

MODULE 2

# ***ISUZU PARTS BUSINESS OPERATION***

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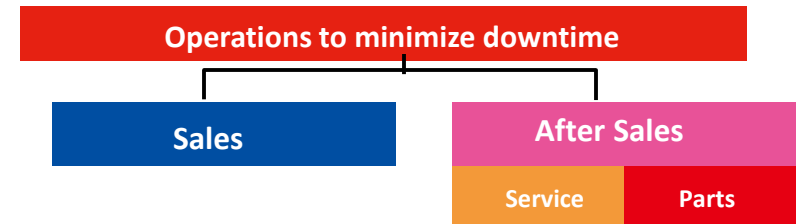
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# ***I. MISSION OF PARTS BUSINESS***

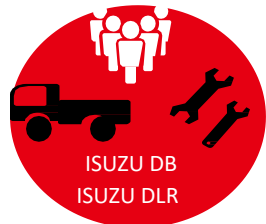
# I. MISSION OF PARTS BUSINESS

To ensure the steady sale and supply of Isuzu Genuine Parts in order to support customer's vehicles uptime.



## CS improvement

Confidence and trust in Isuzu



ISUZU  
GENUINE PARTS



Customer

**To ensure the steady sale and supply  
of Isuzu Genuine Parts to the customer**

To enable optimum performance of Isuzu vehicles

**Win the customer's trust and contribute  
to the sustainable growth in sales and profit**

## Customer's Expectations

- High quality of parts
- Getting the right quantity of the right parts in the right place at the right time

## Aftermarket Reality

- Now, Genuine Parts are currently available in the after market (i. e. cheap imitation parts)

