

Target Value Delivery – Mod. 2
Setting the Stage for Success

Tammy McConaughy – CRB Julie Glassmeyer – G3C, LLC

October 24, 2023

# Lean Construction Institute Immersive Education Program

### Presenter Highlights



Tammy McConaughy



Julie Glassmeyer



Ryan Little



#### LCI Course:

Target Value Delivery Module 2: Setting the Stage for Success 4 CEU

Sign the sign-in sheet for credit



#### **TVD Modules**



#### Module 1: Learning the Fundamentals

 Gain insight into how implementing TVD approaches improves project outcomes through an overview of the phases and key components of TVD.

#### Module 2: Setting the Stage for Success

 Discover how creating early alignment and understanding of the owner's Business Case, Value Statements and Conditions of Satisfaction will lead to successful outcomes and how these foundations become the anchor for future decisions.

#### Module 3: Organizing for Flow and Efficiency

 Discover how teams can be challenged with maintaining effective processes and engagement through creating a cross-functional work cluster organization as a highly effective means of driving innovation and productivity through concurrent work.

#### Module 4: Modeling for Predictable Outcomes

 Experience a framework for predictive cost modeling, target setting and rapid innovation capture in collaborative TVD environments.

# Learning Objectives





Discover the importance of a strong business case to the success of Target Value Delivery



Gain basic skills to be able to start aligning the business case with the owner and the team through customer Value Statements and measurable Conditions of Satisfaction.



Discover the connection between the Business Case, owner Value Statements and Conditions of Satisfaction, and team alignment.



Identify various ways to develop a high performing team rapidly through interviewing, onboarding, and operational alignment.

### Lean Journey to Mastery



Mastery Competency Competency **Building Loop** How will you reach Understanding the next level on Continuous your journey? Learning You Are Here **Awareness** Unaware

#### ean Construction Institute mmersive Education Program

# Rules of Engagement



This is a safe zone



**Everyone has equal status** 



Speak up and share your ideas



Actively listen to others



One conversation at a time



Use E.L.M.O.



Silence phones



Be focused and engaged



Stay on time



Have fun!

# **Project Elements**



Lean teams organize in a structure that leads to improved coordination, outcomes and shared leadership.



A Lean Operating System is a organized implementation of Lean Principles and Tools combined to allow a team to operate in unison to create flow.

Lean can be implemented regardless of commercial terms: Design-Bid-Build, Design-Build or Integrated Project Delivery. The degree of implementation varies with the terms.

#### Six Tenets of Lean Construction



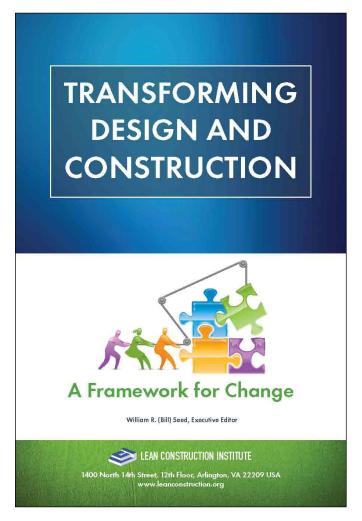
- 1 Respect for people
- 2 Optimize the Whole
- 3 Generate Value
- 4 Eliminate Waste
- 5 Focus on Flow
- 6 Continuous Improvement

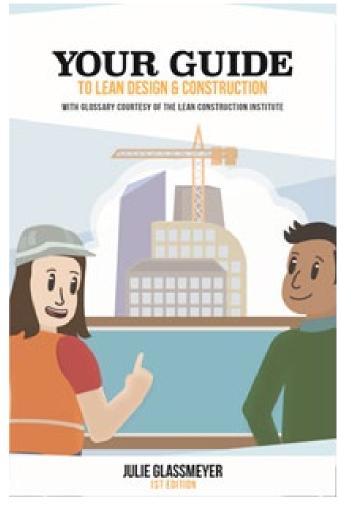


#### References



**TARGET VALUE DELIVERY CURRENT STATE 2016** Executive Editors: Kristin Hill, Katherine Copeland and Christian Pikel ean Construction Institute 1400 North 14th Street, 12th Floor, Arlington, VA 22209 USA





# Setting the Stage for Success

Lean Construction Institute
Immersive Education Program

1:00-1:30 Welcome & Introductions

1:30-2:50 Business Case Planning-What, Why, How

2:50-3:05 Break

3:00-4:00 Partner Selection

4:00-5:00 Planning for Success and Closeout



#### Introduction / Ice Breaker



- Introduction: Who you are? What is your role in the industry?
- What do you want to gain from this workshop?



