

# Manufacturing Technology Conference 2024

Kaizen Institute

**Design and Manufacturing – a seamless partnership**

# 35 year experience and still excited

MAUREEN BALSTERS



## Experienced Senior Executive, with over 35 years experience in Business Transformation and Continuous Improvement.

Enthusiastic, trustworthy, loyal and result oriented with a positive mindset. Experience in Sustainable Growth, Operational Excellence and Service Excellence, as well as leading business transformations in local and global organizations. Strong communication and leadership skills. Can engage easily with all levels in the organization and develop lasting relationships from shop-floor to C-level. Experience in growing team performance through coaching, training and mentoring.

KAIZEN™ achievements in a wide range of business processes and levels, from shop-floor improvements to strategy formulation and deployment. Experienced in working with different cultures within a global organization.



# Change for the better with everyone, every day, everywhere

## OUR MISSION



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**CHANGE**.....for the.....**BETTER**

**CONTINUOUS  
IMPROVEMENT**

**WE HELP LEADERS:**  
CHANGE FOR THE BETTER  
ACHIEVE OBJECTIVES OF PERFORMANCE IMPROVEMENT  
EMBED CONTINUOUS IMPROVEMENT CULTURES

# We deliver Value and Results, through our Consulting and Training Services

Founded in  
**1985**

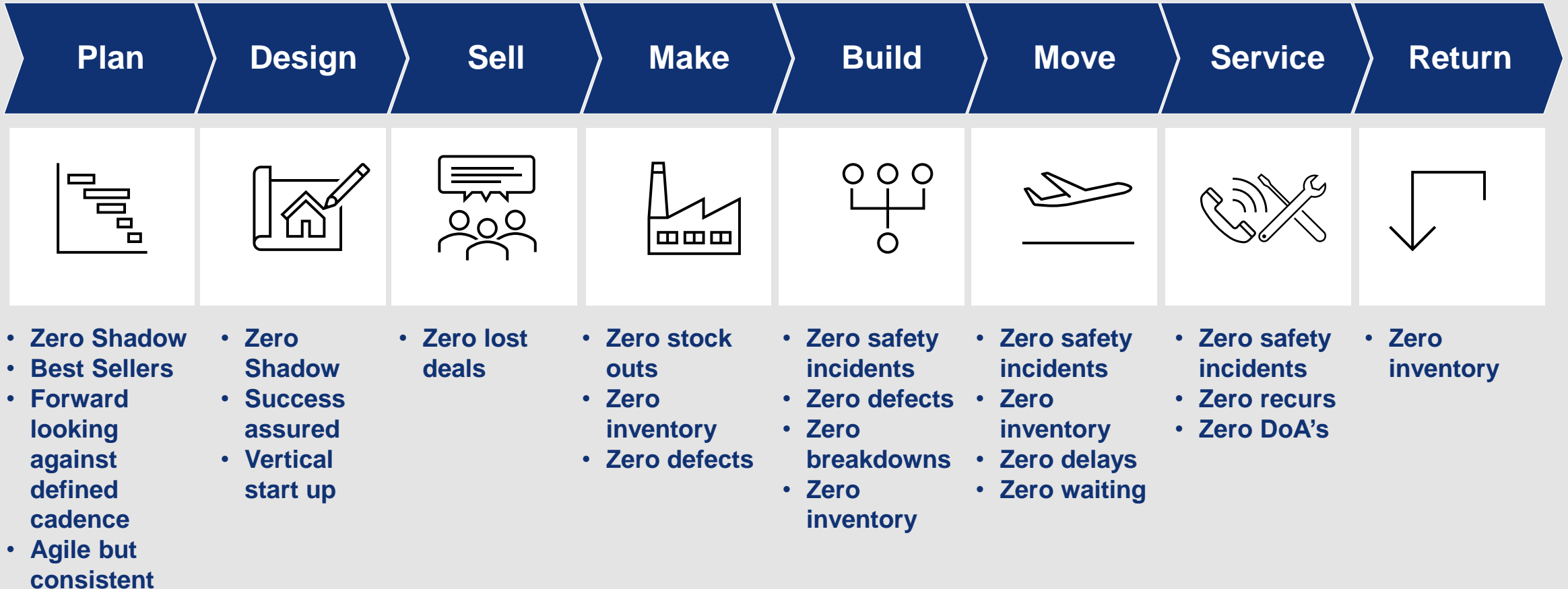
**+800**  
People

**+60**  
Countries

**+45**  
Sectors

# To be World Class you must be World Class across the board

## ZERO LOSS ACROSS THE VALUE CHAIN

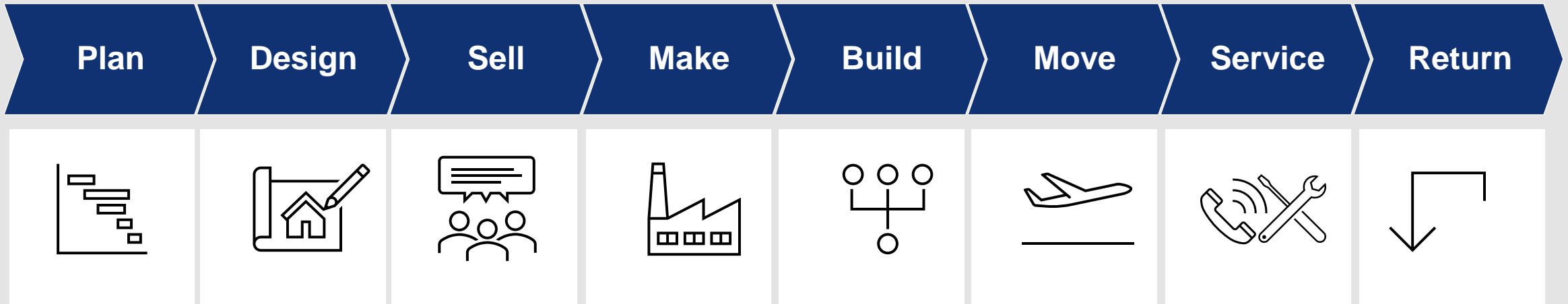




# Supply chains are hard to make work flawlessly

## SHARED PURPOSE

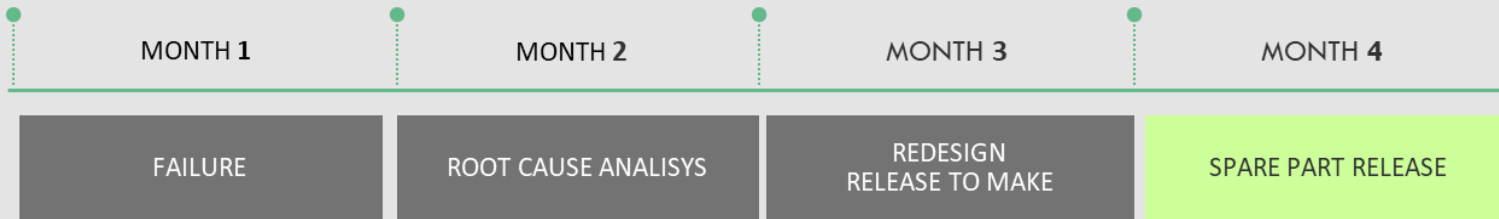
Multiple companies need to work together as we don't see many vertically integrated companies



- multiple priorities
- multiple strategies
- multiple expertise
- multiple plannings
- multiple values and beliefs
- multiple P&L's

