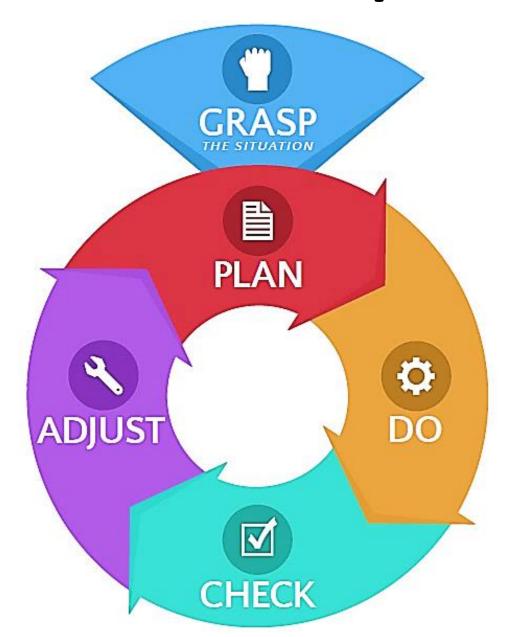
# Focusing on the 'g' in gPDCA to boost your problem solving skills

Eden Teachout
Senior Lean Consultant
DES Lean Transformation Services



# How do we solve problems?





# gPDCA/9 Step Problem Solving Method

Phase	Step			
Grasp the situation	1. Identify the problem in simple terms			
	2. Observe and measure the current state			
	3. Set a target			
	4. Write a problem statement			
	5. Analyze the Gap			
Plan	6. Plan to test your countermeasure			
Do	7. Do test your countermeasure			
Check	8. Check the results of your test			
Adjust	9. Adjust the plan			

# What is a problem?



A gap between what is currently happening...

...and what should be happening.

## Introductions

- Name
- Role
- Aspect of problem solving you'd like to explore more deeply



## The Situation



**Team** 

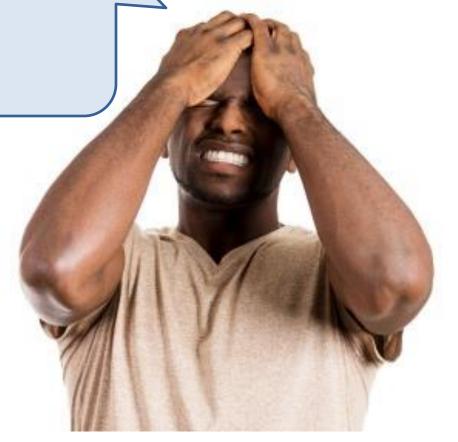


Promise: **25 Days** 



## The Situation

It took well over a month!







## The Situation

We're explaining instead of processing.

We're getting incomplete forms.







#### a Problem in Simple Terms

- Briefly describe the issue and why it matters
- Identify how you will measure the problem



#### 1. Identify a Problem in Simple Terms

# Process & Product





#### 1. Identify a Problem in Simple Terms















#### **Practice**

#### 1. Identify a Problem in Simple Terms

- A. Customers are not happy with our process.
- B. Customers are not filling out forms correctly, so the team has to get more information.
- C. Customers say it takes too long to have their requests approved. This delays their work.



- Create a picture of what's actually happening
- Capture data and facts





What do I How do I know know? that?

What more do How will I find I need to out those know?

What do I know?

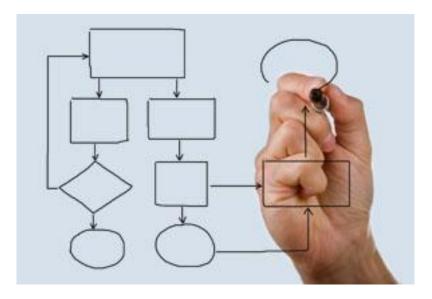
How do I know that?

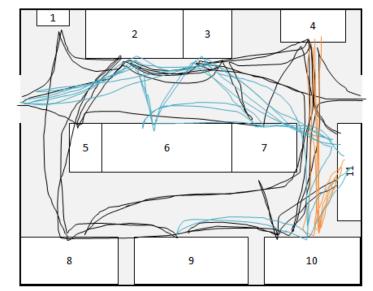
- The process
- Current & past performance
- Customer expectations
- Requirements

What more do I need to know?