10 MINUTES TABLE DISCUSSION 5 MINUTES REPORT OUT



### Target Value Delivery is...



Last Planner System

**Culture** 

**Value Definitions** 

**Early Stakeholder** 

**Last Responsible** 

**Schedule** 

Involvement

**Moment** 

Partner Set-Based Design

**A3 Problem** 

Choosing by

Mitigation

**VDC/BIM** 

**Selection** 

Solving

Advantages (CBA)

Big Room

by Value

Retrospectives

Big Room

& Learning

Risk

**Work Clusters** 

Validation & Business Case

Team
Health

Cost

transparency

**Conditions of Satisfaction** 

**Onboarding** 

**Shared savings** 

**Team** 

**Production Planning** 

Leadership development

**Co-Location** 

**Constraints** Building

Carly Stakeholder Scope

**Conceptual Estimating** 

Prefabrication planning

& execution

Early Stakeholder Involvement



# Target Value Delivery (TVD) Overview



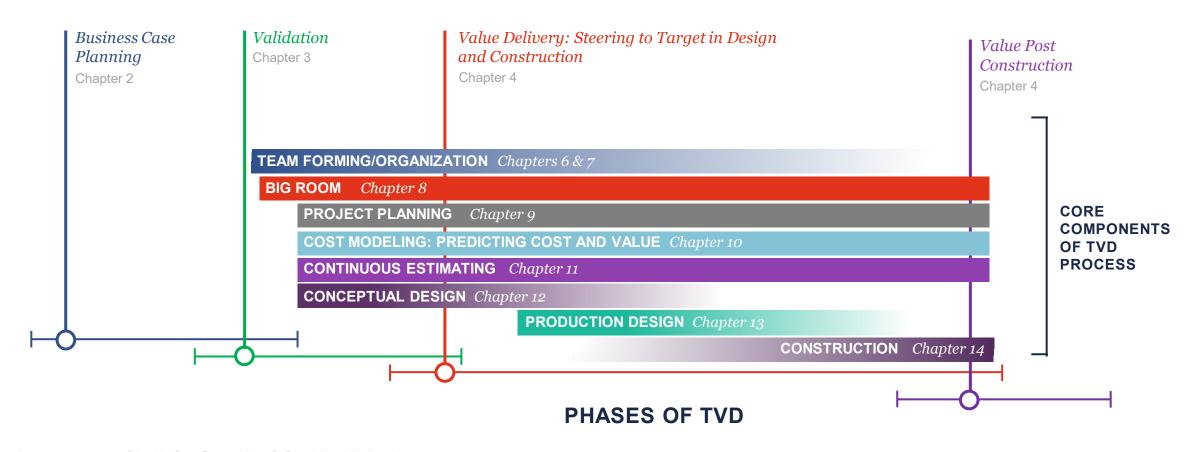
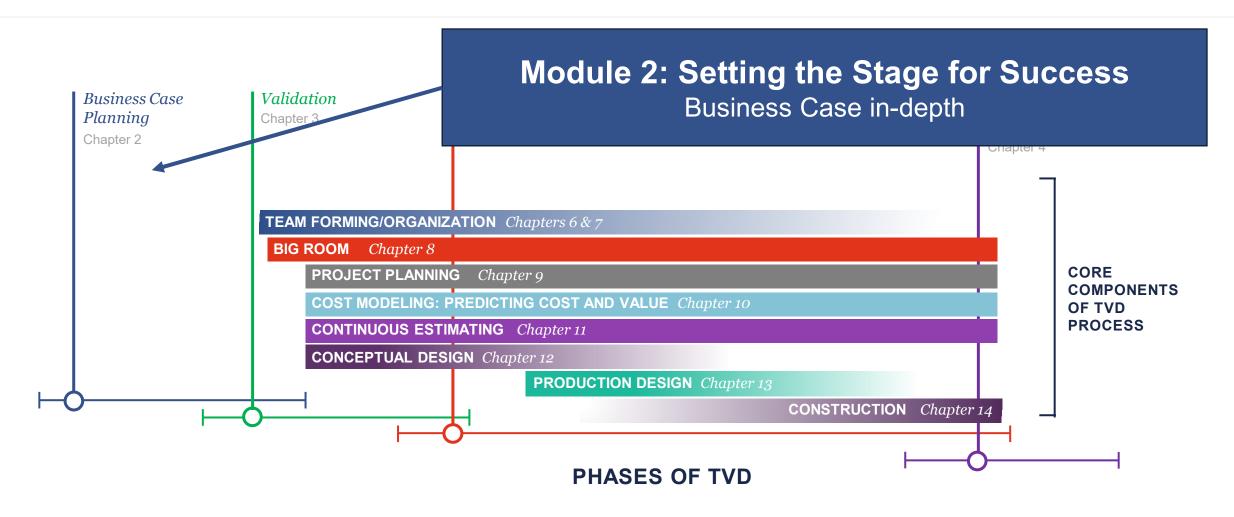


Image courtesy of InsideOut Consulting & Southland Industries

# Target Value Delivery (TVD) Overview





# Target Value Delivery (TVD)



A disciplined management practice to be used throughout the project to ensure:

The facility meets the operational and performance needs and values of the users.

The project is delivered within the allowable budget, schedule, and intended scope.

