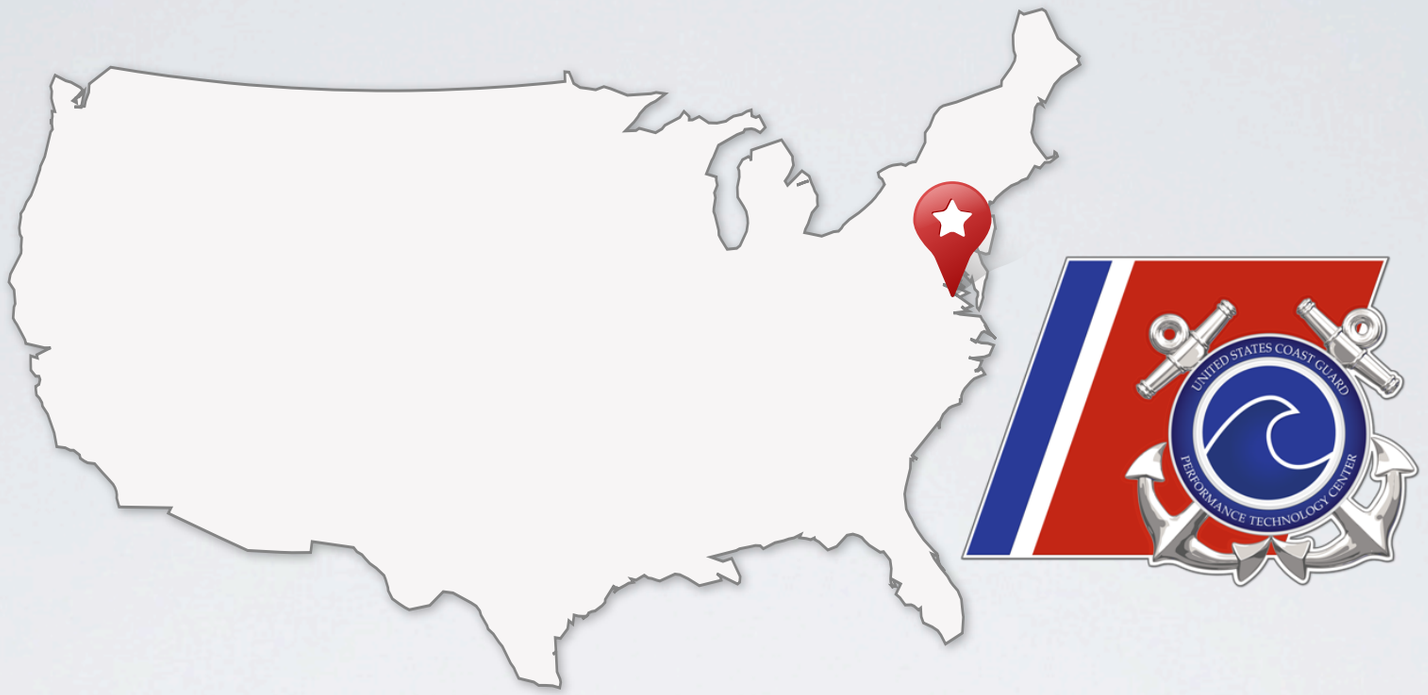
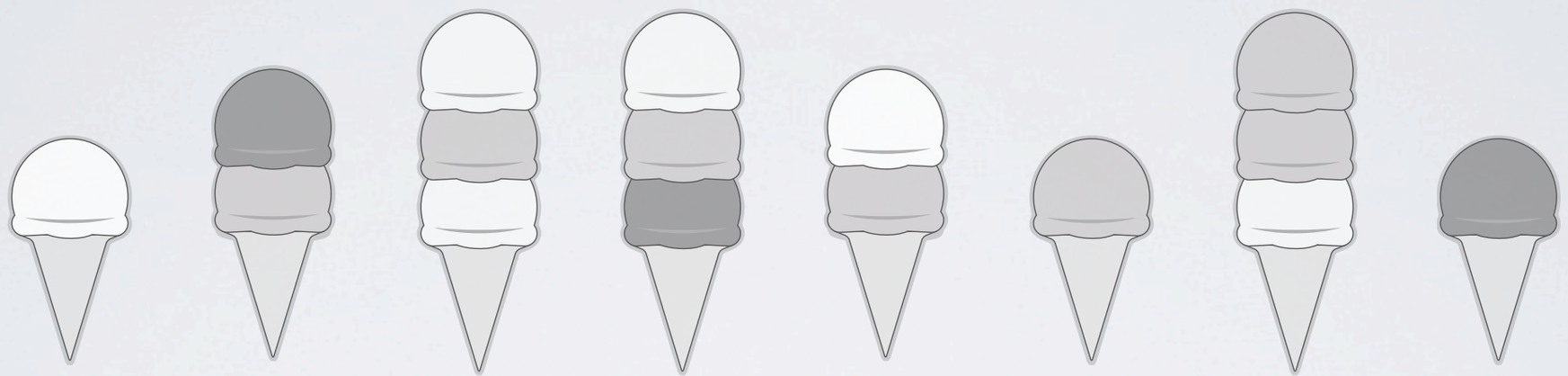
THE LIFE OF A DIGITAL SOLUTION

Steve Flowers, PTC Yorktown



Steve Flowers, U.S. Coast Guard
Performance Technology Center

FORCECOM (FC-tptc)



Digital solutions come in many flavors,
sizes, combinations, and layers.