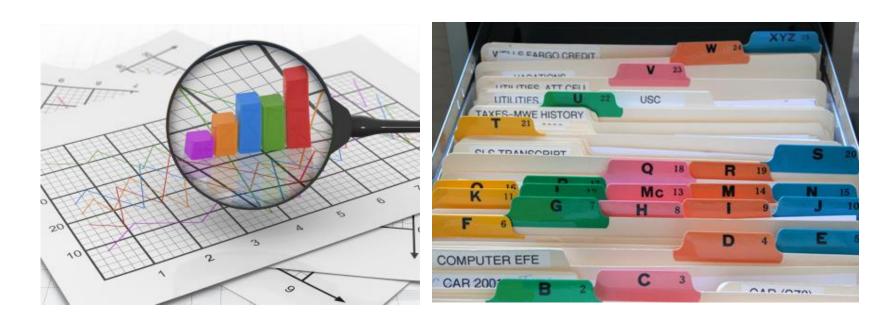
How will I find out those things?











Telephone Interruptions

Reason	Day					
Reason	Mon	Tues	Wed	Thurs	Fri	Total
Wrong number	444			##	-Hrt∥	20
Info request			ll l	II		10
Boss	<b>##</b>		H##11		Ш	19
Total	12	6	10	8	13	49



Ask a few, focused questions



#### **Practice**

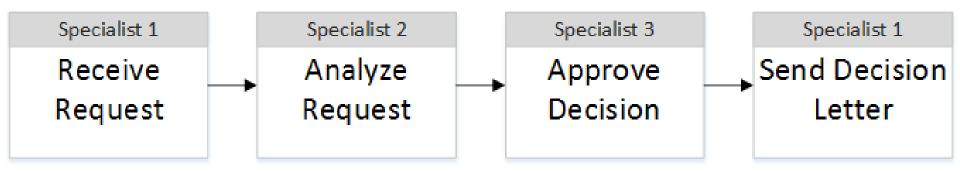
#### 2. Observe & Measure Current State

What do we need to know? How will we find out?

- The process
- Current & past performance
- Customer expectations
- Requirements



#### **Customer Request Process Flow**



Touch: 5 min

**Cycle: 4 – 8 hrs** 

Touch: 30 – 60 min

Cycle: 2 – 9 days

Touch: 15 min

**Cycle:** 5 – 20 days

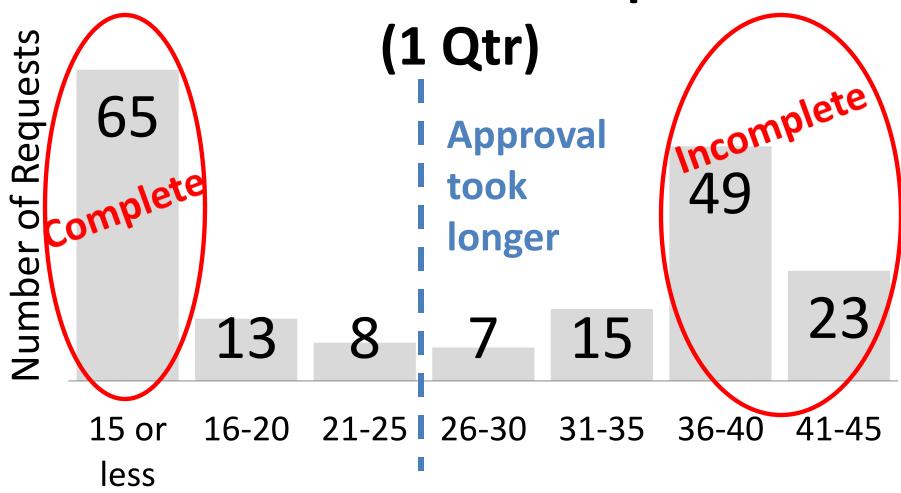
Touch: 10 min

**Cycle: 2 – 15 days** 

62% sent back to customer to complete



#### **Time to Process Requests**



Number of Days to Process



#### **Customer Feedback**

We had to call you to figure out how to fix the returned request.

We want approval in 15 days.