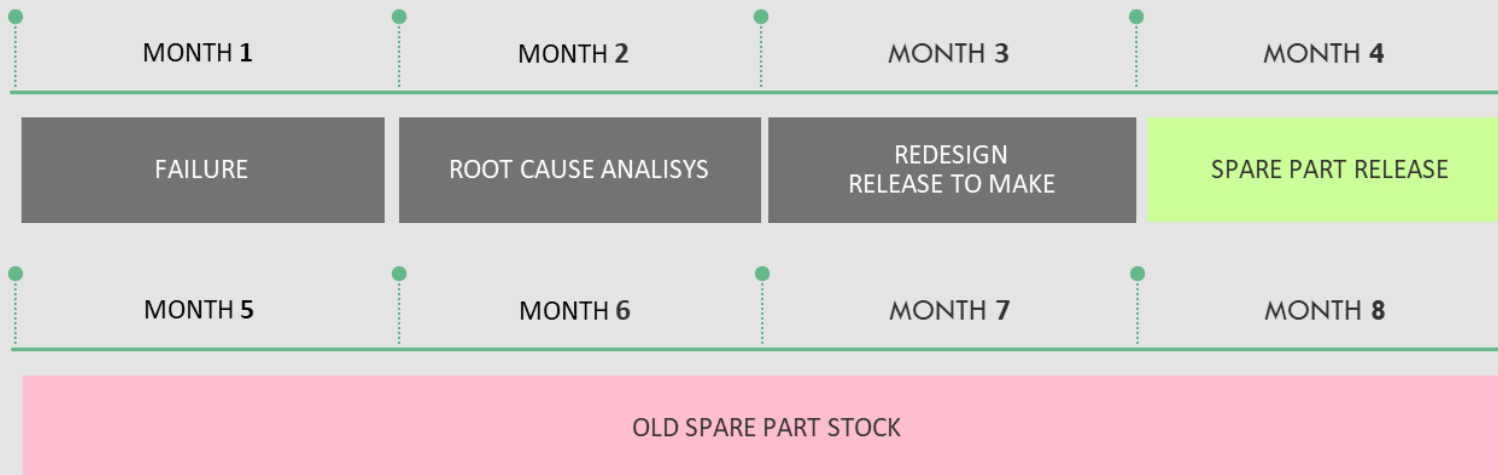
# Conflicting priorities wreak havoc on customer experience

THE SOLUTION IS THERE, IT NEVER REACHES THE CUSTOMER



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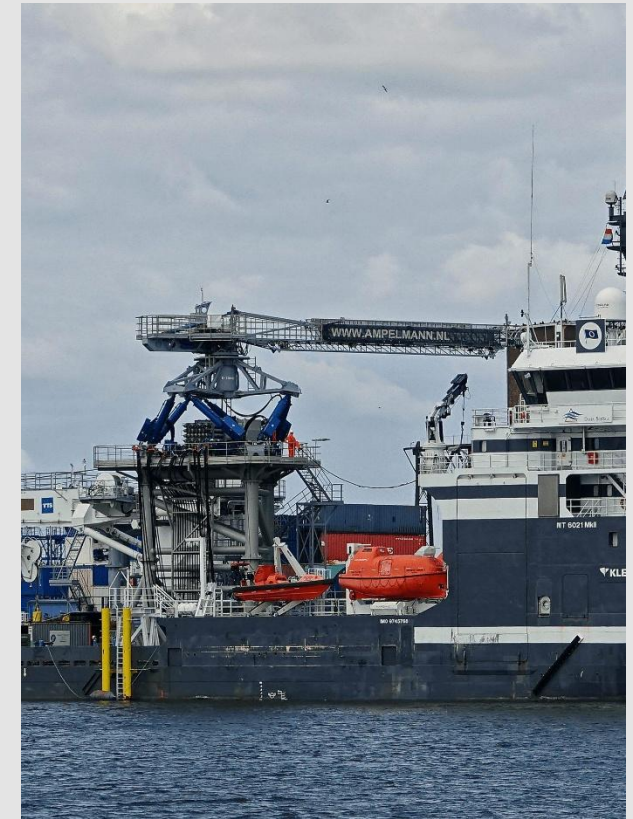
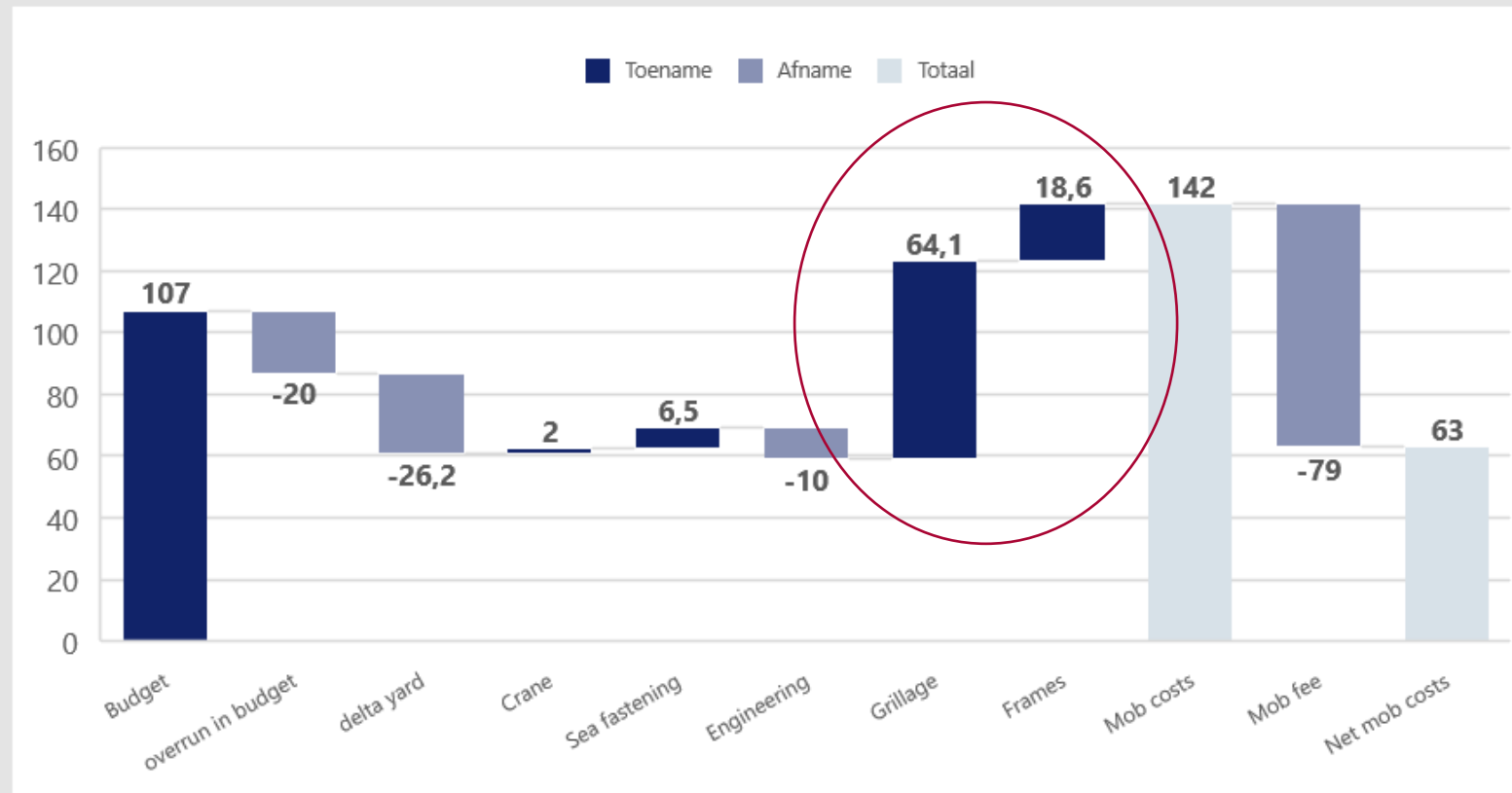