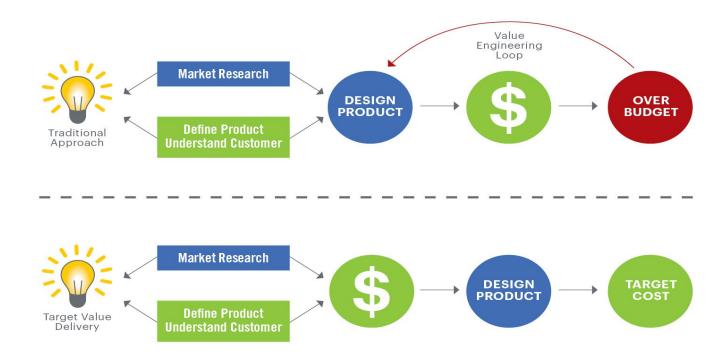
 That innovation is promoted throughout the process to increase value and eliminate waste.

# Traditional vs. Target Value Delivery



The goal of TVD is to minimize the waste produced by the design, estimate and redesign cycle(s) of the traditional value engineering approach.

#### Cost is an output of design



Cost is an *input* of design

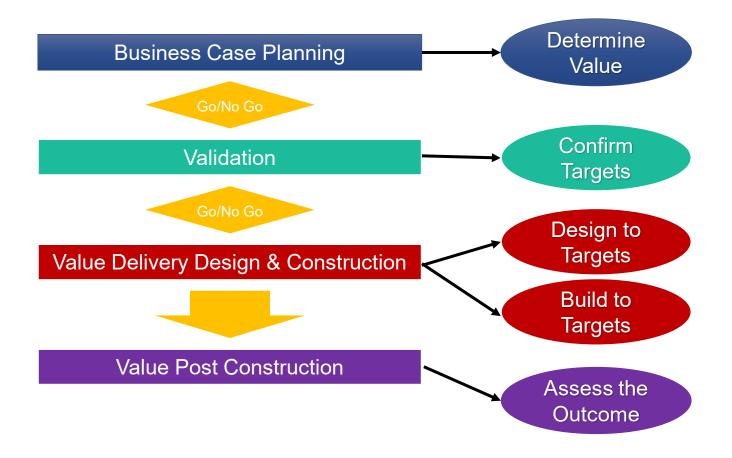
# Business Case & Value Definition Statement



#### **TVD Phases Overview**



#### **Target Value Delivery Phases**



### **Business Case Planning Phase**



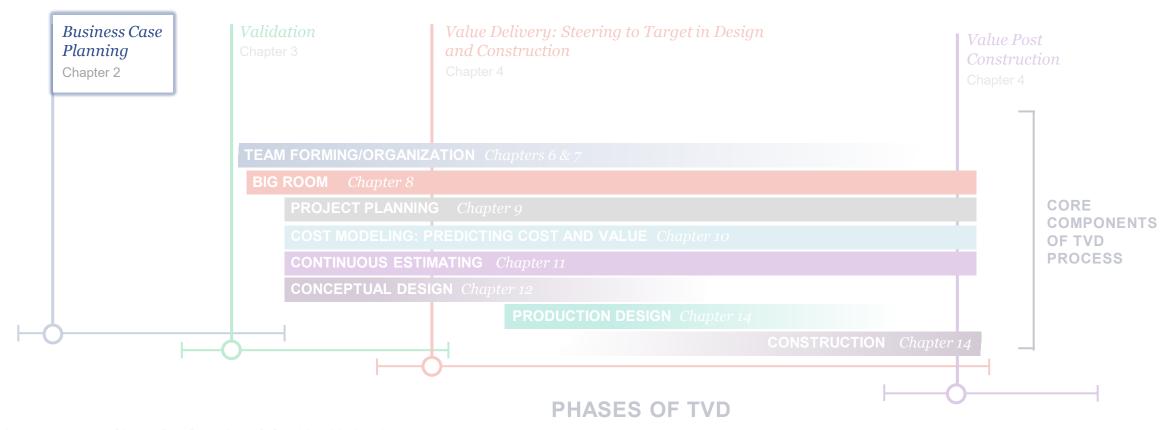


Image courtesy of InsideOut Consulting & Southland Industries

#### **Business Case Phase**



 The operational use/benefit proposition described by the owner that initiates the development of the project.

- The owner-provided purpose or "why" that becomes the anchor of the project.
- Sets the Allowable Cost.
- Includes Value Definition Statements by the owner for the project.

# Framing the Business Case



### Could we build **X** thing for \$**Y** and have it by **Z** date?

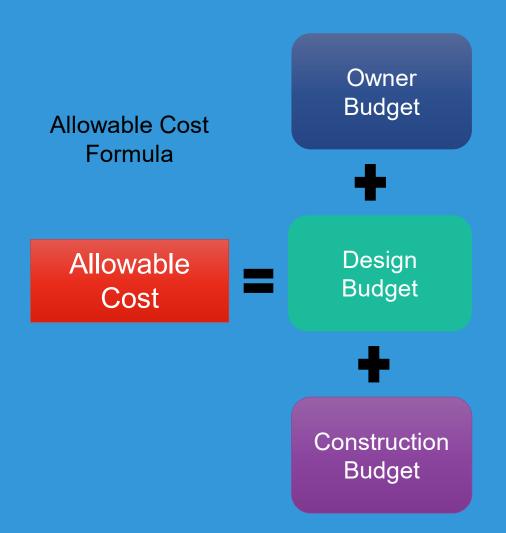
- Could we open a replacement hospital in Castro Valley, CA for \$300 million by early 2027?
- Could we find a way to increase overall visitor count by X% for a capital expenditure of \$1 billion by 2030?

