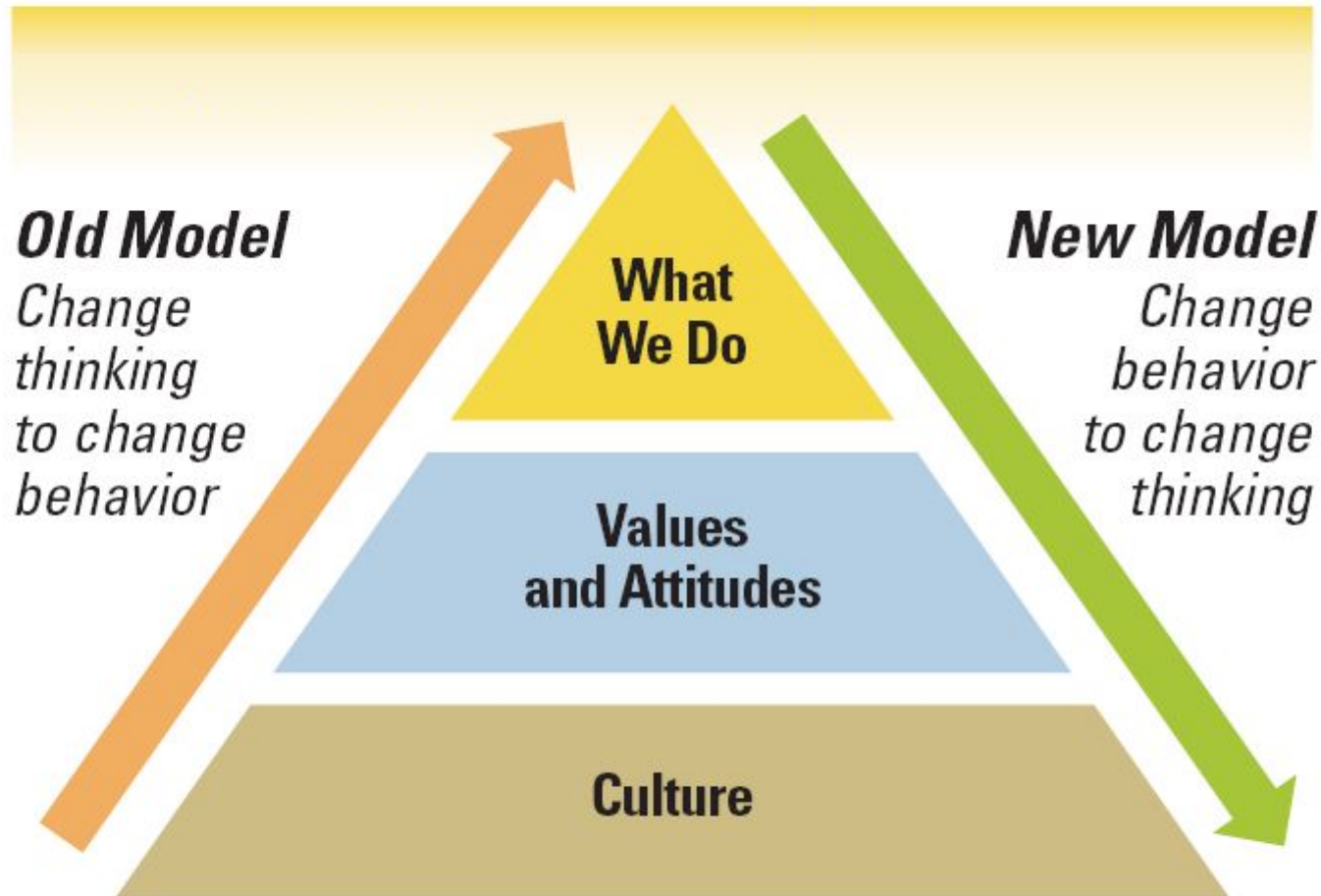
# Summary of what Lean Leaders Need to Learn

- Managing from the gemba
- Developing themselves
  - Live the core values of the philosophy (respect for people and continuous improvement)
  - Manage effectively from the gemba
  - Become a role model for discipline problem solving
  - Become a teacher and coach for disciplined problem solving

# Western Leadership Vs. Eastern Leadership

<b><i>Traditional Western Leader</i></b>	<b><i>Toyota Leader</i></b>
Quick Results	Patient
Proud	Humble
Climb Ladder Rapidly	Learn Deeply and gradually Earn Way up Ladder
Results at all Costs	Need the Right Process to consistently get the Right Results
Achieve Objectives through People	Develop People through process improvement

# How Culture Changes



***“It’s easier to act your way to a new way of thinking than to think your way to a new way of acting.”***

# Toyota Veteran's View of Toyota's Success

1

“The most important factors for success are patience, a focus on long term rather than short-term results, reinvestment in people, product, and plant, and an unforgiving commitment to quality.”

-Robert B. McCurry,  
former Executive V.P., Toyota Motor Sales



***Questions?***