# Cost overruns caused by mismatch design and reality

77% OVERRUN CAUSED BY UNPLANNED NEED FOR GRILLAGE AND FRAMES FOR SEA FASTENING

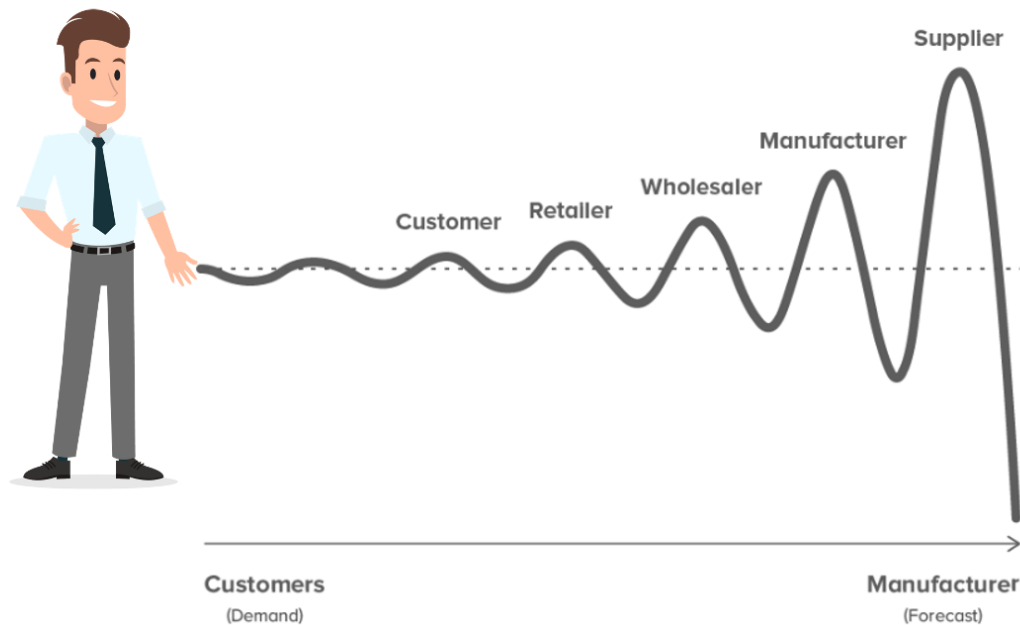






# Small changes are amplified in the chain

## BULL WHIP EFFECT: EVERYONE LOSES

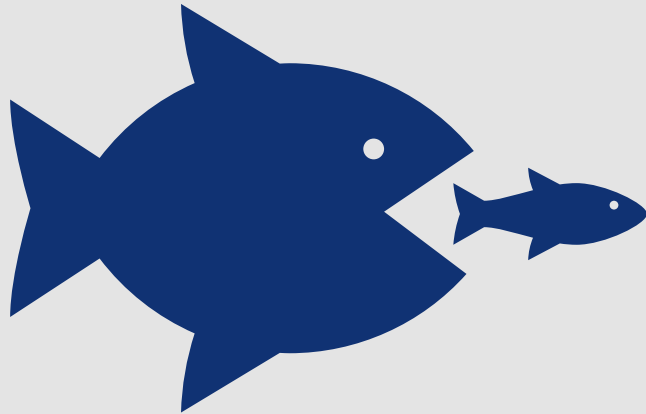


No synergy, no synchronization.

Every link starts to compensate, tries to anticipate the problems they know will arise.

# Move from zero-sum thinking ...

## BIG FISH COOPERATION

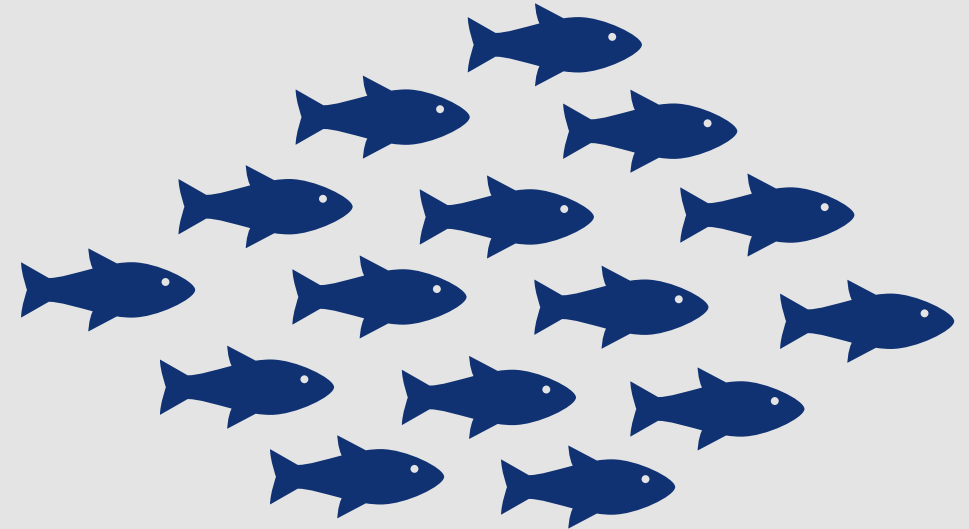
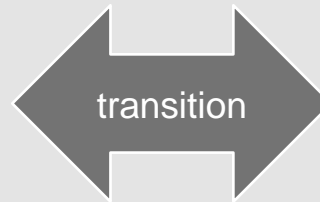
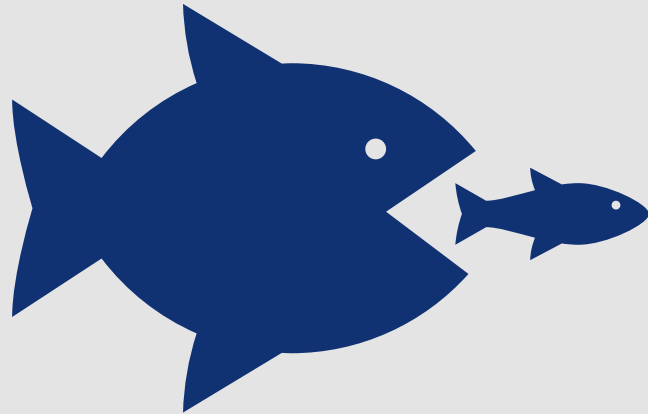


- Zero-sum thinking
- Aversion to sharing data and IP
- Reliance on internal expertise



# ... to positive-sum thinking

## COLLABORATIVE SCHOOL




- Zero-sum thinking
- Aversion to sharing data and IP
- Reliance on internal expertise

- Positive-sum thinking
- Openness to pooling resources
- Access to external capabilities