Self-Paced
eLearning

Classroom
Media

Performance
Support

Virtual
Classroom

Blends

Simulation

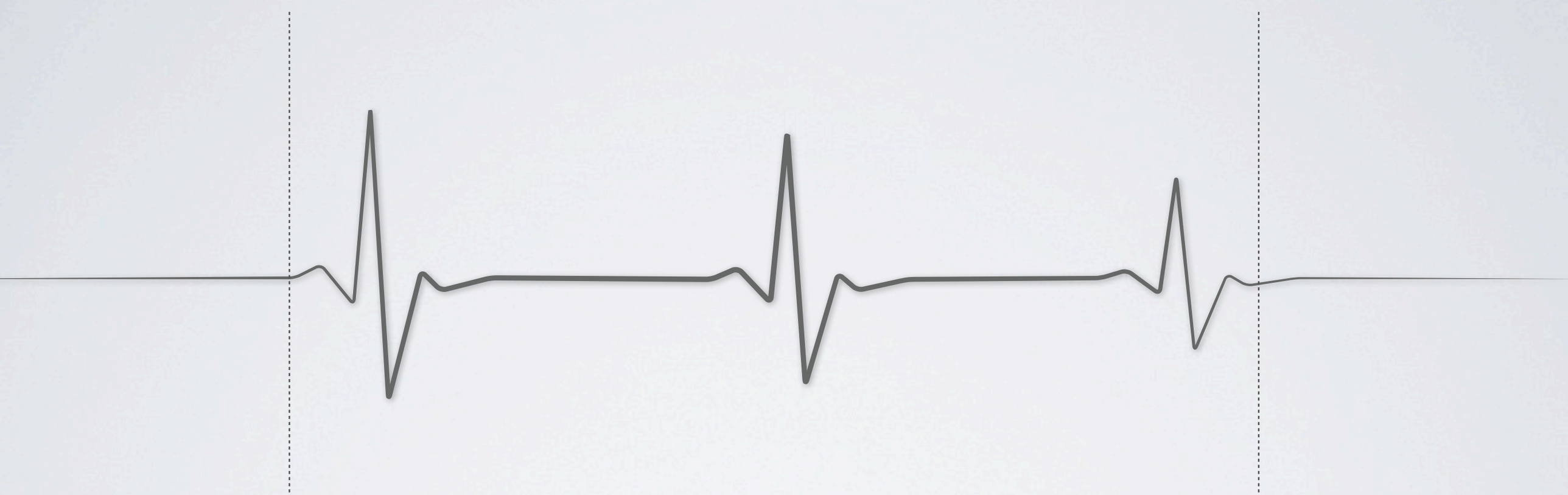
Self-Paced
eLearning

tortures **you**

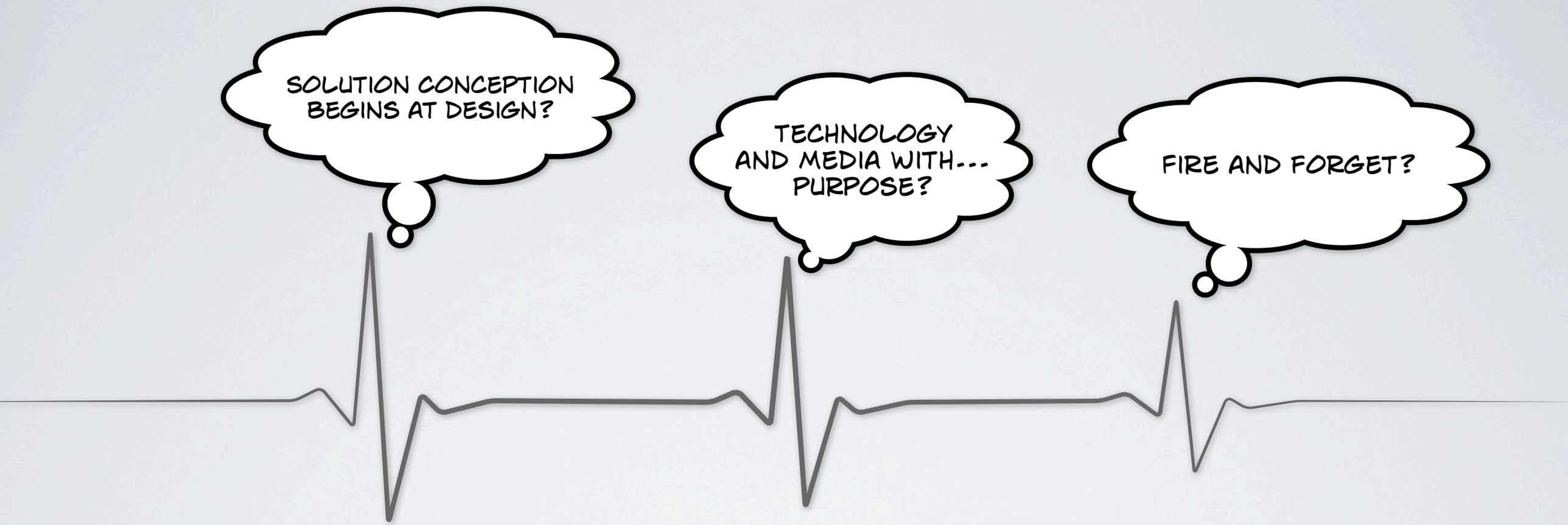
Idea

tortures **everyone**

Observations and Assumptions



Signs of Lifecycle



Designed Developed Deployed

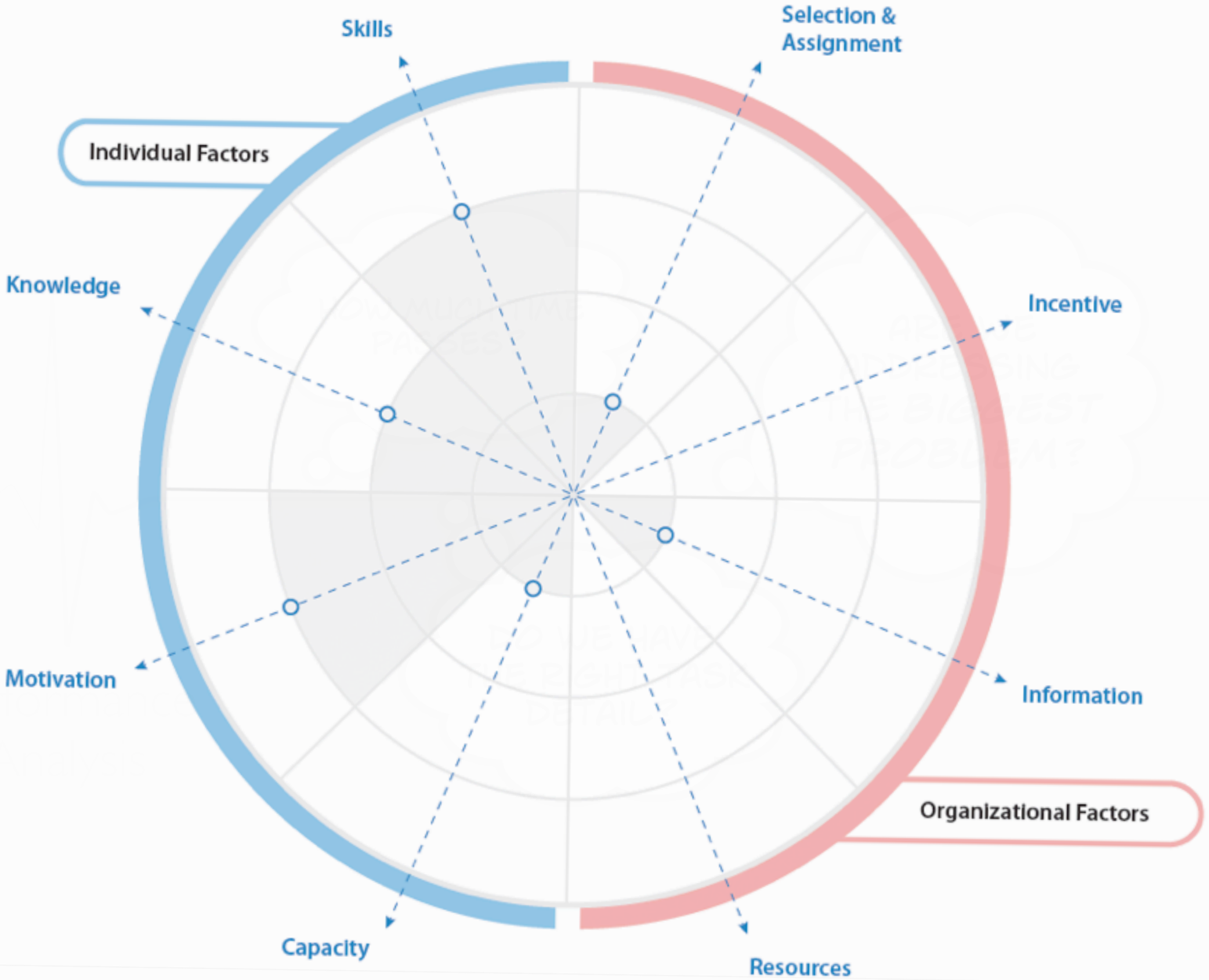
GOT THE GREEN?

GET THE SCREEN!