#### Allowable Cost:



 The absolute maximum project cost based on the Business Case.

- Should include all costs associated with delivering the project.
- It becomes the subject of the *Validation Phase.*



# Lean Construction Institute Immersive Education Program

# **TVD Cost Terminology**

#### **Allowable Cost**



The amount the owner is willing to spend for the total project.

**Business Case Planning Phase** 

# Lean Construction Institute Immersive Education Program

#### Value is NOT \$\$\$\$

How do you determine you've received a good VALUE in goods and services?

Is the customer willing to pay (time, money, energy & effort) for it?

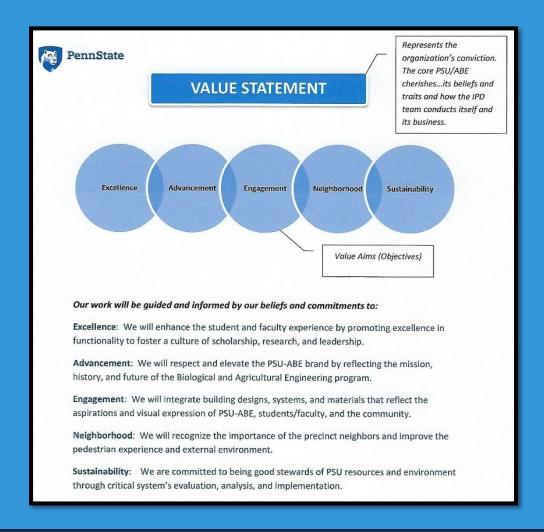


WARREN BUFFETT

#### Value Definition Statements



- Define what the customer wants from the process.
- Are composed of high level statements that describe expected outcomes, or "value" that the project will deliver.
- Should not be ranked or weighted.
- Should include all stakeholder input.



### Examples



#### **Business Objective**

#### Can we:

Design & Build a state-of-theart facility

that will increase our throughput by 3%

for a capital spend of \$250M

by 01/10/2027



#### **Value Statements**

- Applying passion and commitment to cure cancer.
- Leading the way in the industry through innovation.
- We do what we say and stay accountable to the community, our stakeholders and our teammates.

# Lean Construction Institute Immersive Education Program

### Project Club House

- LCI has decided to partner with a national non-profit to build a clubhouse that will be donated to a local elementary school.
- We have committed to building (1) Play/Learn Clubhouse this year utilizing lean principles with our LCI members.
- They have identified an elementary school (Pre-k thru 2nd grade, kids aged 4-8 years old) in an underserved community as the recipient of the clubhouse.
- LCI has raised \$55,000.00 to go towards the clubhouse
- The LCI would like to cover the material and labor cost of building the clubhouse and be able to completely furnish it. It would be nice to provide playsets such as a kitchen playset, etc. if savings allow



#### Value Statements



- Review the project business case and organizational values provided.
- Brainstorm value definitions based on the information provided
- 1-3 Value definition(s)
- Report out:
  - What did the team experience in brainstorming values?
  - Was everyone aligned? Why or why not?

Each Table –
10 Mins for discussion
10 Mins for report out



### Project Clubhouse Value Statements

• Prioritize decisions that prioritize the well-being and educational needs of students and the local community, emphasizing the development of personal and learning skills to reduce educational disparities and bolster exceptional teaching.

• Forge purpose-driven relationships founded on unwavering respect and integrity, fostering a harmonious environment for students, staff, and neighboring communities.

• Leverage industry resources, cutting-edge technology, and modern tools to deliver the highest standards of quality and safety, ultimately enhancing the students' exposure to and experience of the educational environment.

# Conditions of Satisfaction (CoS):



 Are developed by the team informed by the Value Definition Statements.

Measurable (Qualitative or Quantitative)
 statements that inform a project team about
 which tests a project must pass to be accepted
 as a success.

- Inform the decision-making process of the team.
- Are developed by the team, including the owner.

#### CONDITIONS OF SATISFACTION IMPROVE THE AVERAGE DOOR TO DISCHARGE TIME DECREASE THE NUMBER OF FALLS FOR THE EMERGEN DEPARTMENT BY 5 %. UTILIZE THE LAST PLANNER SYSTEM TO TRACK AND MANAGE CONSTRAINTS WITH A 75% OR GREATER PPC BIM COORDINATION TO BE DONE THROUGH **EXCELLENCE IN SAFETY: 95% EXCELLENT RATINGS AND** ZERO LOST TIME INCIDENTS. EXCELLENCE IN HOUSEKEEPING: 90% EXCELLENT RATING INNOVATION BY PREFABRICATION ALL TEAM MEMBERS WILL GO THROUGH ONBOARDING

### Examples



#### **Business Objective**



#### Can we:

Design & Build a state-ofthe-art facility

that will increase our throughput by 3%

for a capital spend of \$250M

by 01/10/2025

#### **Value Statements**

- Applying passion and commitment to cure cancer.
- Leading the way in the industry through innovation.
- We do what we say and stay accountable to the community, our stakeholders and our teammates.