**We can make this transition**

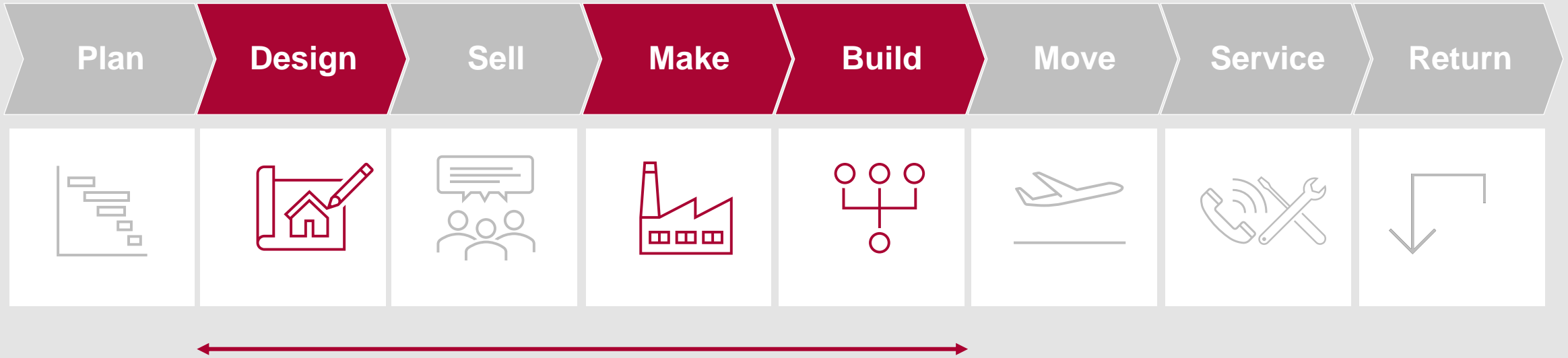
TOGETHER WE THRIVE



Openness  
Sharing  
Trust

# How do we get there?

FOCUS ON DESIGN – MAKE – BUILD INTERRELATIONSHIPS FIRST



# Front-end decisions drive long-term results

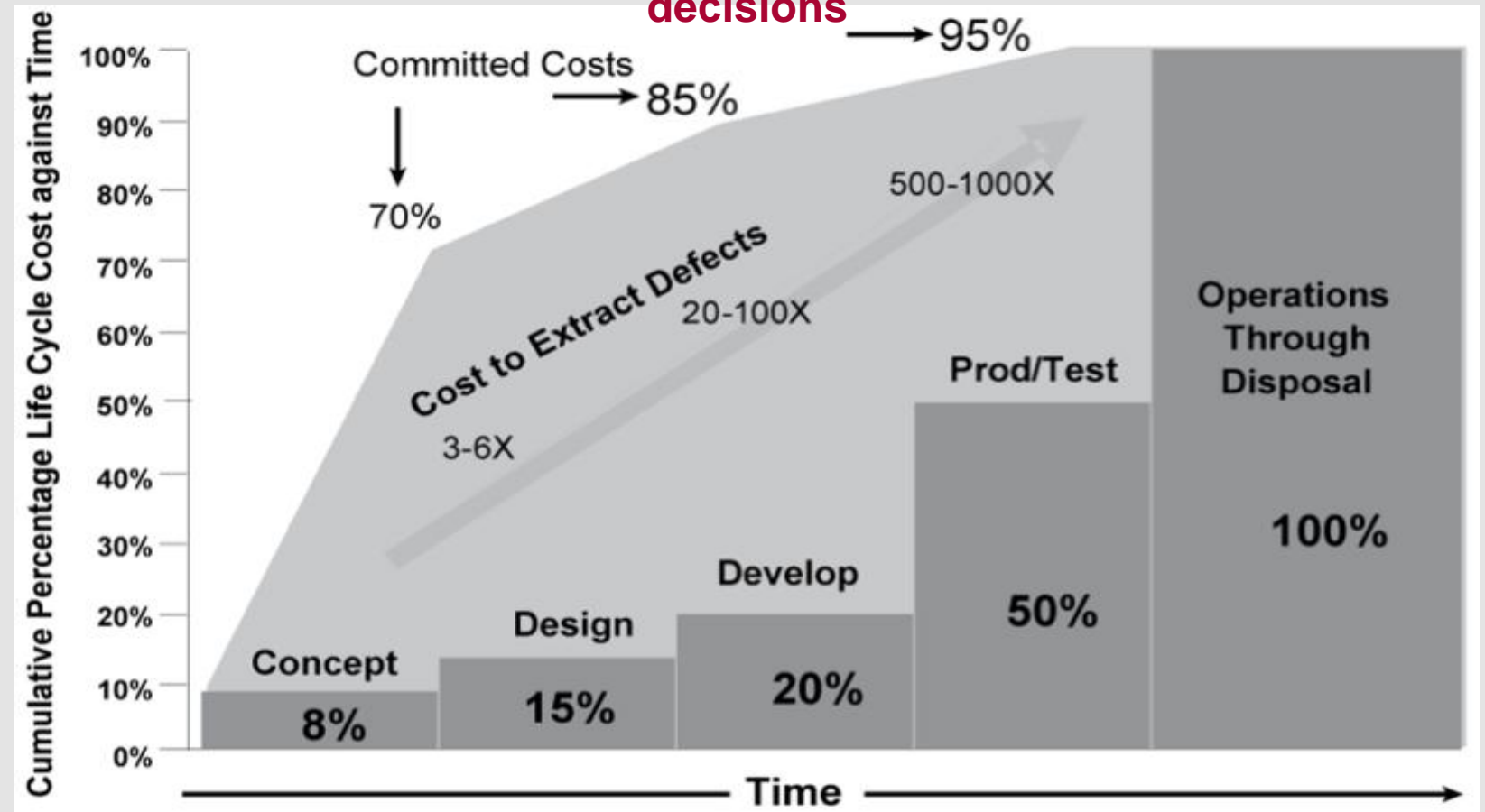
EARLY DECISIONS CAST THEIR SHADOW FAR AHEAD



**70-85%** of the cost of products are **locked** in by decisions made **in the earliest** conceptual stages...

...but that only **8-15%** of the R&D investment is in that same period.

**60-75% of companies' R&D capacity is spent on rework due to bad early decisions**



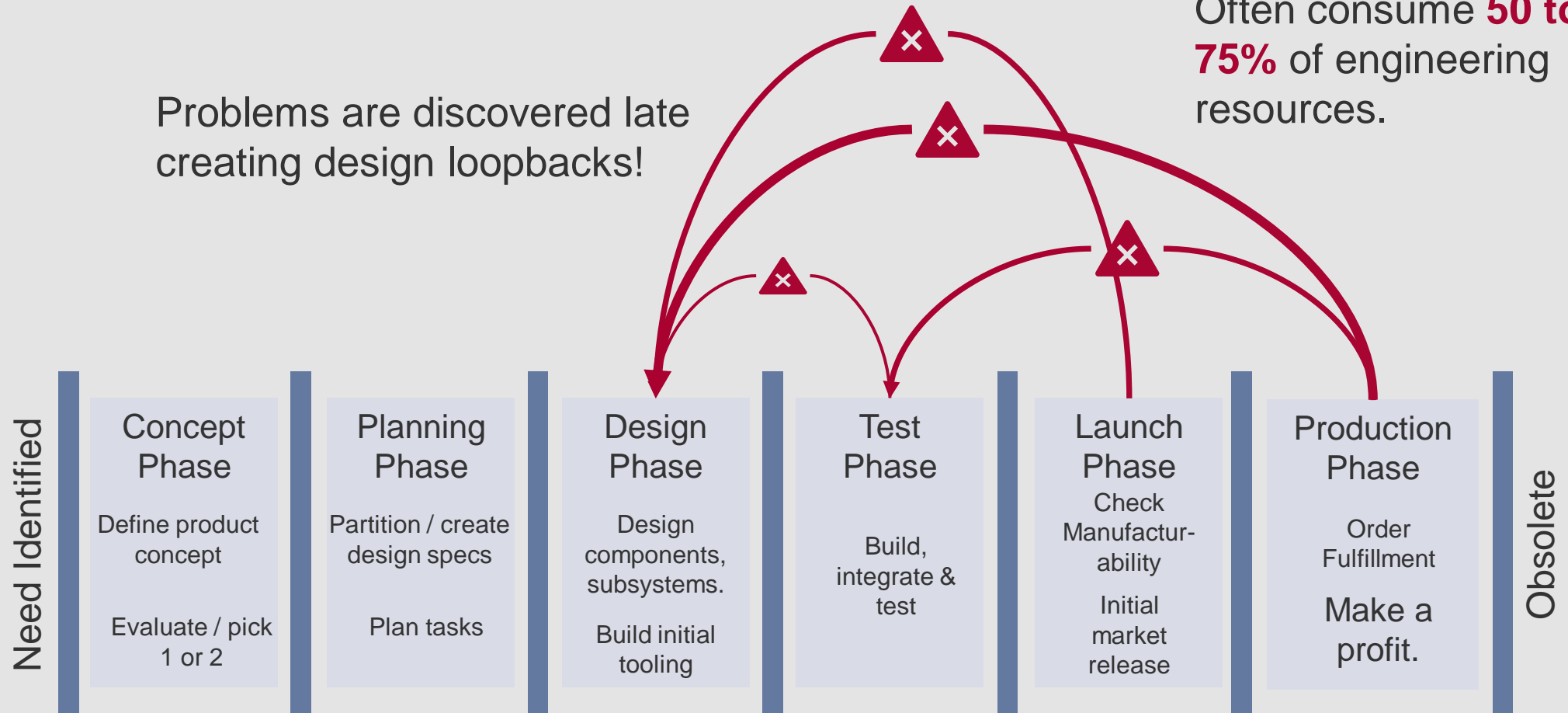
# Traditional product development is plagued by rework

## WHAT HAPPENS IN REALITY?



Problems are discovered late creating design loopbacks!

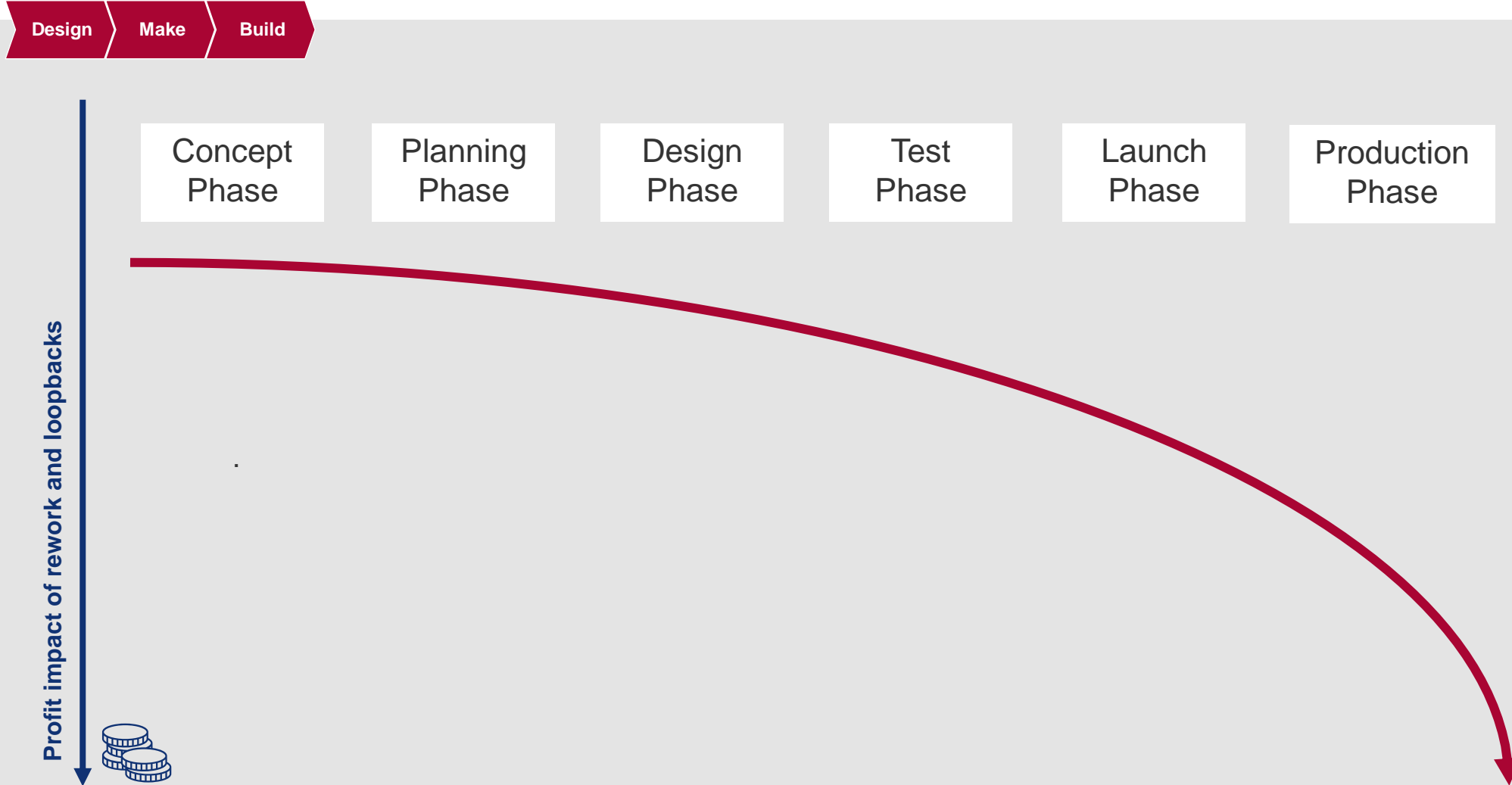
Often consume **50 to 75%** of engineering resources.