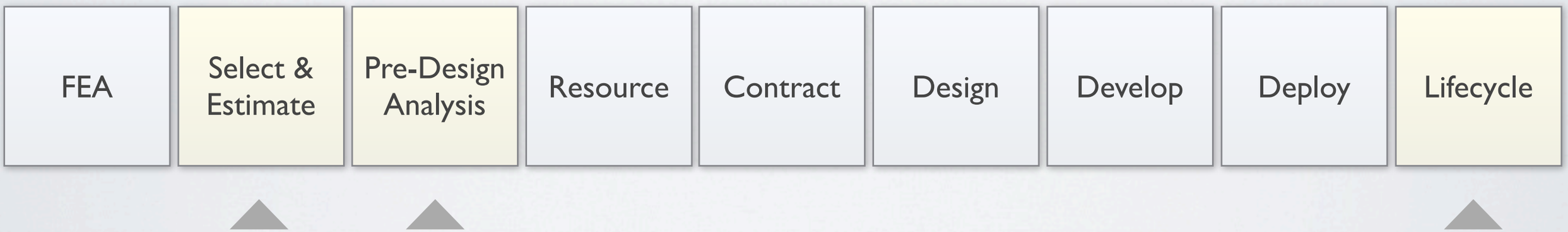
$$$

Designed

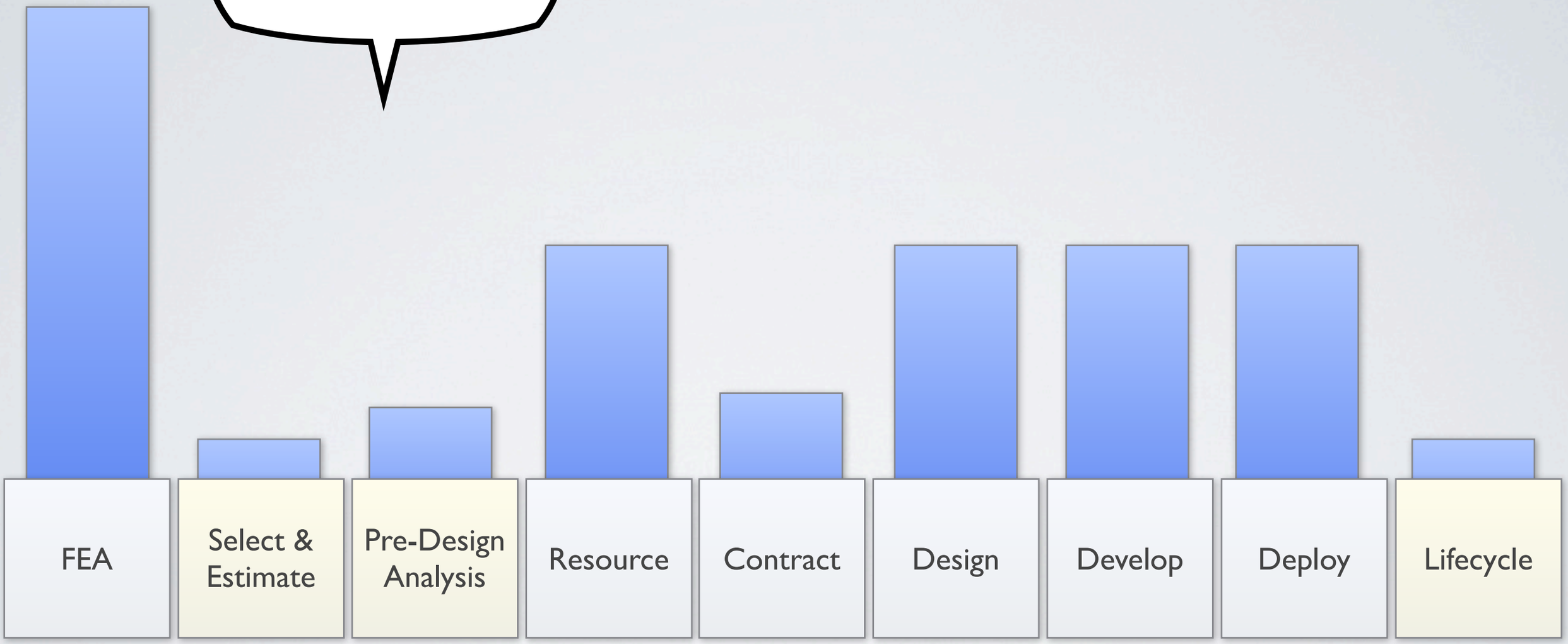
Developed


Skills
Selection &
Assignment
Individual Factors
Knowledge
Incentive
Motivation
Information
Organizational Factors
Capacity
Resources

Performance Analysis	Resources / Contracting	Design	Development	Deployment


FEA
Select & Estimate
Pre-Design Analysis
Resource
Contract
Design
Develop
Deploy
Lifecycle

ANECDOTAL DATA REPRESENTING QUALITY ON TASK.



How can we make choices less arbitrary?