#### **Conditions of Satisfaction**

- Be Engineering lot ready by 12/31/2024.
- Everyone makes a fair profit yet delivers within the target value.
- Everyone wants to work together again yet holds each other accountable and fosters creative conflict..
- Cashflow management: Do not spend/pay more than \$50MM tic before 12/31/2023

Courtesy of CRB

#### Project: Clubhouse





# What could Conditions of Satisfaction for Project: Clubhouse focus on?



#### **Conditions of Satisfaction**

- Finishes and furnishing are safe, durable and promote child well-being in a nurturing learning environment.
- Project savings from the design and construction of the project allow value add elements identified with teacher input on curriculum needs for explorative play and development.
- Full Target Value Delivery and Last Planner System are utilized in alignment with LCI standards.
- The project team enjoys working together, hold each other accountable and empower each other to remove wastes.
- Involve the community in the planning and construction through communication and volunteering opportunities.

#### **Business Case Phase**





What has your experience been and how is it different than what we just did?





10 MINUTES

# Building Your Team — Selecting Team Members

#### Team Forming/Organization



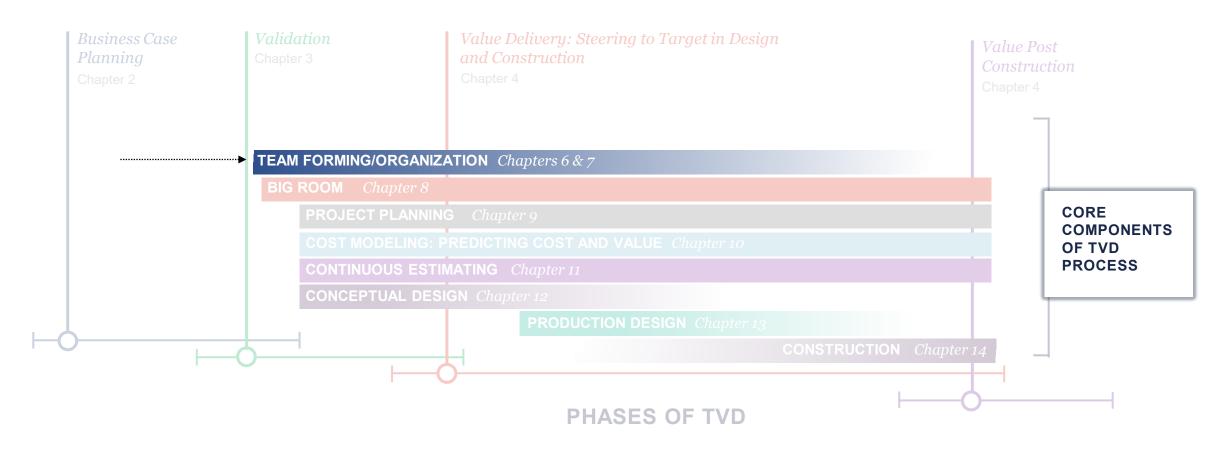
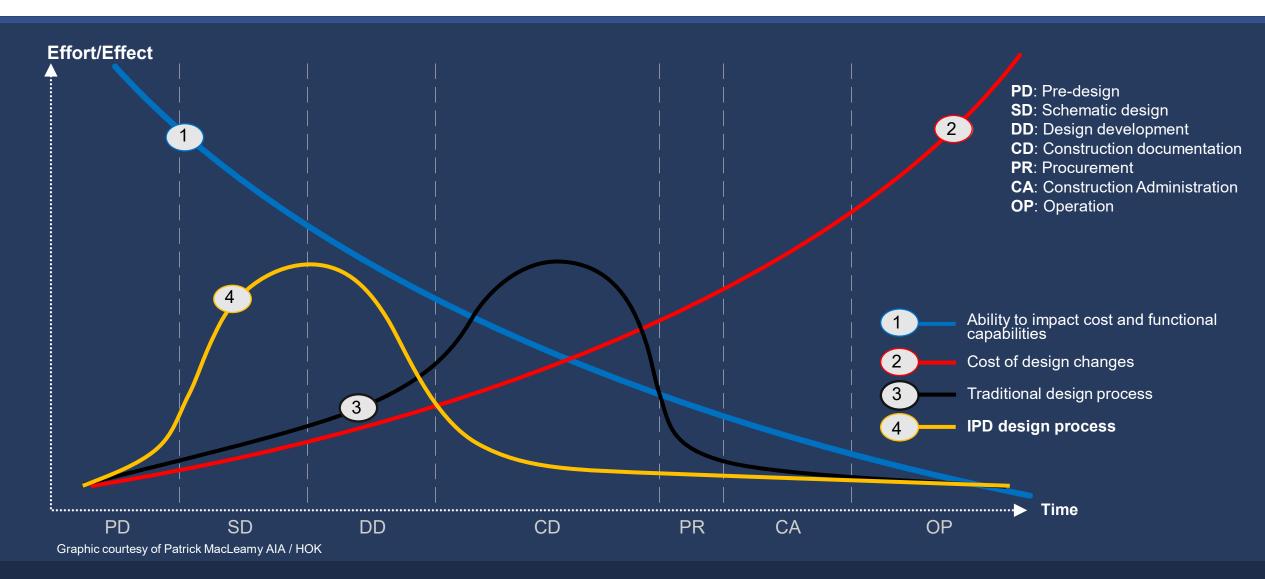