#### 3. Set a Target

- Describe what should be happening and by when
- In setting a target, consider:
  - ✓ Customer expectations & demand
  - **✓** Requirements
  - Actual performance



#### **Practice**

#### 3. Set a Target

- A. By the end of next quarter, process all customer requests within 15 days.
- B. Decrease processing time by 50% by the end of next quarter.
- C. Process customer requests 50% faster by implementing a new request system.

#### 4. Write a Problem Statement

#### Describe the measurable gap and when it will be closed







#### 4. Write a Problem Statement

Currently, we take up to 45 days to process all customer requests, compared to our target of 15 days, which we want to reach by the end of next quarter.

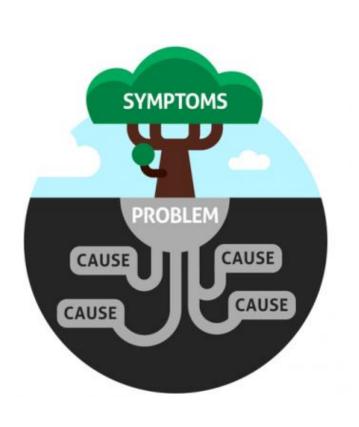


#### **Problem Statement Formula**

Currently . . . (what's happening now) Compared to our target of . . . (what should be happening) Which we want to reach by . . . (date)



#### 5. Analyze the Gap



- Identify actionable root cause(s) of the gap
- Propose effective countermeasures to eliminate the cause(s)



#### **Practice**

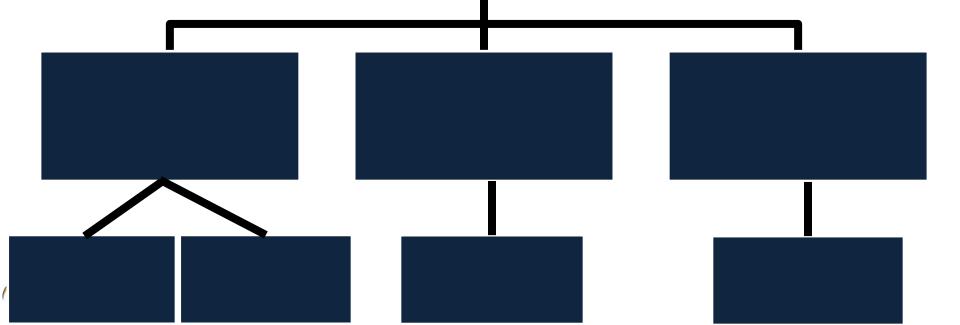
- 5. Analyze the Gap
  - A. Why is it taking so long to process customer requests?
  - B. Why can't we process requests in 15 days?
  - C. Why do some requests take 45 days instead of 15?



#### 5. Analyze the Gap



Why do some requests take 45 days instead of 15?



# Why do some requests take 45 days instead of 15?

**Because** 

We send some requests back to customers

Why?

**Because** 

Customers leave out required information in Part 1

Why?

**Because** 

Customers are confused by the new label "ORG"

Why?

**Because** 

The text in the request form differs from the text in the instruction packet

Why?

**Because** 

We changed the label text on the form, but not in the instruction packet

Why?

**Because** 

There is no prompt to update the instruction packet when we change the form



#### 5. Analyze the Gap

The text in the request form differs from the text in the instruction packet.

There is no prompt to update the instruction packet when we change the form.

Align the text

Create prompt



## gPDCA/9 Step Problem Solving Method

Phase	Step
Grasp the situation	1. Identify the problem in simple terms
	2. Observe and measure the current state
	3. Set a target
	4. Write a problem statement
	5. Analyze the Gap
Plan	6. Plan to test your countermeasure
Do	7. Do test your countermeasure
Check	8. Check the results of your test
Adjust	9. Adjust the plan

#### **Key Points**

- 1. Steps build on each other.
- 2. Resist the urge to skip steps.
- 3. Taking the time to grasp the situation will pay off immensely.
- 4. Let curiosity be your guide.
- 5. Find simple, cheap ways to observe and measure.



#### **Questions & Answers**



**Eden Teachout** 

Senior Lean Consultant

**DES Lean Transformation Services** 

360-407-9292

Eden.Teachout@des.wa.gov

Bit.ly/DESLTS