Selection, Estimation and Packaging

Shift the Mindset

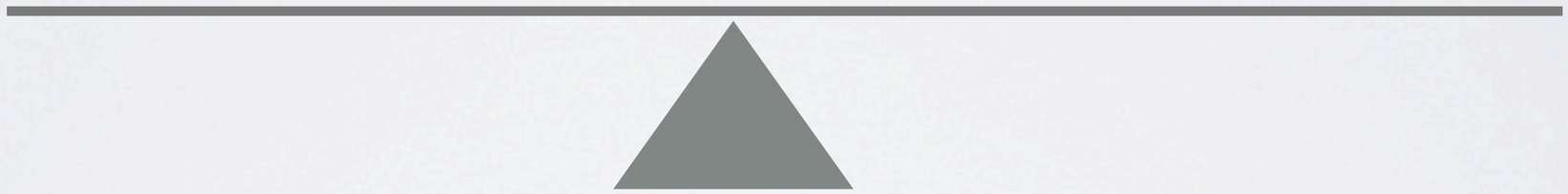
Information

Knowledge

Behavior

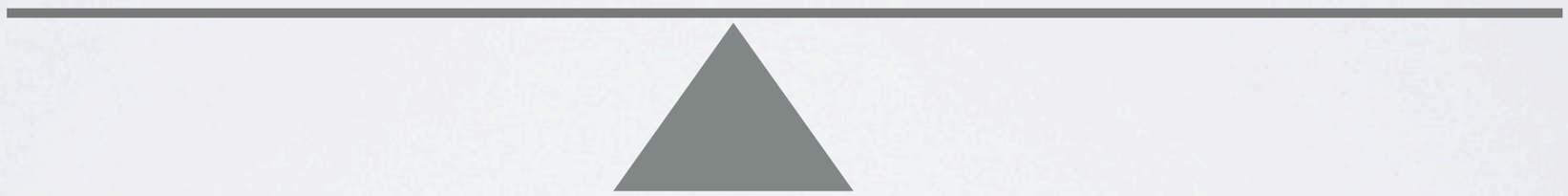
Effort

Output

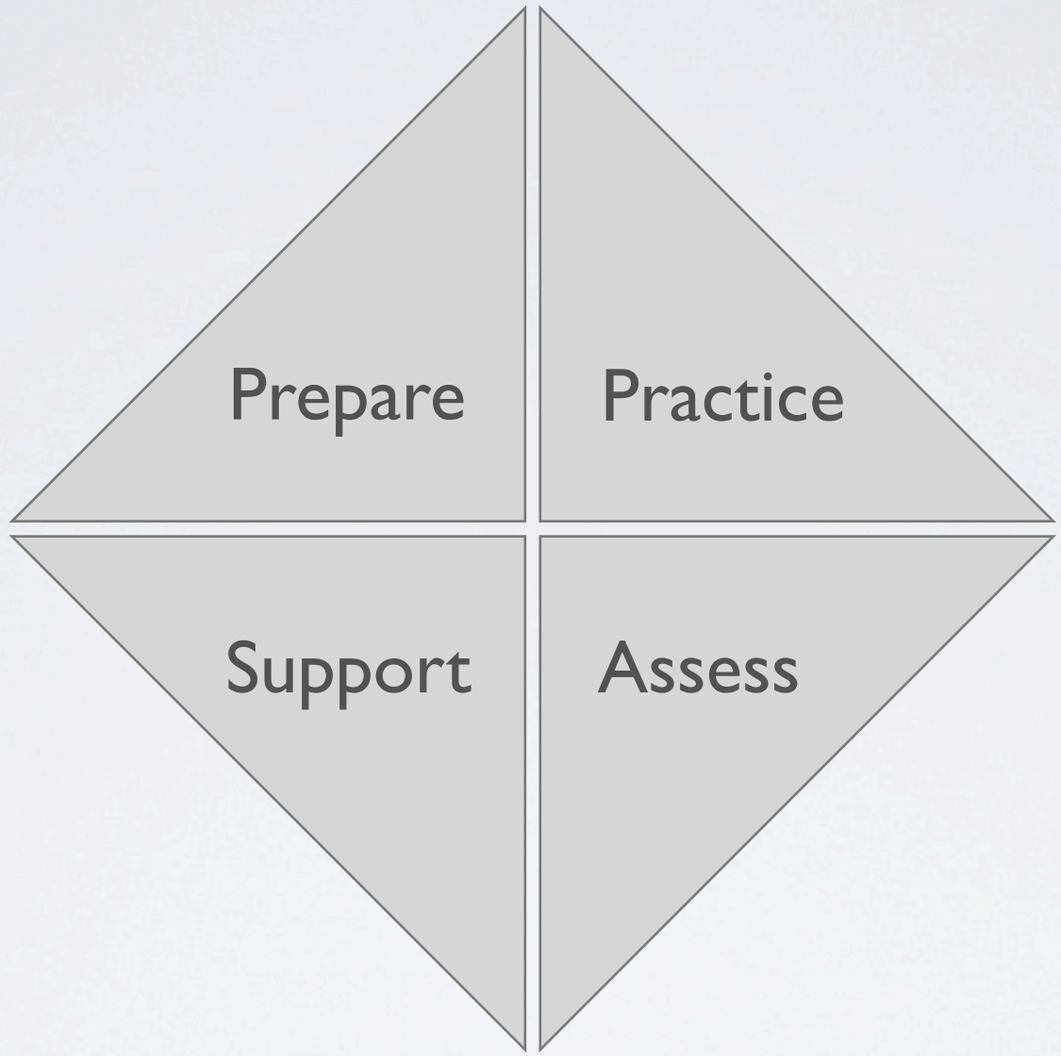


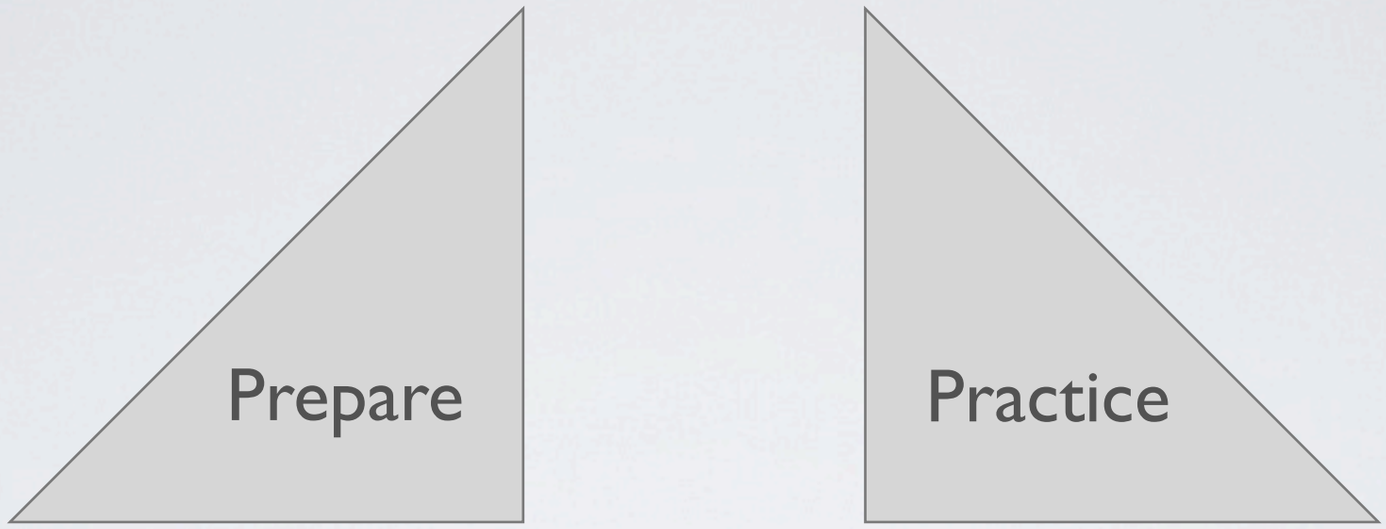