Image courtesy of InsideOut Consulting & Southland Industries

#### Early Team Involvement





#### Characteristics of High Performing Teams



- A high performing team is built on a strong foundation of trust among all members.
- There is a culture of respect that enables member to effectively deliver against CoS.
- High performing teams break down barriers through innovation and continuous improvement
- They break down traditional silos to maximize skills and optimize performance.



### Interviewing & Selecting the Right Partners

1 Different team selection strategies

2 Characteristics to look for in partners

3 Analyzing partner options



#### Examples

CHOOSING BY ADVANTAGES DECISION MAKING

#### **Mechanical Trade Partner CBA**

<u>Decision</u>																
Which mechanical contractor will provide the best value for the project needs.		MP1			Alternatives MP2											
Factor 1C: Team - Big Room Criteria: Prefer a team with prior Big Room experience.	Attribute:	(3) Project Big Rooms			(1) Project with Big Room											
	Advantage:	Trade Partner		er					Trade Partner #1			Trade Partner #2			Trade Partner #3	
Factor 1D: Team- Location Criteria: At least 80% of the project team is local and available in person.	Attribute:		Category		Criteria			Rating	Weigh	Score	Rating	Weigh	Score	Rating	Weigh	Score
		100% of the tea	Project Team		Team - Want an experienced, committed, and available team and commitment from senior management that project will be a priority.				10	40	2	10	20	3	10	30
				Culture - 1	Culture - Team embraces collaborative culture and has similar values to CRB.				10	30	2	10	20	3	10	30
Factor 2A: Lean Tools: Last Planner System Use Criteria: Has engaged and used Last Planner System in a project setting on more than (1) project	Advantage:  Attribute:  Advantage:		Design Assist	Modeling - Is Revit their standard design authoring platform for mechanical piping and sheetmetal? How many Revit Designers do they have and what level of experience? Are the designers internal resources or are they subcontracting?  Design Capability - Ability to design from P&ID's/Airflow Diagrams?  Understanding that design is an iterative process and there will be some rework. Commitment to complying with CRB Quality Program. Ask for Project Examples.						40	2	10	20	3	10	30
Factor 3: Project Delivery  Criteria: Experience with integrated project delivery (IPD) or similar approaches on at least (1) project.	Attribute:		Field Execution	Self Perfo sheetmet Last Plann committe Technolog	rm - What work are they propo al, plumbing, insulation? Local ter System - Does the TP have o d to supporting LPS? gy/Earned Value/Progress Rep ey will track progress. Field te	labor for experience orting Cap	ce, agreements with local e with LPS? Are they fully pabilities. Ask for examples	3 2 2	5 5 5	15 10 10	3 2 2	5 5 5	15 10 10	3 2 2	5 5 5	15 10 10

#### **Team Member Expectations**

- How do we expect the partner to engage with the team:
  - Culturally
  - Problem Solving
  - Collaboration
  - Innovation
  - Growth Mindset
- What capabilities and skillsets do we expect the trade partner to bring?
  - VDC/BIM
  - Estimating
  - Planning
  - Constructability

#### 10 Minutes





#### Partner Interview



- Prepare your team for our live interview.
  - 1) How would you apply Lean Principles & Tools to this project?
  - 2) Describe the leadership distribution for the team you would recommend?
  - 3) What suggestions do you have for specific incentives for the project shared risk and reward pool?
- Each team will assess the other teams by scoring them 1-5 (1 being not value add and 5 being Best Value add) and comments.
- Focus on Best Value to the project and the team
- Report out



6 minutes to prep
1 minute per question to
answer

- A different person must answer each question
  - (highlight your team)
- Group tally and decide best value team

#### **Building the Team**





# What should a TVD project/team kick-off include?

#### Early Planning for Success



- 1 Big Room / Work Cluster organization, schedule, and agenda
- 2 Continuous On-boarding Plan
- 3 Project Milestone Plan
- 4 Retrospective Schedule & Mitigation Commitment

#### Big Room is:



**Big Room** refers to a project approach of bringing key individuals together to:

- Collaborate, plan, update, solicit resources, invite feedback, demonstrate accountability, and schedule events in order to:
  - Speed communication and decision-making.
  - Reduce siloed thinking or approaches.
  - Compare the project's current state to the published goals or Conditions of Satisfaction.

