

VALUE STREAM MAPPING (VSM)

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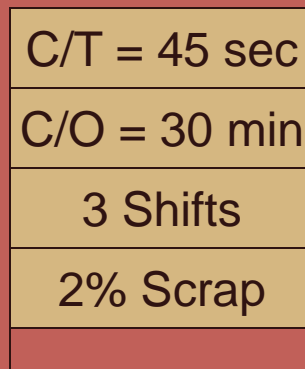
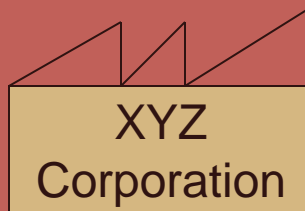
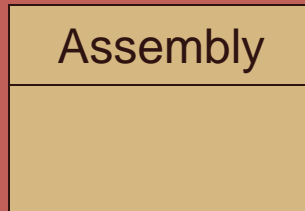
Introduction

- Visually maps the product from the customer to the supplier
- Illustrate the relationship between information and physical flows
- Enables a vision for value adding flow
- Common language



VSM Icons

Material Icons



Represents

Manufacturing
Process

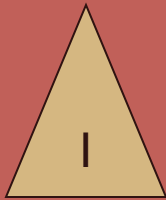
Outside
Sources

Data Box

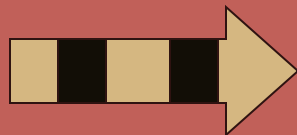
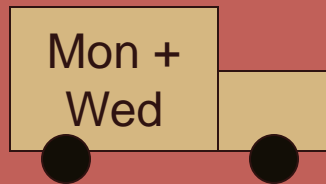


VSM Icons

Material Icons



300 pieces/day



Represents

Inventory

Truck
Shipment

Movement of
Production material by
PUSH

Movement of Finished
Goods to the Customer



VSM Icons

Material Icons



Max 20 pieces



Represents

Supermarket

Physical Pull

Transfer of controlled quantities of material between processes in a "First-In-First-Out" Sequence



VSM Icons

General Icons



Represents

Kaizen
Lightening Burst

Buffer or
Safety Stock

Operator



VSM Icons

Information Icons

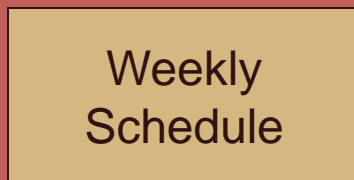
Represents



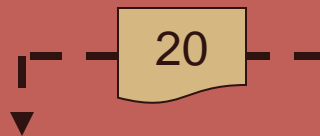
Manual Information Flow



Electronic Information Flow



Information

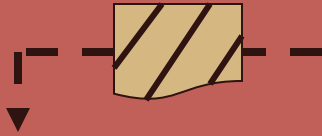


Production Kanban
(dotted line indicates
Kanban flow)



VSM Icons

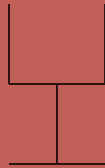
Information Icons



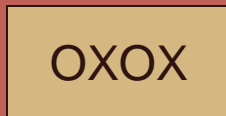
Represents
Withdrawal Kanban



Signal kanban



Kanban Post

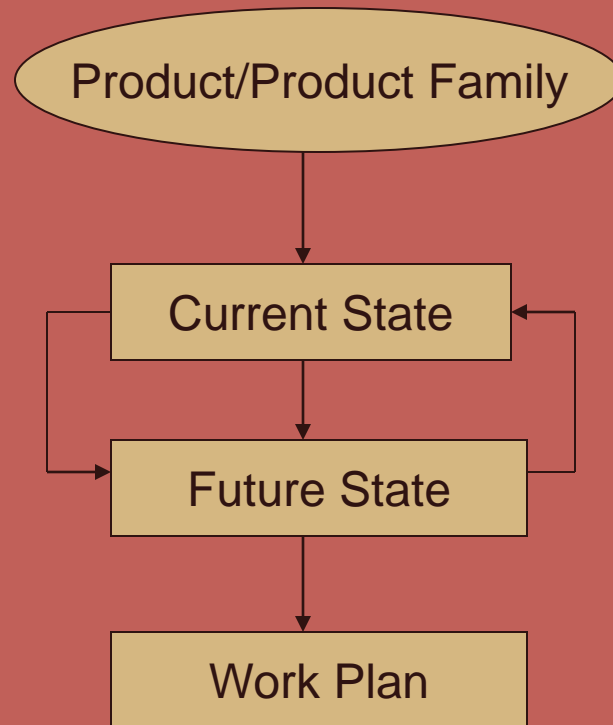


Load Leveling



Sequence Pull
Ball

VSM Steps



Current State Mapping

Customer Requirements

1. Product
2. How many, when?
3. Delivery quantity
4. Delivery frequency



Current State Mapping

Information Flow

1. Demand information from customer
2. What happens next?
3. Information to suppliers



Current State Mapping

Physical Flow

1. One process box used for all connecting processes
2. Customer demand
3. Delivery pattern of raw material
4. Key steps in manufacturing process
5. Set-up times, process times, inventory, quality
6. Batch size
7. Number of people at each station



Current State Mapping

Linking the Physical Flow

1. Scheduling information and distribution
2. Work instructions to shop floor
3. Push and Pull systems



Current State Mapping

Timing Information

1. Current state of the process summarised
2. Time line depicts the lead time
3. Value added ratio
4. Complete picture