Effort

Outcome



Bundling


Prepare
Practice
Support
Assess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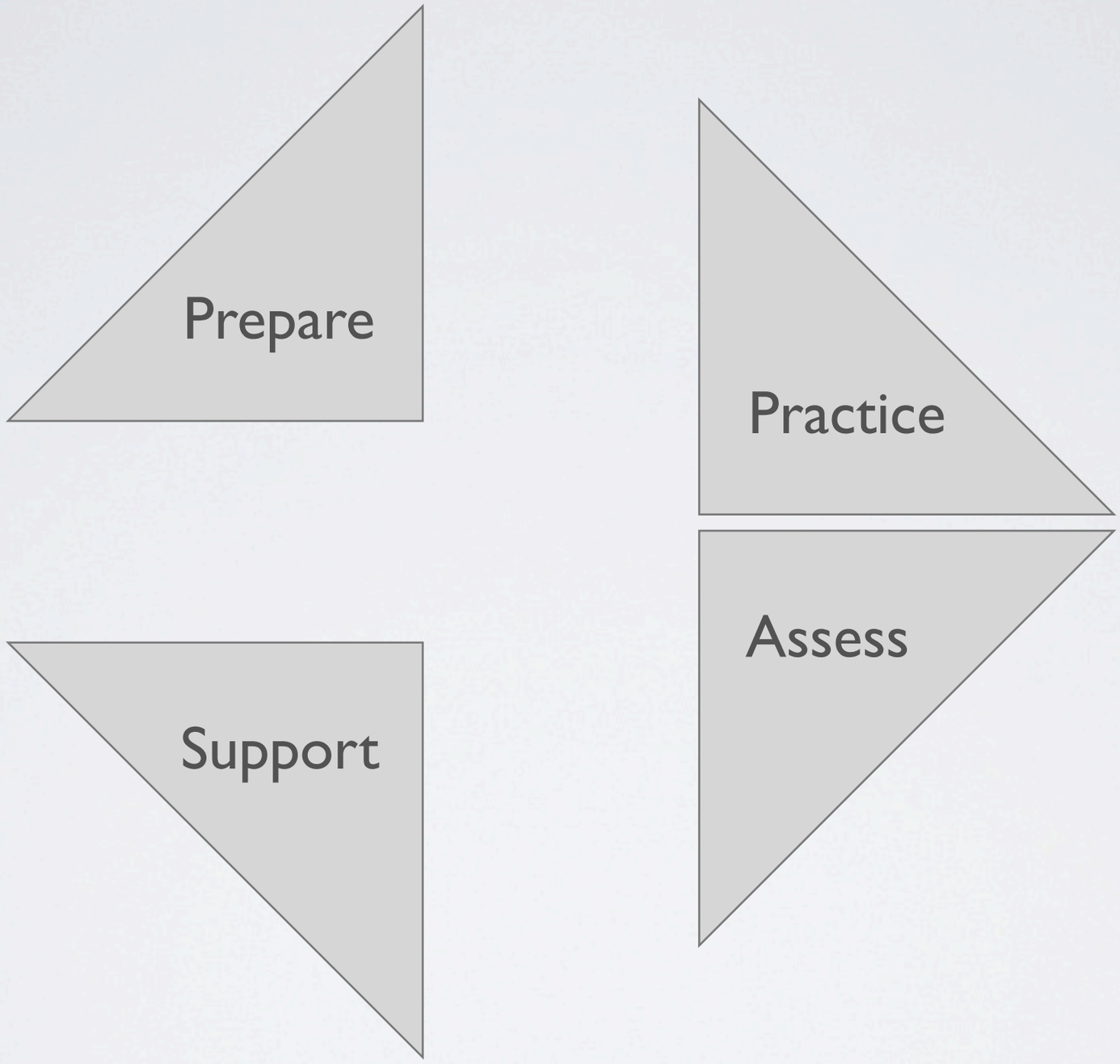
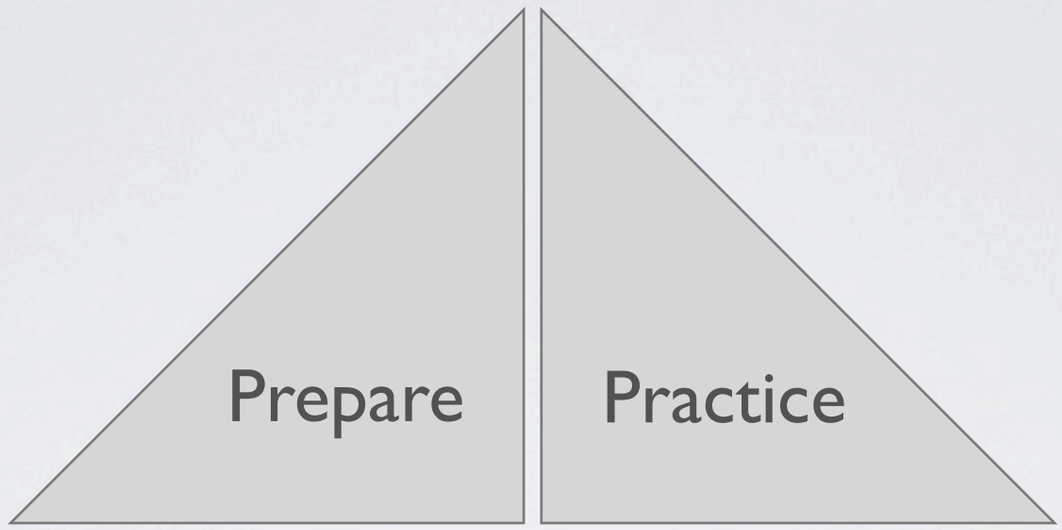
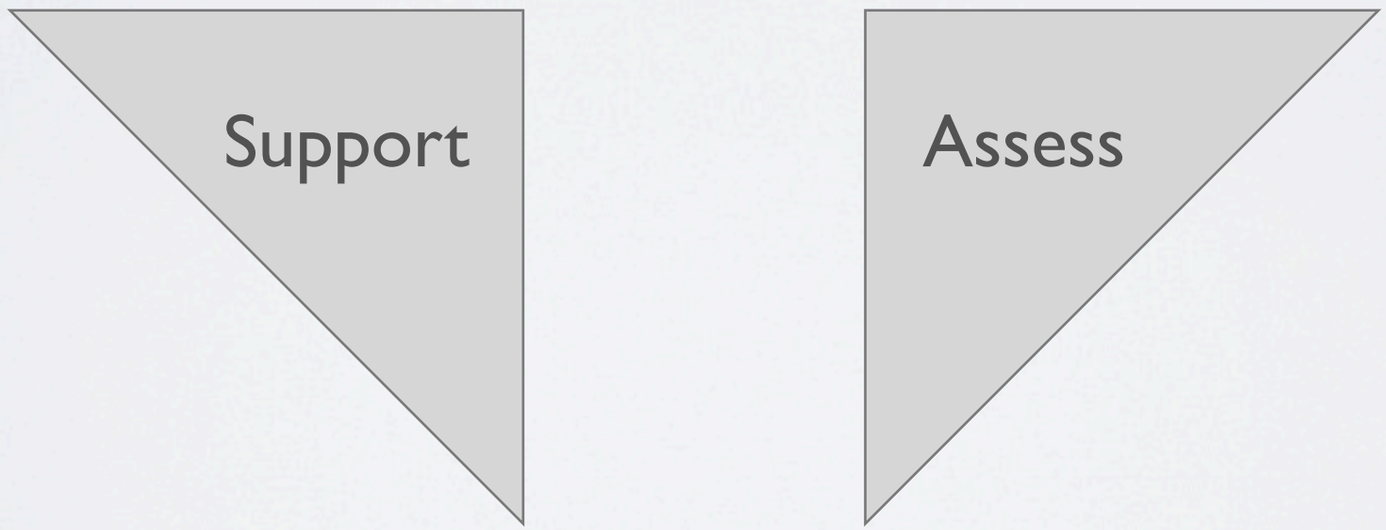
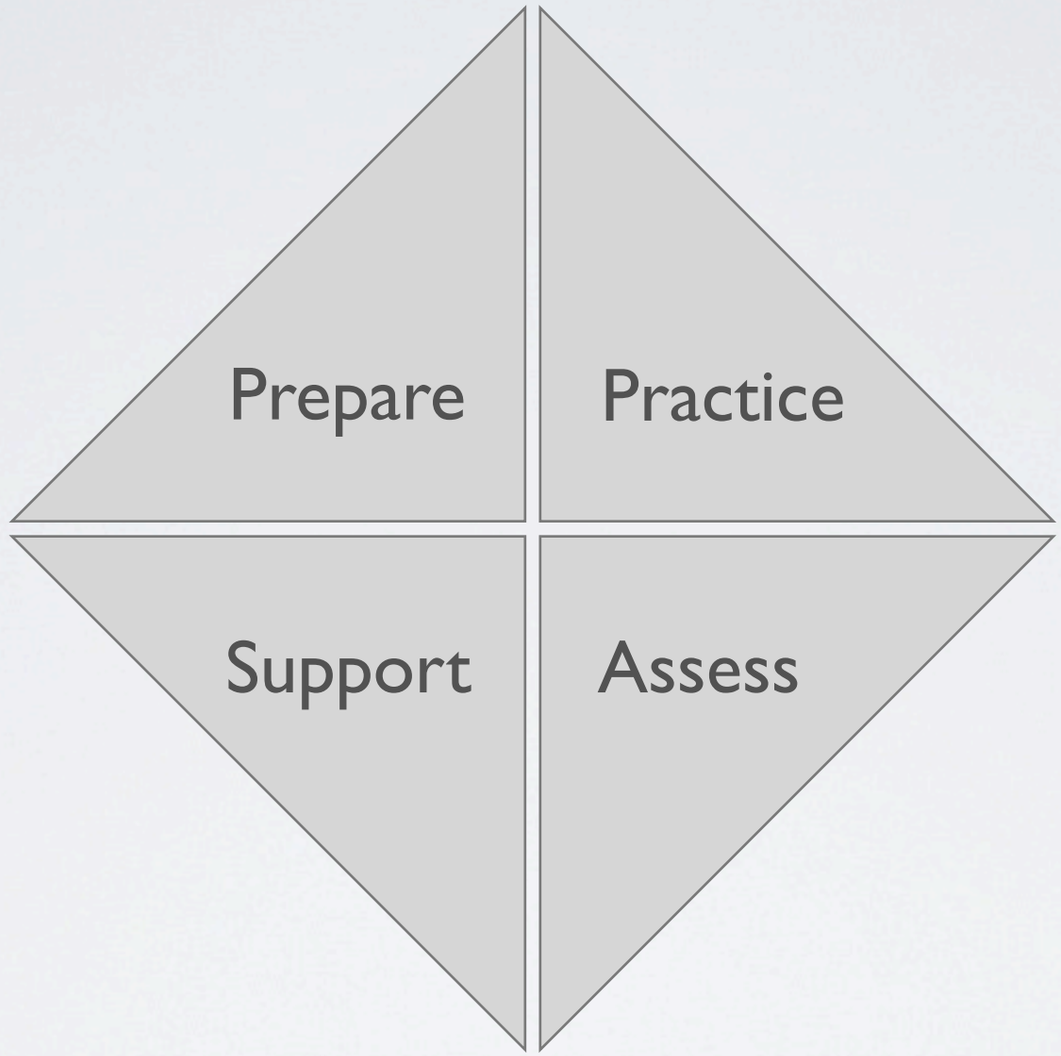