#### Big Room is:



Big Room is a commitment to a project, the team and to working together!



## Wrap-up



#### Target Value Delivery (TVD) Overview



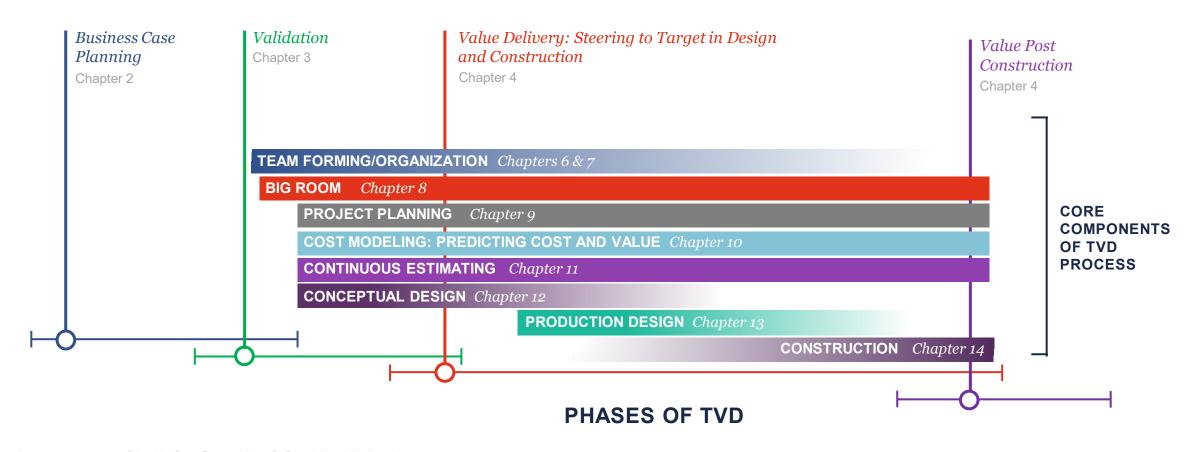


Image courtesy of InsideOut Consulting & Southland Industries

#### **Discussion Question**



What new actions or ideas that you learned today can you take back to your project?

#### Learning Objectives





Discover the importance of a strong business case to the success of Target Value Delivery



Gain basic skills to be able to start aligning the business case with the owner and the team through customer Value Statements and measurable Conditions of Satisfaction.



Discover the connection between the Business Case, owner Value Statements and Conditions of Satisfaction, and team alignment.



Identify various ways to develop a high performing team rapidly through interviewing, onboarding, and operational alignment.

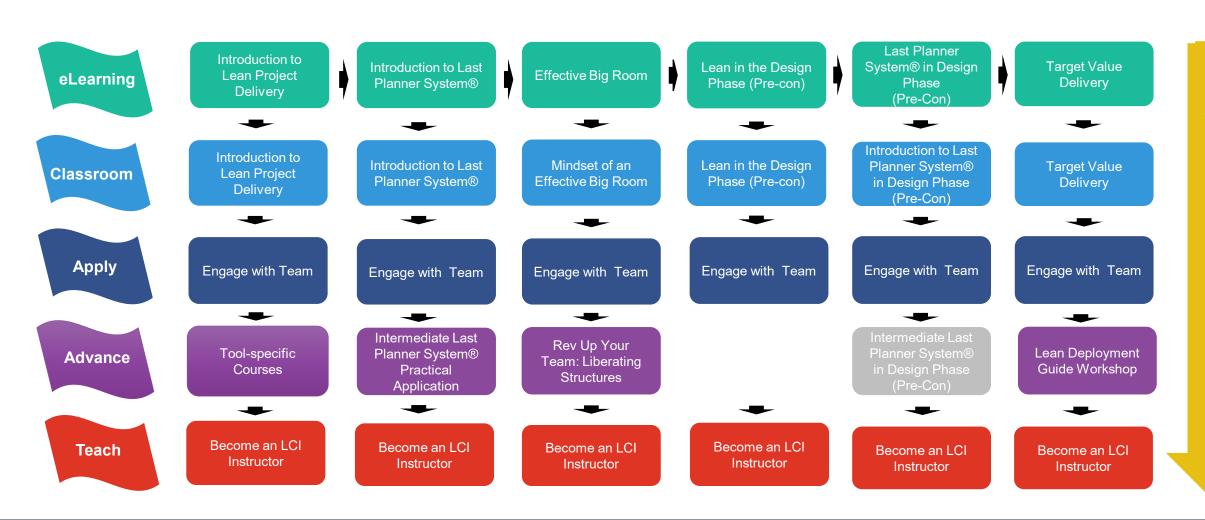
#### Lean Journey to Mastery



Mastery Competency Competency **Building Loop** How will you reach Understanding the next level on Continuous your journey? Learning You Are Here **Awareness** Unaware

#### Define Your Journey





type your text here

This course will allow you to gain in-depth insight to the practical application of the Last Planner® System (LPS) through multimedia, hands-on interactions, diagrams, worksheets, and more. The key achievable goal of this course is to learn how to engage at all five levels of LPS effectively on a day-to-day basis

with a team implementing the system.