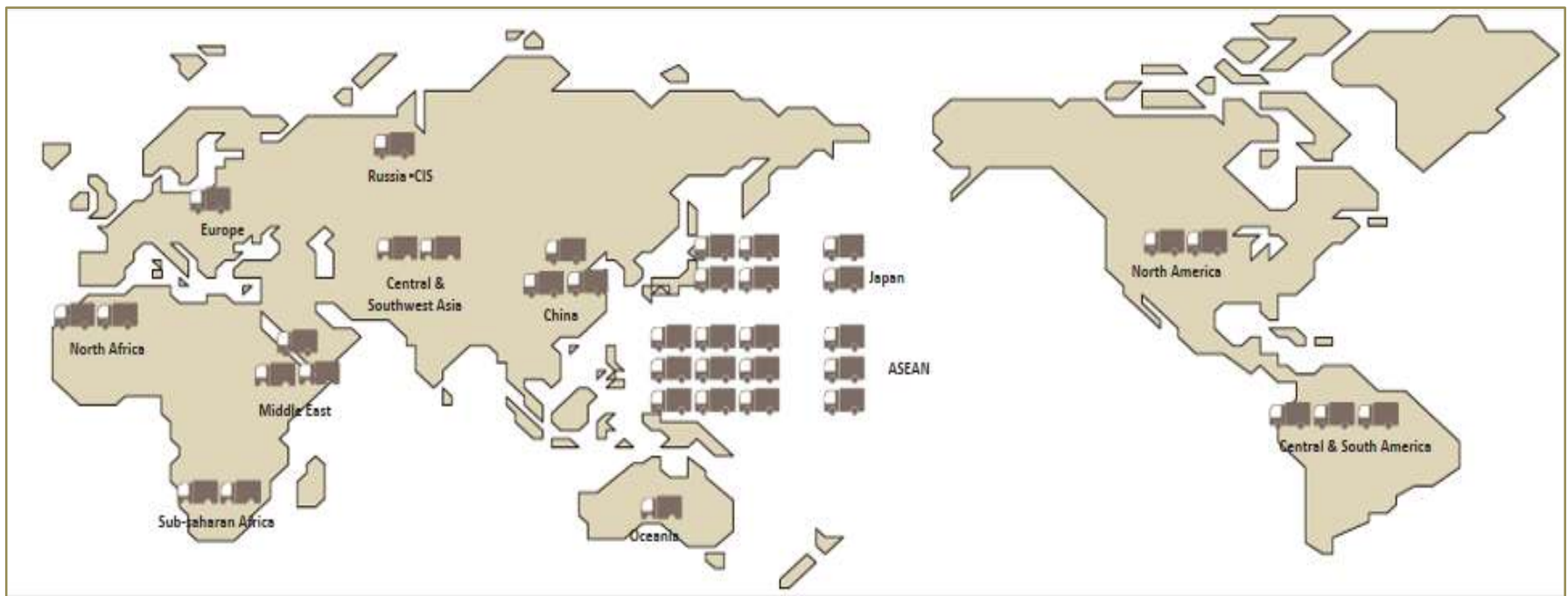
## Goal of Isuzu

- To provide Isuzu Genuine Parts to all customers in order to ensure the customer's vehicle runs at an optimum quality level

# A. PARTS MARKET OVERVIEW

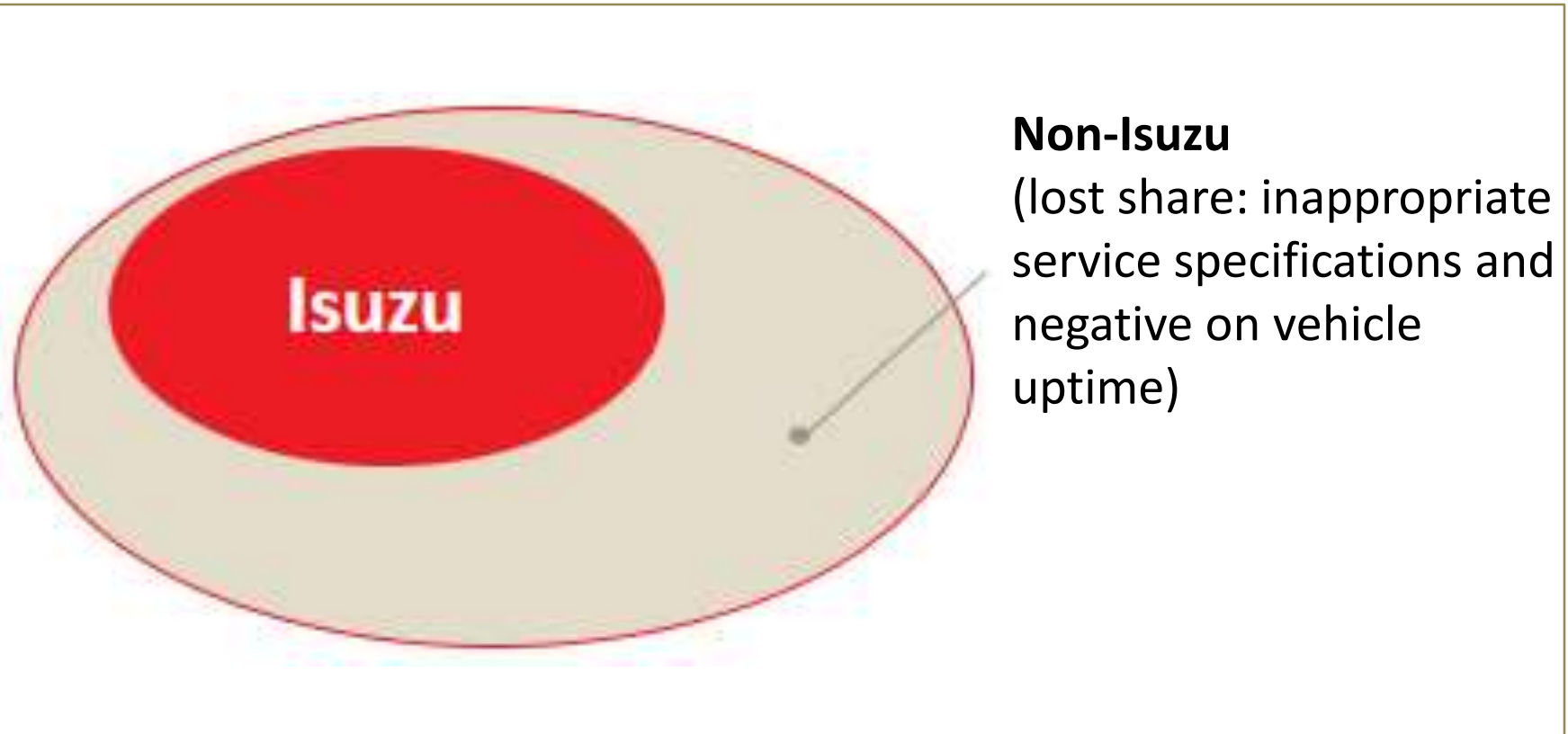
In order to maximize uptime of Isuzu vehicles around the world, we endeavor to deliver the Isuzu parts that are essential for their repair and maintenance.