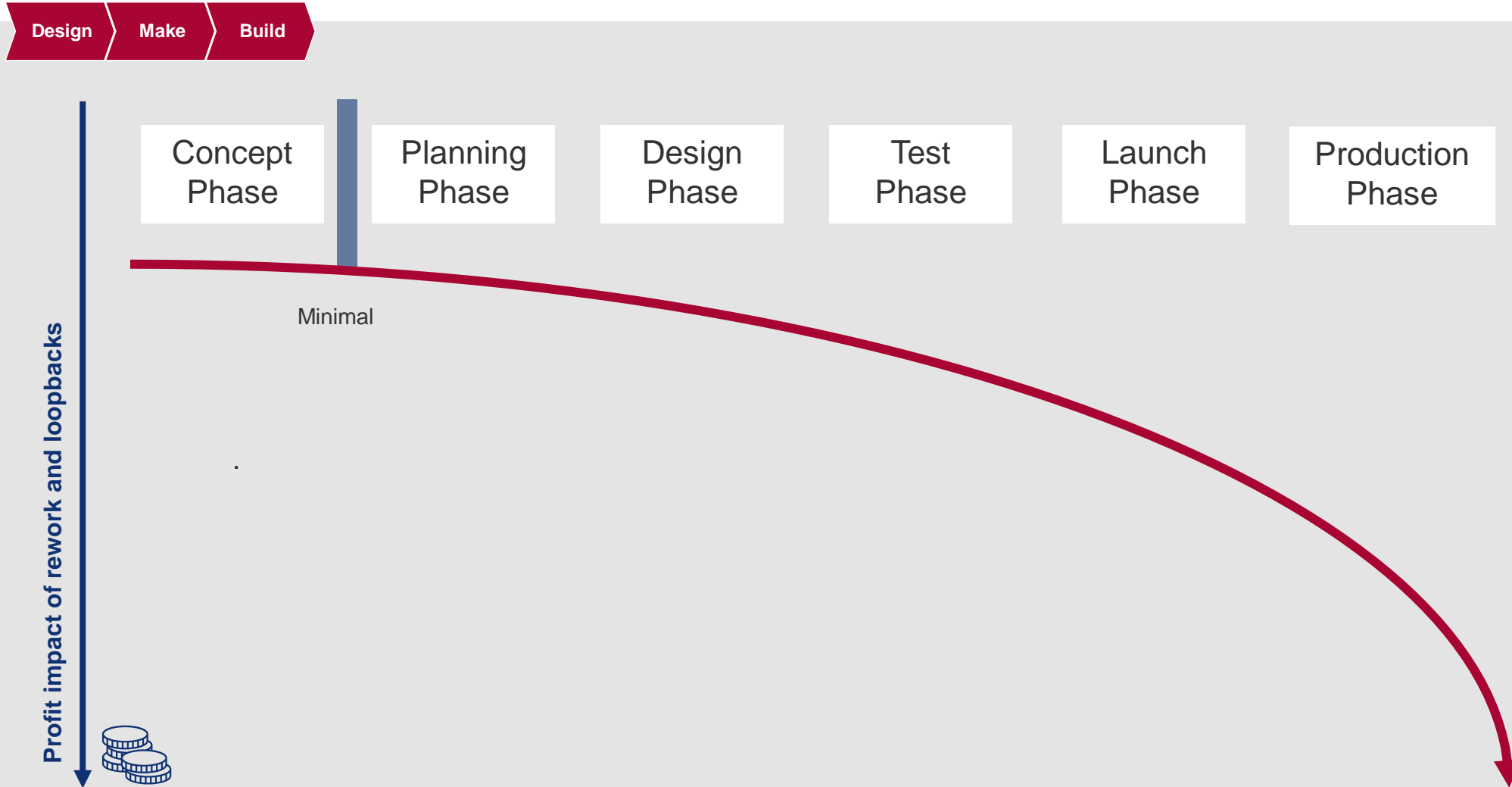
# Loopbacks Cost Most Companies Millions Each Year

WHAT HAPPENS IN REALITY?