Prepare
Practice
Assess
Support


Prepare
Practice

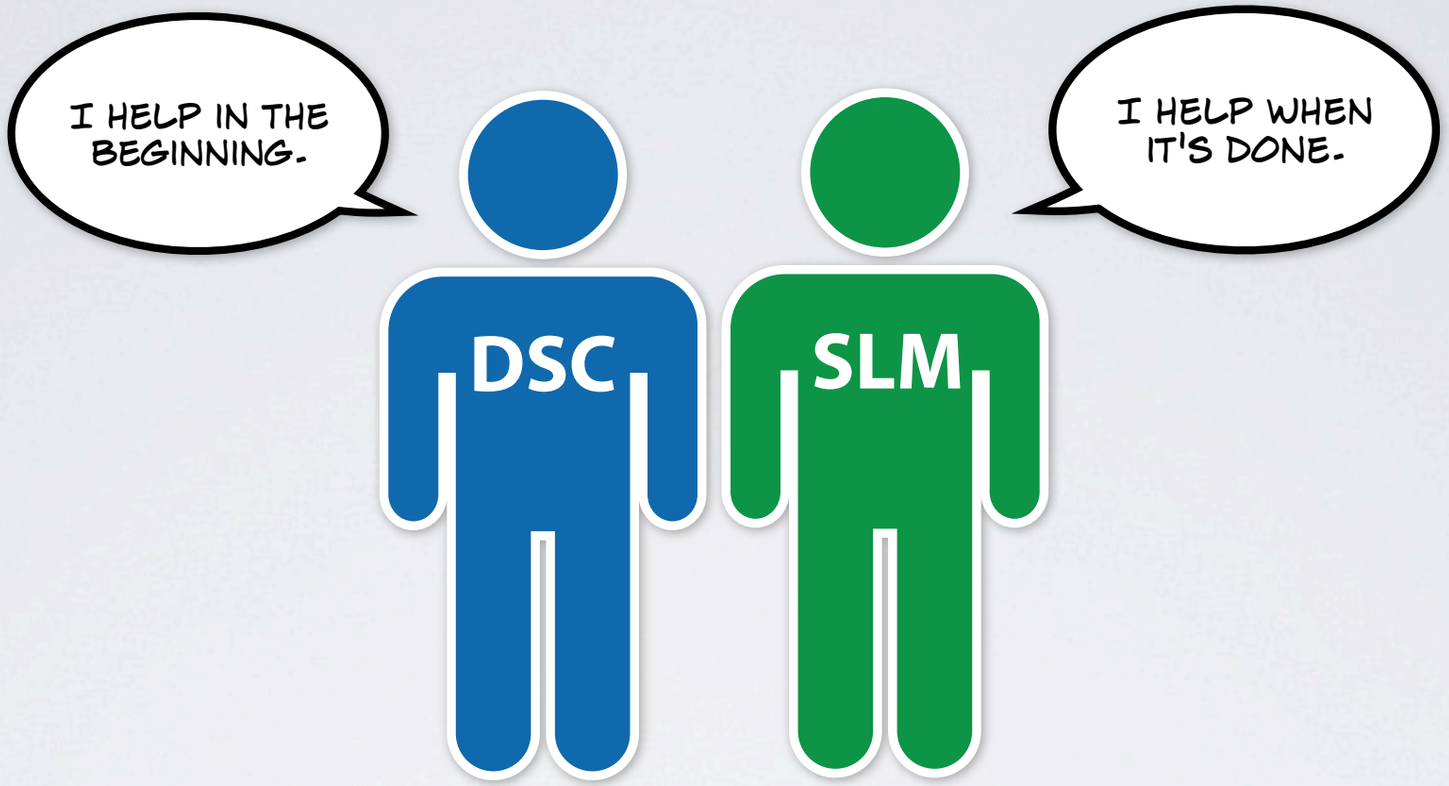

Support
Assess


Prepare
Practice
Support
Assess

Human Side | Process Side

Many of the folks that initiate digital solutions don't do this stuff full-time.

Human Anchors



FEA | Select & Estimate | Pre-Design Analysis | Resource | Contract | Design | Develop | Deploy | Lifecycle

is a Performance Consultant & Guide

Provides

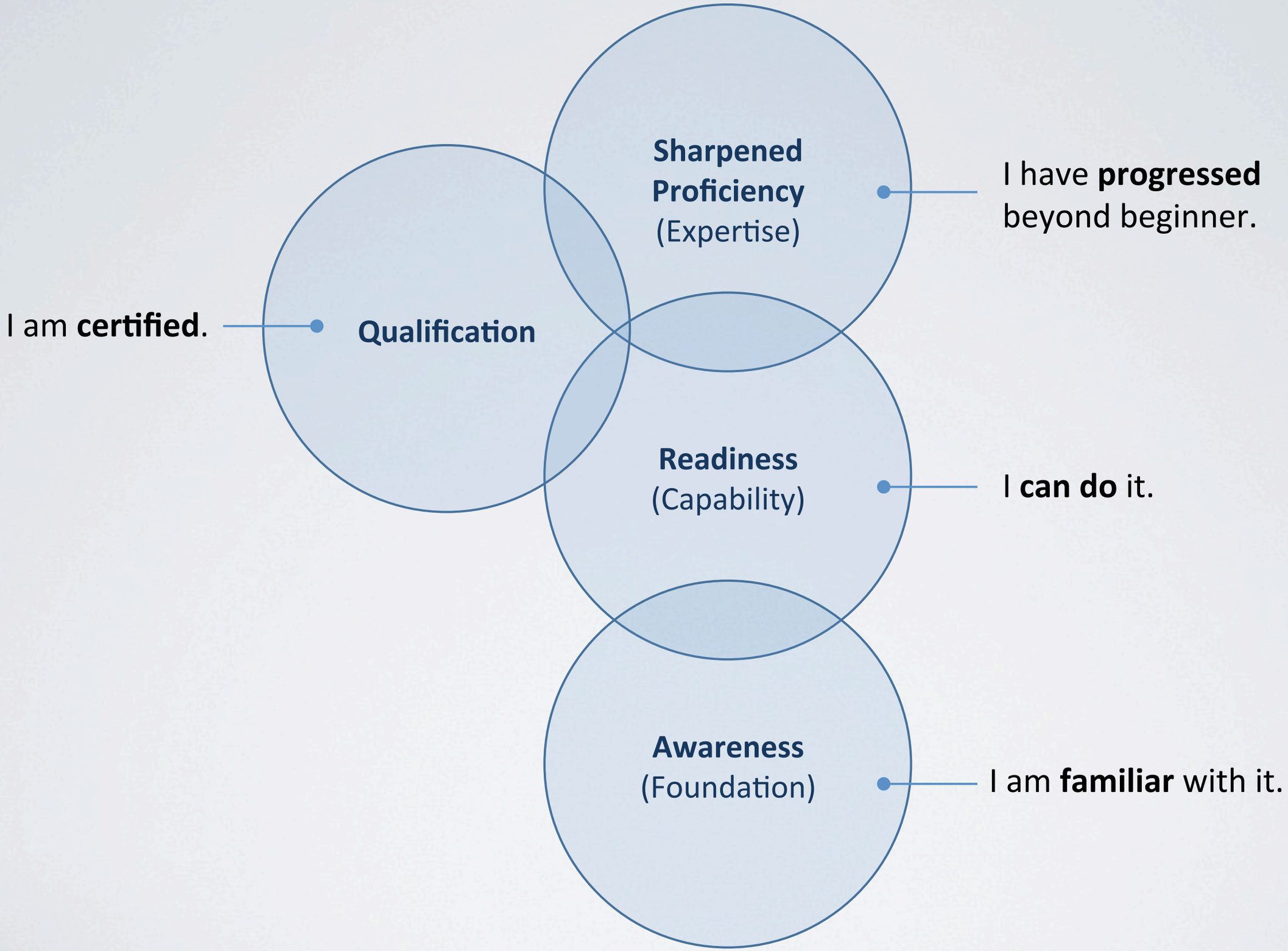
- Recommendations
- Technical Insight
- Estimates

Participates in Pre-Design Analysis

Supports the Development of an SOW

DSC Tools and Network

Expectations


Sharpened Proficiency (Expertise)
I have **progressed** beyond beginner.
I am **certified**.
Qualification
Readiness (Capability)
I **can do** it.
Awareness (Foundation)
I am **familiar** with it.

Performance Requirements

Performance Requirements

Tasks (Actions and Results)

Performance Requirements

Tasks (Actions and Results)

Suitability

Worksheet: Suitability

Complete this worksheet to determine whether Self-Paced eLearning could be an appropriate solution to your performance problem. This should provide an indication of suitability. A DSC can help you narrow and validate your selection.

Tasks that meet one or more of these descriptions indicate potential suitability.	
	Training needs to reach a large number of people.
	Audience is widely dispersed and operates on varied schedules.
	Audience members have varying skill levels and experience.
	Tracking and reliable accountability of skill acquisition or information exposure is required by policy or for qualification.
	Performance concepts or information may change frequently.
	Skill practice is required and real equipment or a simulator is impractical or practice of dangerous tasks is required.
	Continuous practice, frequent refresher, or retraining is required to maintain currency.
Tasks that meet one or more of these descriptions indicate the task may not be suitable.	
	Performers don't have access to the technology needed to deliver the solution or technical support will be unavailable.
	Leadership or management at any level of the organization may not accept, support, or commit to the solution.
	The training is optional. Elective training elements may not get enough use to provide value.
	Task requires observation of physical performance for qualification.
	Users will not accept the solution.

See the next page of this worksheet for a question series that can increase effectiveness of the training solution.

These factors can also influence a method selection.	
Solution Context	*Where and how does the learner require performance support or skill development? Does the learner need to:* • **Learn new skills** in anticipation of performance • **Extend existing skills** to advance capability • **Refresh existing skills** for currency • **Recall and apply skills** for performance after training • **Update skills** after system or process has changed • **Leverage tools** for performance in lieu of training • **Respond to an urgent requirement** to perform a new task

Version 8/24/2011

Resources	Cost is a large factor in the selection of a solution. The budget and cost estimate should also frame value expectations in each deliverable. • *What is my budget?* • *How does the cost of the solution weigh against the cost of the problem?* • *Would a cheaper solution solve my problem almost as well?* • *When do I need the solution?* • *How much time do I have to commit to the solution?* • *Do I have reviewers / SME's available?* A solution consultant can help you nail down resource costs and commitment requirements. Contact the ADL Program Office or Performance Technology Center to schedule a

Digital Solution Consultant

Solution Lifecycle Manager

Solutions need love too.

is the Solution Historian.