#### eLearning Courses

Lean Construction Institute Immersive Education Program

INTRODUCTION TO LEAN PROJECT DELIVERY

The key achievable goal of this course is to prepare and enable

CONNECTING **PRINCIPLES** 

> LESSON 2: LESSON 3:

- Introduction to the Last Planner System®
- Introduction to Lean Project Delivery
- Lean in the Design Phase
- Effective Big Room
- Target Value Delivery
- Last Planner System® in Design



59

## Questions?



#### Conduct Plus/Delta

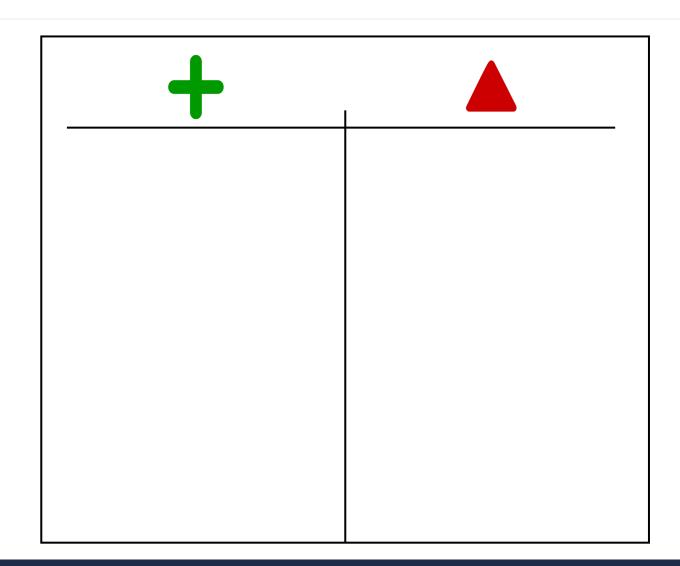




Plus: What produced value during the session?



Delta: What could we change to improve the process or outcome?



#### **Presenter Contact Information**

Tammy McConaughy – CRB

<u>Tammy.mcconaughy@crbgroup.com</u>
303.993.1820

Julie Glassmeyer – G3C, LLC <u>Julie@glassmeyerconsulting.com</u> 513.635.2730

Ryan Little – CRB

Ryan.little@crbgroup.com

#### **LCI** Website Information





www.LeanConstruction.org

### Section Divider









#### Presentation Style Guide

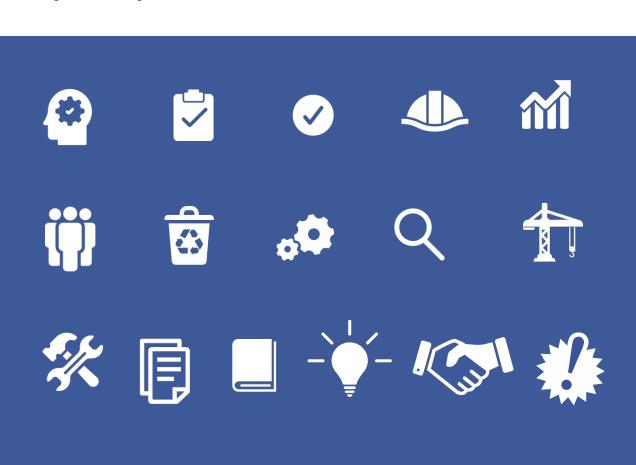
- Make sure guides are turned on. Click "View" on top ribbon then select guides
- Use the Provided Template Layouts and Arial font
- The Font color for text is Grey. Minimum font size = 28.
- Plan to spell out acronyms the first time they are used in your presentation
- Insert an image to each slide
- Keep each bullet at no more than 15 words
- Provide a glossary of acronyms from your presentation in the back
- Make sure to delete any unused slide layouts



#### **Icon Library**

These icons can be used throughout your presentation





#### Title Goes Here

Lean Construction Institute
Immersive Education Program

- Keep it short
- Keep it focused
- Keep it concise
- Keep it powerful

Use this text format for callouts, quotes, stats, or to draw attention to important text.



#### Title Goes Here

- Lorem ipsum dolor sit amet, consectetur adipiscing elit, sed do eiusmod tempor incididunt ut labore et dolore magna aliqua.
- Ut enim ad minim veniam, quis nostrud exercitation ullamco laboris nisi ut aliquip ex ea commodo.
- Duis aute irure dolor in reprehenderit in voluptate velit esse cillum dolore eu fugiat nulla pariatur. Excepteur sint occaecat cupidatat non proident, sunt in culpa qui officia deserunt mollit anim id est laborum.
- Sed ut perspiciatis unde omnis iste natus error sit voluptatem accusantium doloremque laudantium, totam rem aperiam, eaque ipsa quae ab illo inventore veritatis et quasi architecto beatae vitae dicta sunt explicabo.