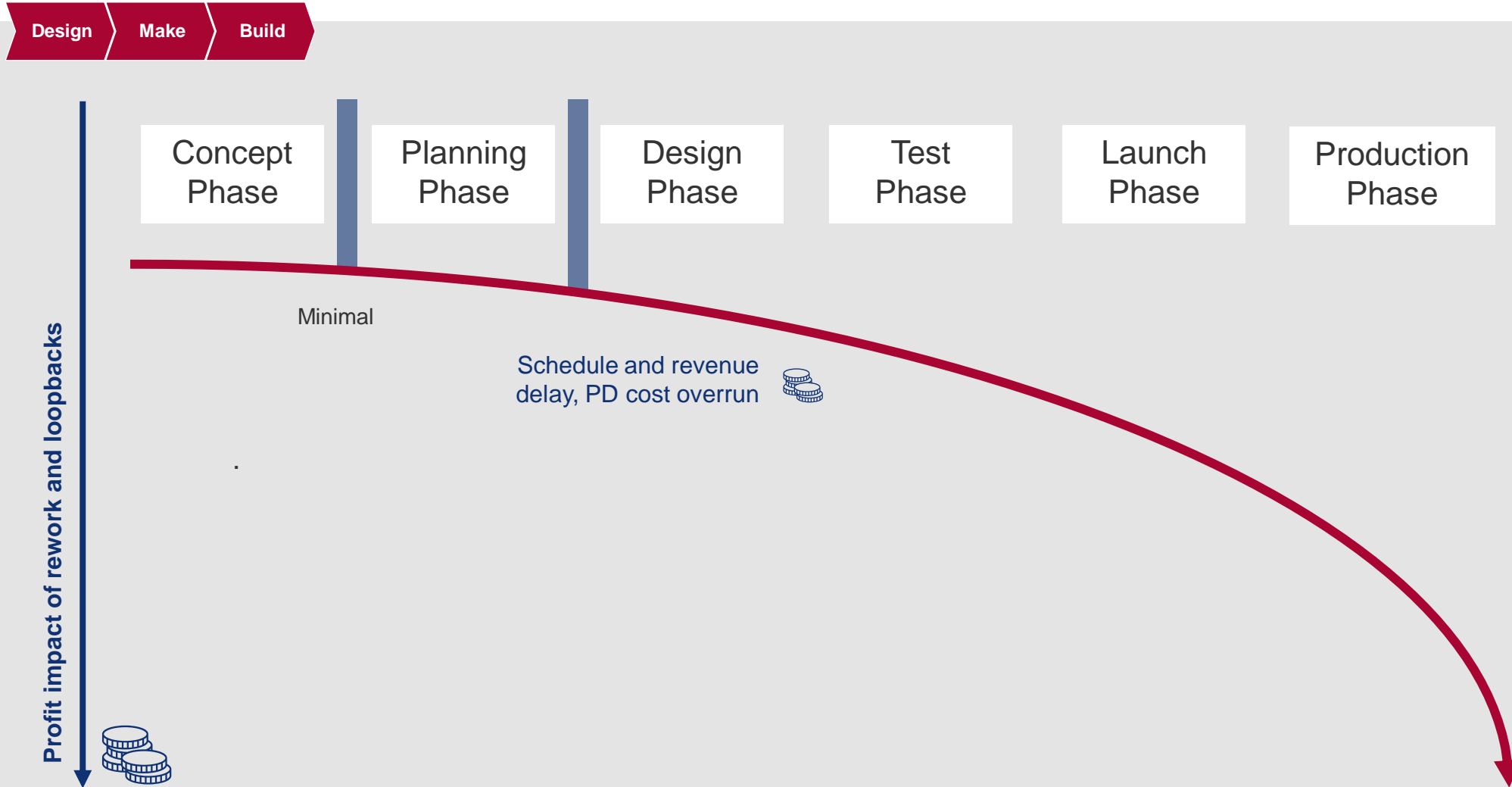
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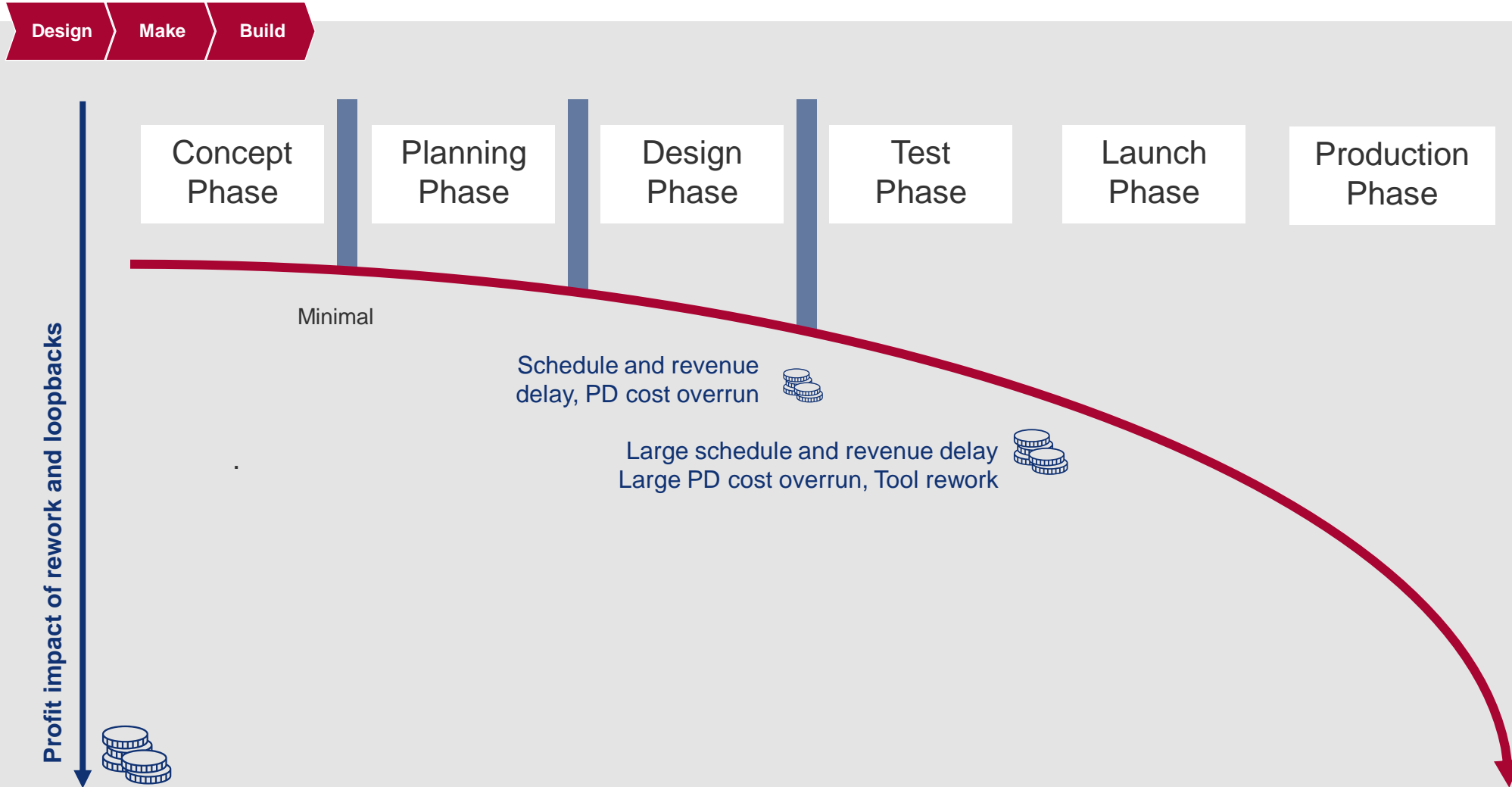
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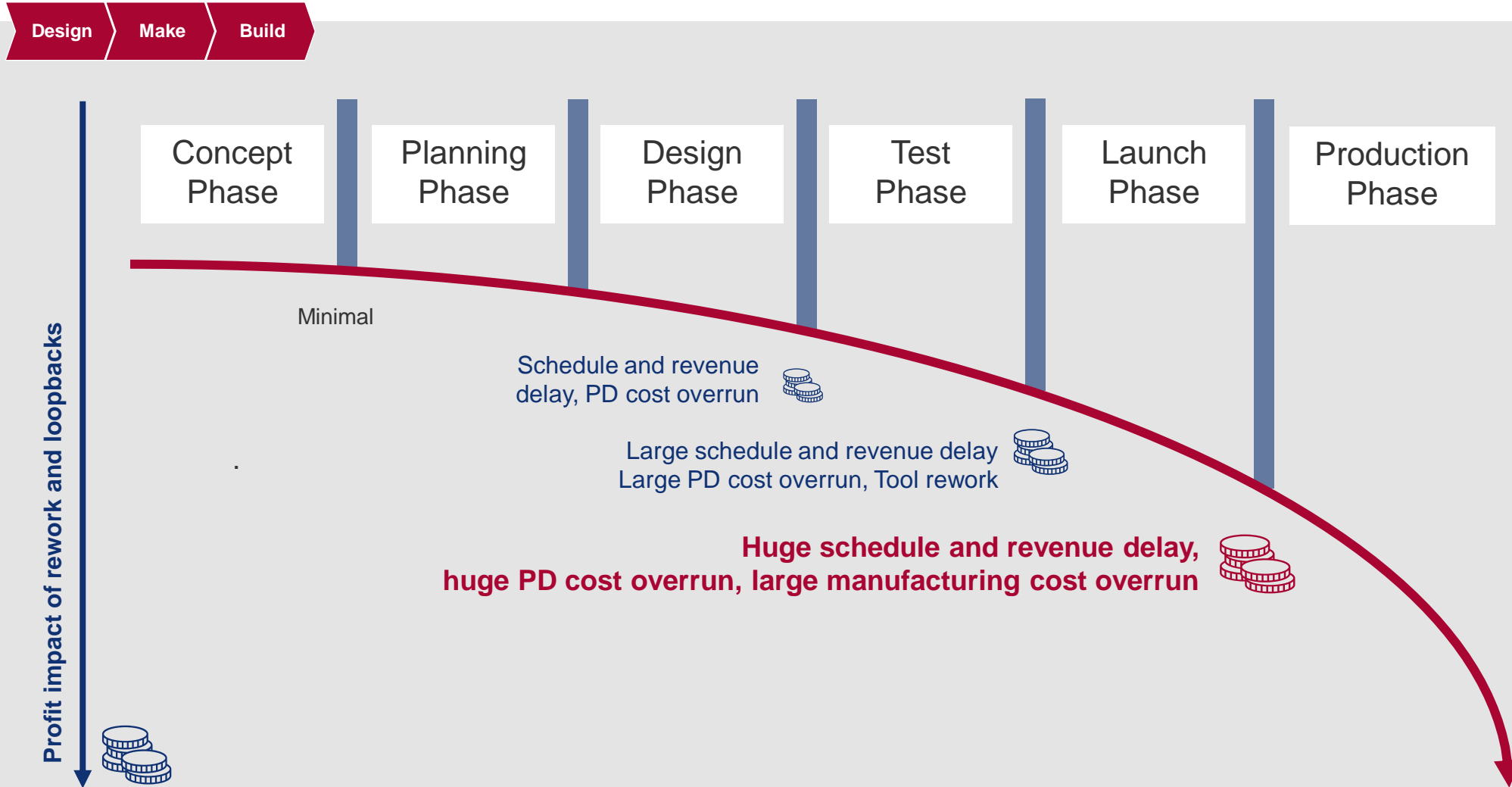
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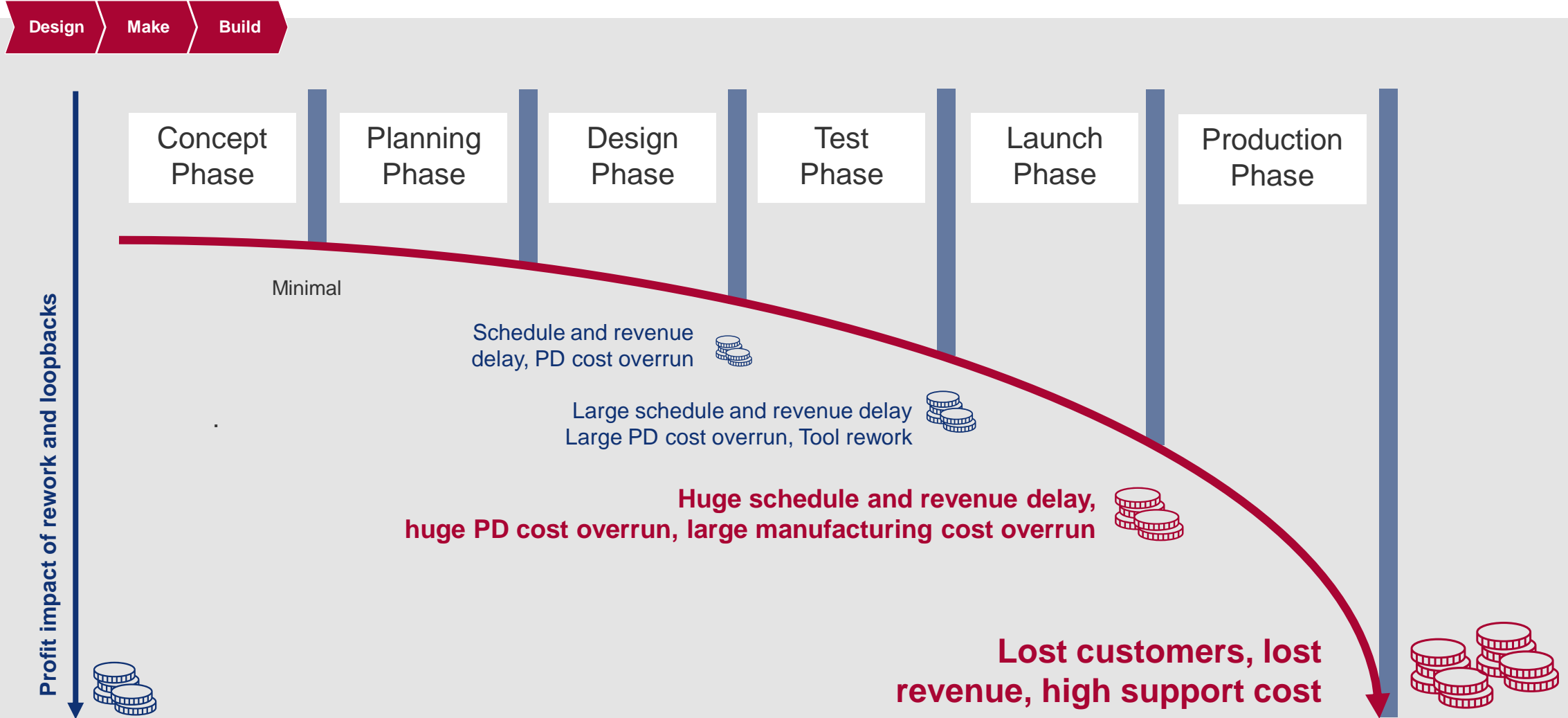
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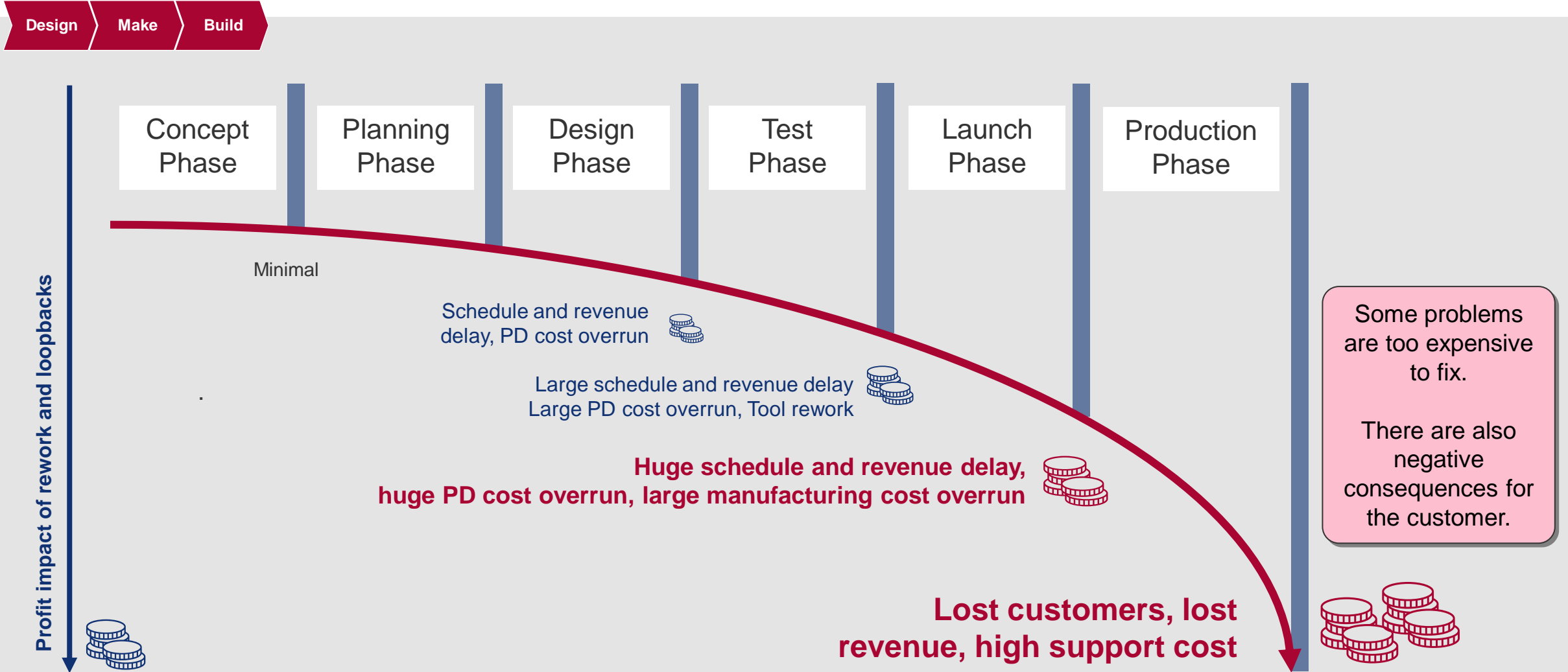
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## WHAT HAPPENS IN REALITY?