Provides

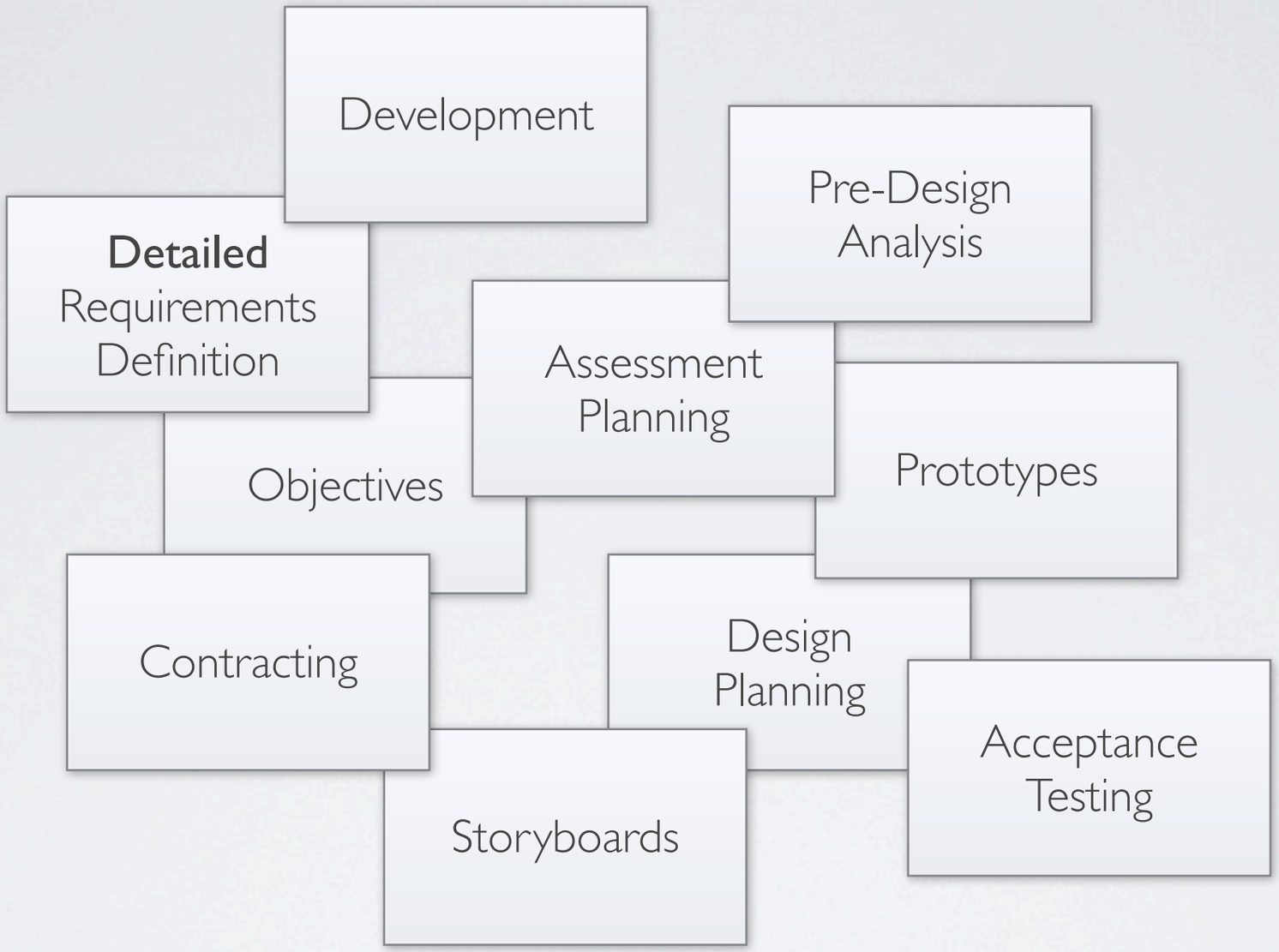
- Periodic Reports
- Evaluation Data
- A Single Point of Contact

FEA	Select & Estimate	Pre-Design Analysis	Resource	Contract	Design	Develop	Deploy	Lifecycle