# Loopbacks Cost Most Companies Millions Each Year

## WHAT HAPPENS IN REALITY?



# Factors relating directly to TTM, Quality, Profit

## QUICK SCAN



# NCMS study shows enormous potential

## AVERAGE SCORES



# NCMS study shows enormous potential

## REAL TOYOTA SCORES



# What Toyota does differently

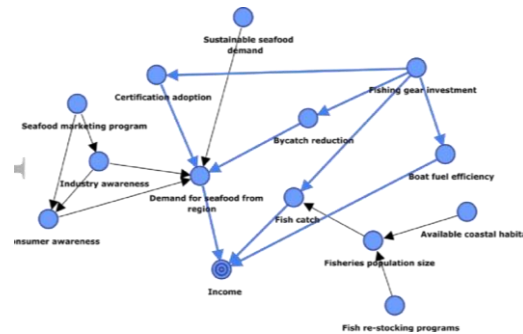
COLLABORATE ON KAIZEN™ FOUNDATIONS

## UNDERSTAND CUSTOMERS



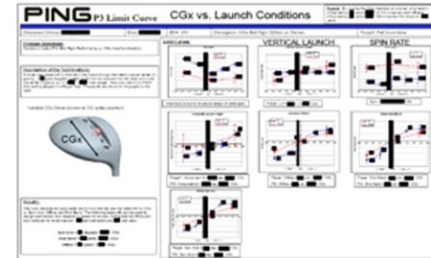
Customers Interests  
(Quantified per Category)

## SHARE KNOWLEDGE & CLOSE GAPS



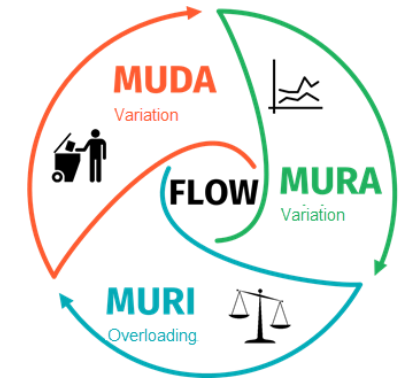
Causal Maps, Trystorming,  
Testing & Prototyping

## USE VISUAL REUSABLE STANDARDS



OPL's, Limit T/O Curves,  
Checksheets

## ELIMINATE WASTE



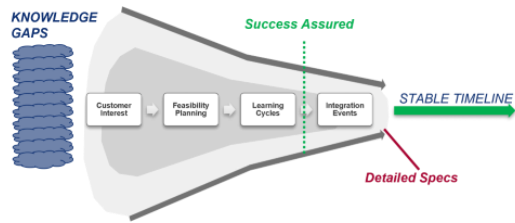
Continuously removing  
waste out of the process



# What Toyota does differently

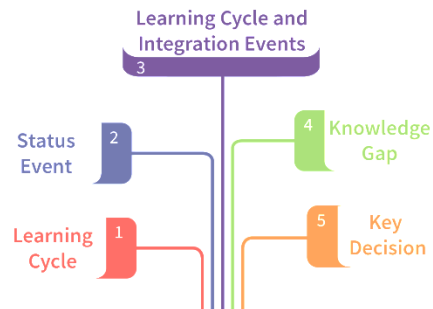
COLLABORATE ON KAIZEN™ CONCEPTS

## SET BASED ENGINEERING



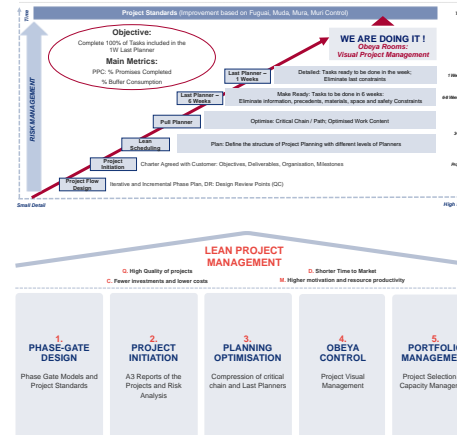
Keep requirements and design options flexible for as long as possible

## RAPID LEARNING CYCLES



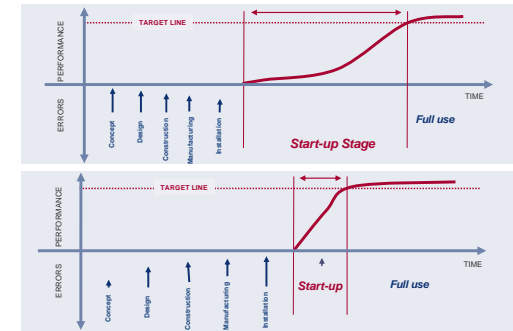
Make the essential choices based on knowledge

## LEAN PROJECT MANAGEMENT



Increase customer value by eliminating waste from each project phase

## VERTICAL START-UP



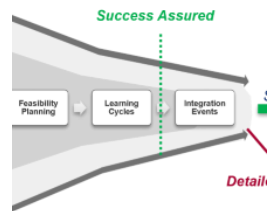
Front loading, prevent risks and learn as early as possible

# Together we made it happen

TRACK RECORD KAIZEN INSTITUTE

**PHILIPS**

**First Year Sales**



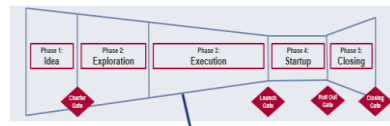
Success Assured

**+29%**

First year sales

**PHILIPS**

**Time-to-Market**



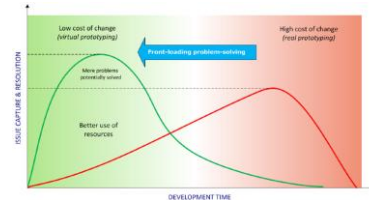
NPI process

**-45%**

Effort needed

**PHILIPS**

**Time-to-Market**



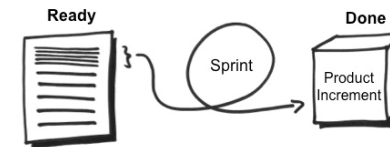
Frontloading

**-80%**

Post launch field defects

**BOSCH**

**Time-to-Market**



In-Sprint Validation

**-32%**

Leadtime



**Time-to-Revenue**



Rapid Learning Cycles

**-26%**

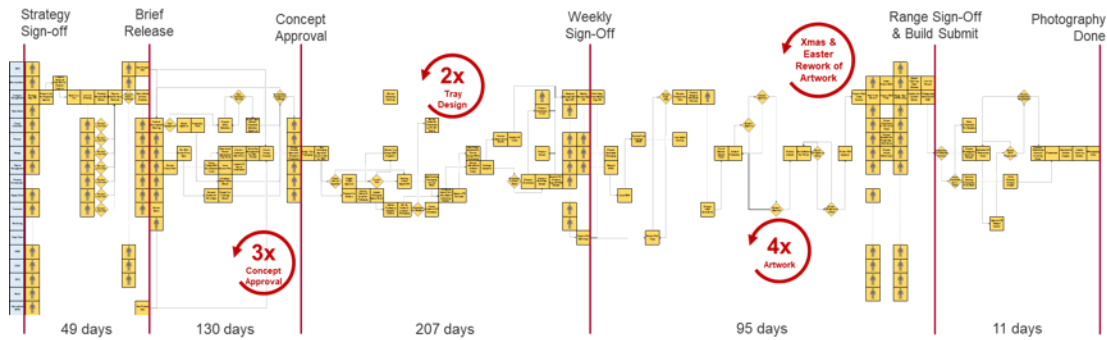
Start-up time

# Become world-class across the entire supply chain

## BUILDING THE FUTURE TOGETHER

### STRATEGIC VALUE STREAM MAP BEFORE

**Build trust by building one shared perspective of reality**



# Become world-class across the entire supply chain

BUILDING THE FUTURE TOGETHER

STRATEGIC VALUE STREAM MAP BEFORE

**Build trust by building one shared perspective of reality**



STRATEGIC VALUE STREAM MAP AFTER

**Add confidence to trust by committing to one future state**



# Leverage trust and confidence to deliver

## JOINT KAIZEN EVENTS



- Work executed in **joint teams**
- Focus on a **topic** to be **improved**
- Has a **defined duration** and **clear goals** to be achieved
- Held in **Gemba** with the **workshop team**
- **Fast implementation** (blitzkrieg approach)
- With follow-up of **financial benefits**
- Uses a standard methodology - **A3 Thinking**
- Uses fast countermeasures to attain results with **little investment / low cost**

# Real world benefits

## RESULTS

### Q QUALITY

**+40%**    **+30%**

Customer  
satisfaction

Requirements  
delivered

### C COST

**+20%**

Resources  
productivity

### D DELIVERY

**-50%**    **+50%**

Lead time  
reduction

On time  
delivery

### G GROWTH

**+60%**    **+60%**

Realized sales

Revenue from new  
innovative products

### M MOTIVATION

**-5%**

Innovation & Research  
Teams Turnover



# These concepts WILL move you in the right direction


ARE YOU READY TO MAKE THE NEXT STEP?



**ACCELERATING  
PRODUCT DEVELOPMENT**

The KAIZEN™  
Approach

KAIZEN™  
INSTITUTE



**Achieving Excellence  
Lean Product Development  
Results**

QUALITY	COST	DELIVERY	MOTIVATION
High New Product Vitality Right First Time (0 Customer complaints, 0 rework)	Optimized R&D Cost Optimized Product Cost Optimized Production Cost Vertical Startup	On Time Project Delivery Short Time To Market	Motivated Teams High Performance Teams

KAIZEN™  
INSTITUTE

*The KSC is the connector between companies from the design and manufacturing industry, which bundles knowledge in an accessible way to achieve joint growth and collaborations on a trusted basis.*

**Thanks for your attention**