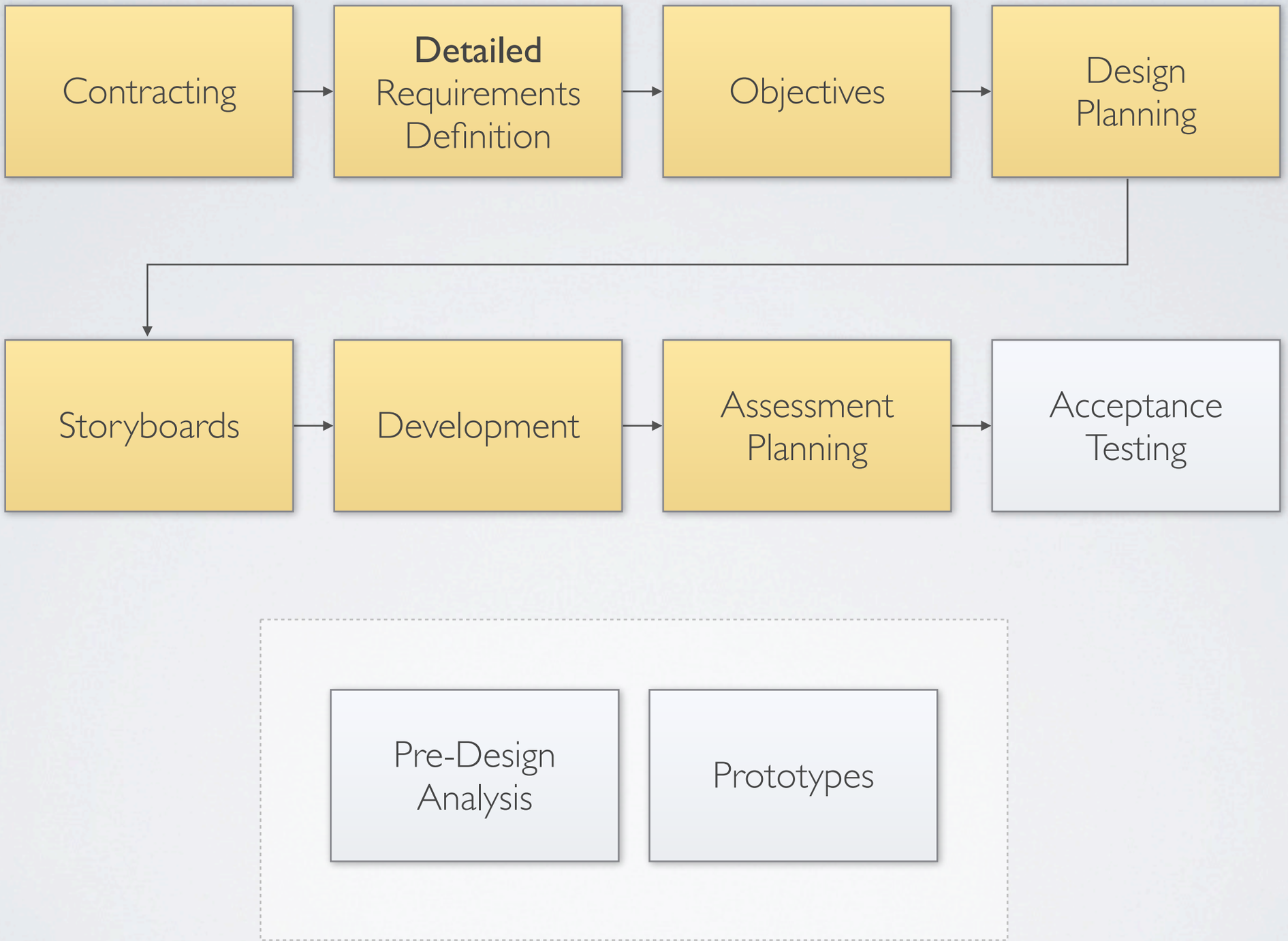
Human Side | **Process Side**

Process Anchors

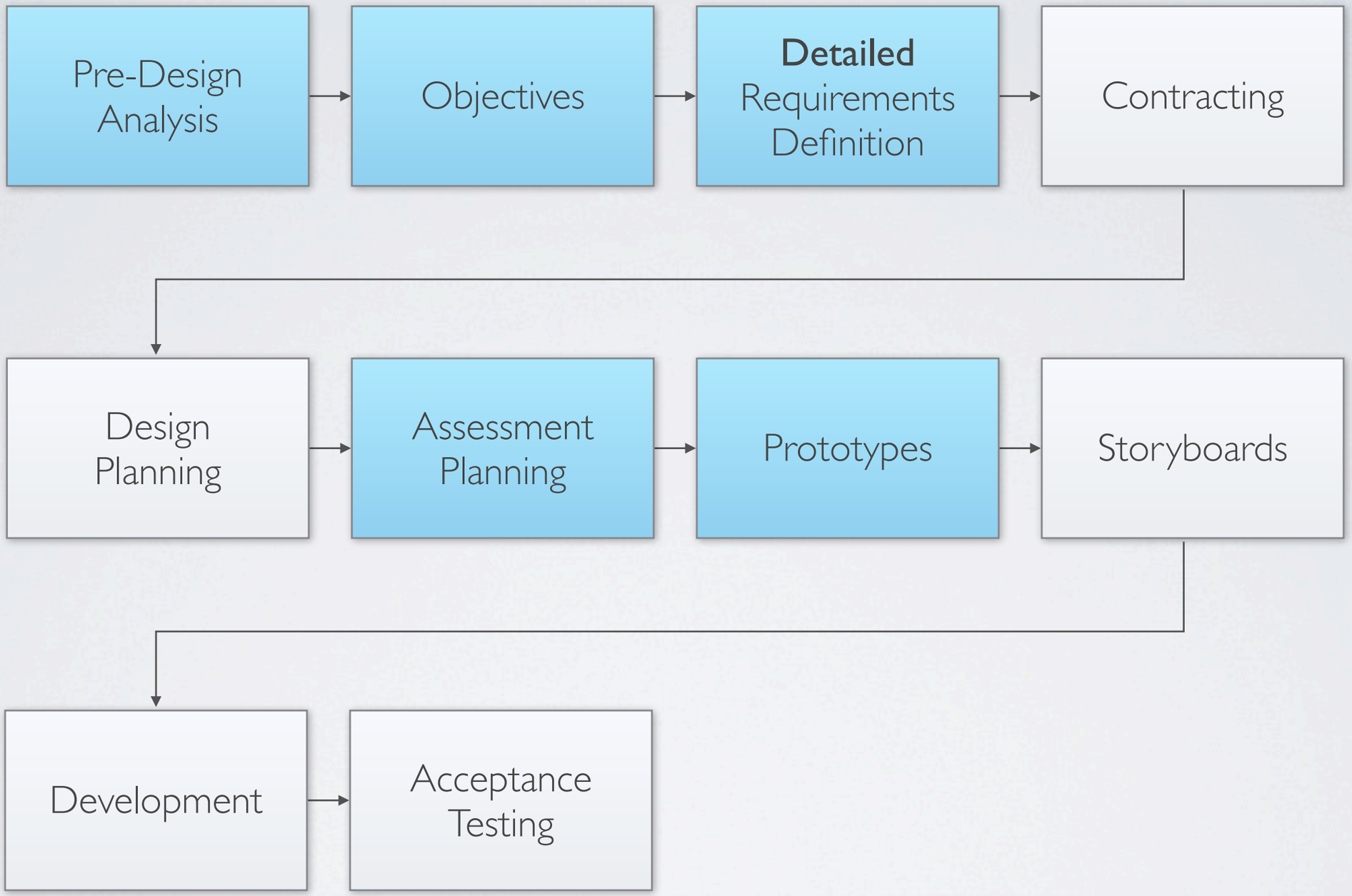
Out of
Order


Development
Pre-Design Analysis
Detailed Requirements Definition
Assessment Planning
Objectives
Prototypes
Contracting
Design Planning
Acceptance Testing
Storyboards

Typical Lifecycle (in many cases)



Preferred Lifecycle



A Layered Process

Assessment Strategy
Objectives
Measurement Opportunities
Practice Opportunities (think feedback)
Skills and Sub-Tasks (overt and covert)
Tasks
Performance Requirements
SO SHOULD THESE.
THESE SHOULD BE REALLY CLEAR BY NOW.
WHAT SHALL WE MEASURE?
SKILL DEVELOPMENT TAKES PRACTICE.
HOW DO THE TASKS BREAK DOWN TO SKILLS, CONCEPTS, VALUES AND "THINKING TASKS"?
WHAT DO WE WANT PEOPLE TO DO?
WHAT'S THE END-GAME?

Pre-Design outputs validate method selection

Inputs from Analysis

Category Selection

Method Selection

Initiation

Pre-Design Analysis

Statement of Work (If external)

Project Plan

TM and DSC Consult; Alignment with Customer

SME Interviews

Self-paced eLearning Design Phase

Design Document

Design Flow

Assessment Plan

Functional Prototype

Scripts and Storyboards

Development

Client / SME / ADLPO / COTR Review

Acceptance Testing

Deployment & Closure

Lifecycle Sustainment

Feedback

Evaluation

DSC

DSC

Pre-Design outputs validate method selection

Statement of Work (If external)

Inputs from Analysis

Category Selection

Method Selection

Initiation

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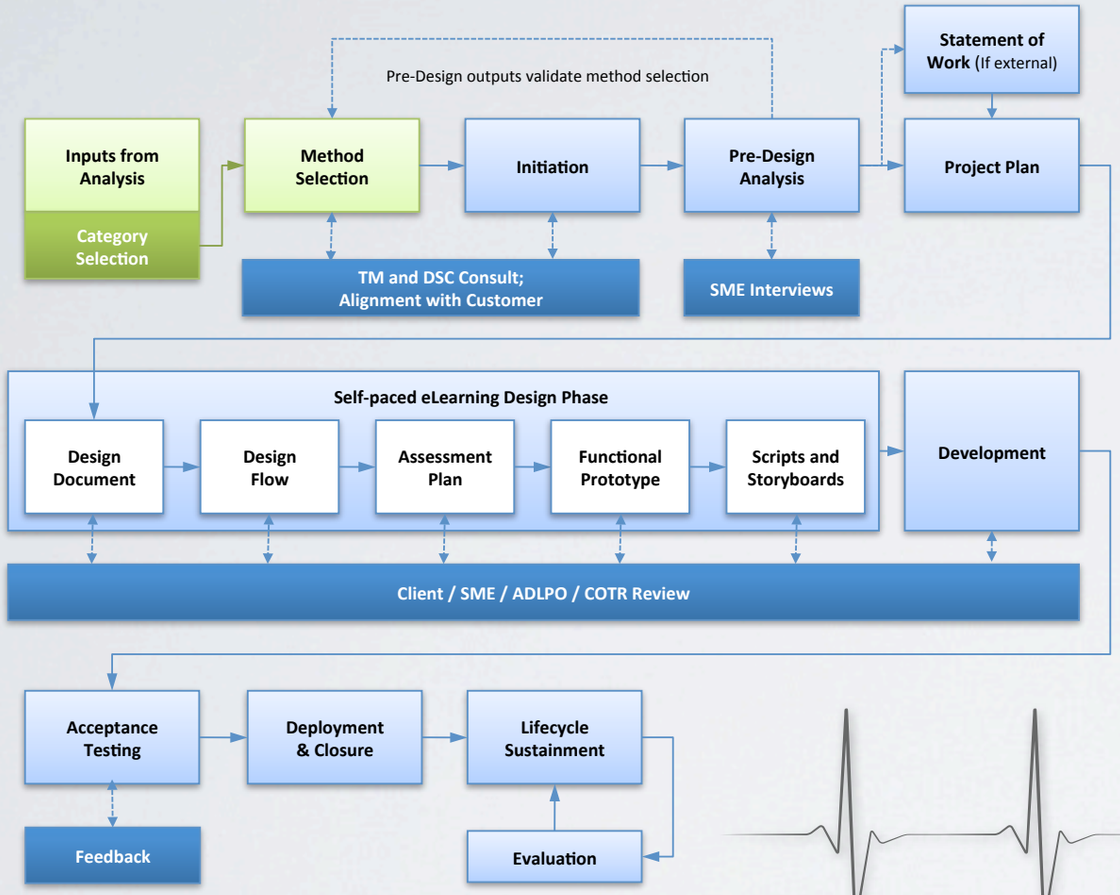
Deployment & Closure

Lifecycle Sustainment

SLM

Feedback

Evaluation



Tuning the Process and Human Sides for Consistent "Signs of Lifecycle"

Thank you!

Steve Flowers

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