## *Isuzu vehicles population in the world*



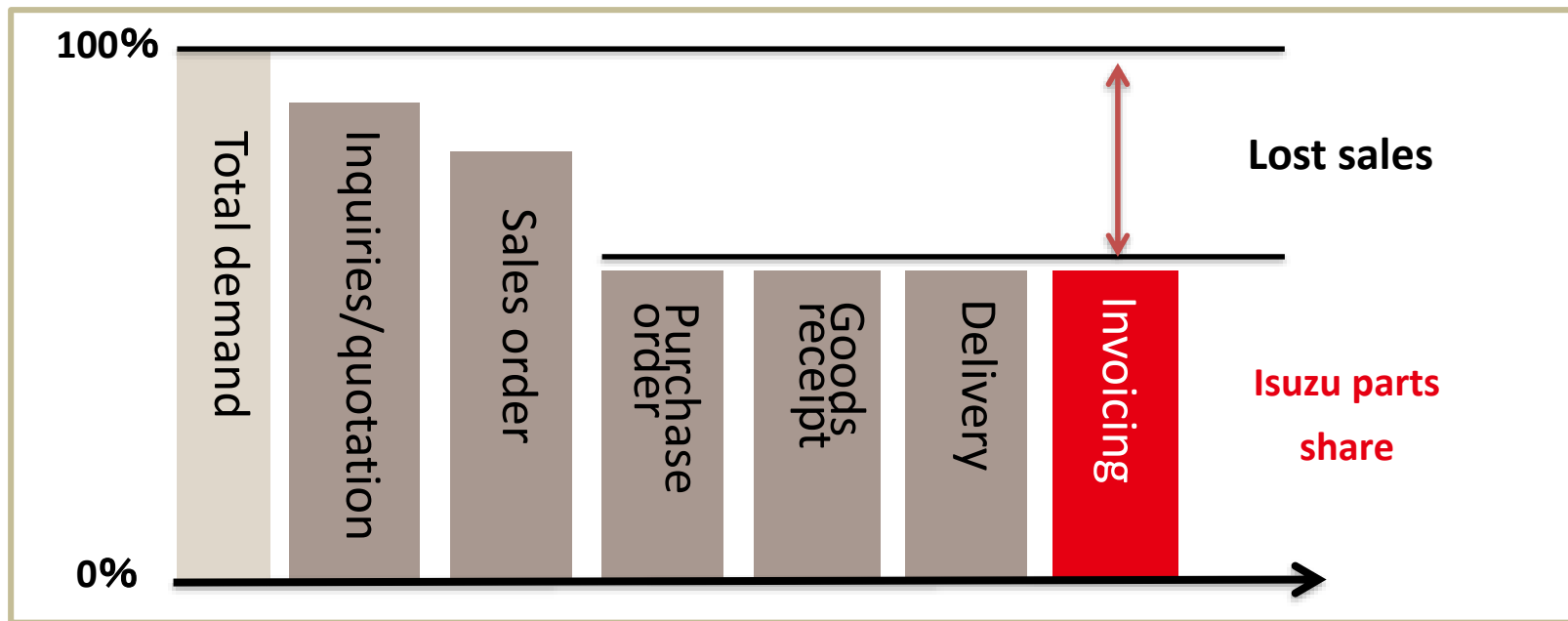
# A. PARTS MARKET OVERVIEW

## *Market value and share of Isuzu Parts*



# A. PARTS MARKET OVERVIEW

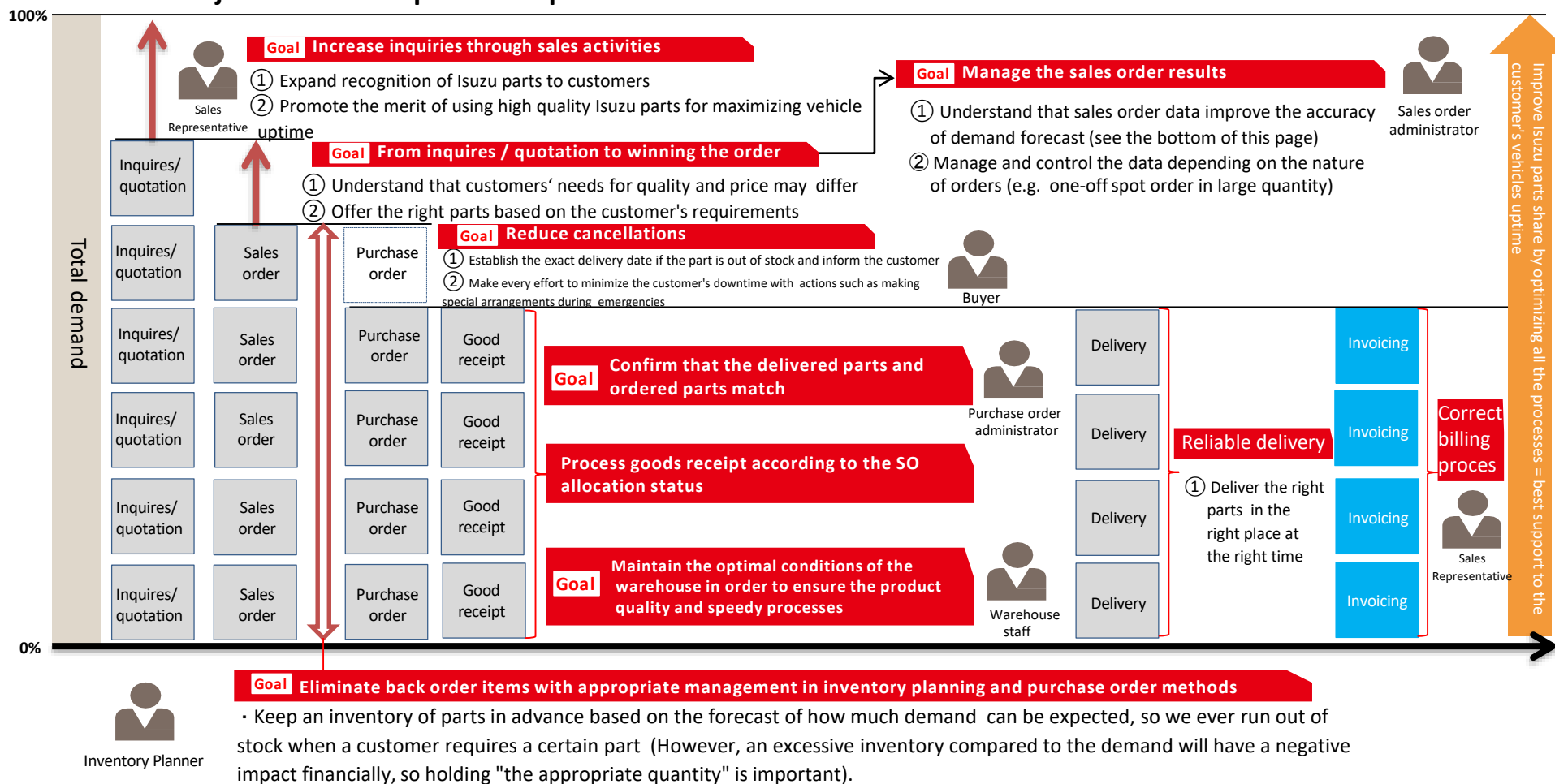
*Where the opportunities are lost in the process?*



# B. GOAL OF PARTS BUSINESS

To ensure the sale and supply of Isuzu products by eliminating lost opportunities in each process, and to increase Isuzu parts share.

## Business objectives in each process to prevent loss sales





## ***II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW***

# A. OVERVIEW OF PARTS BUSINESS

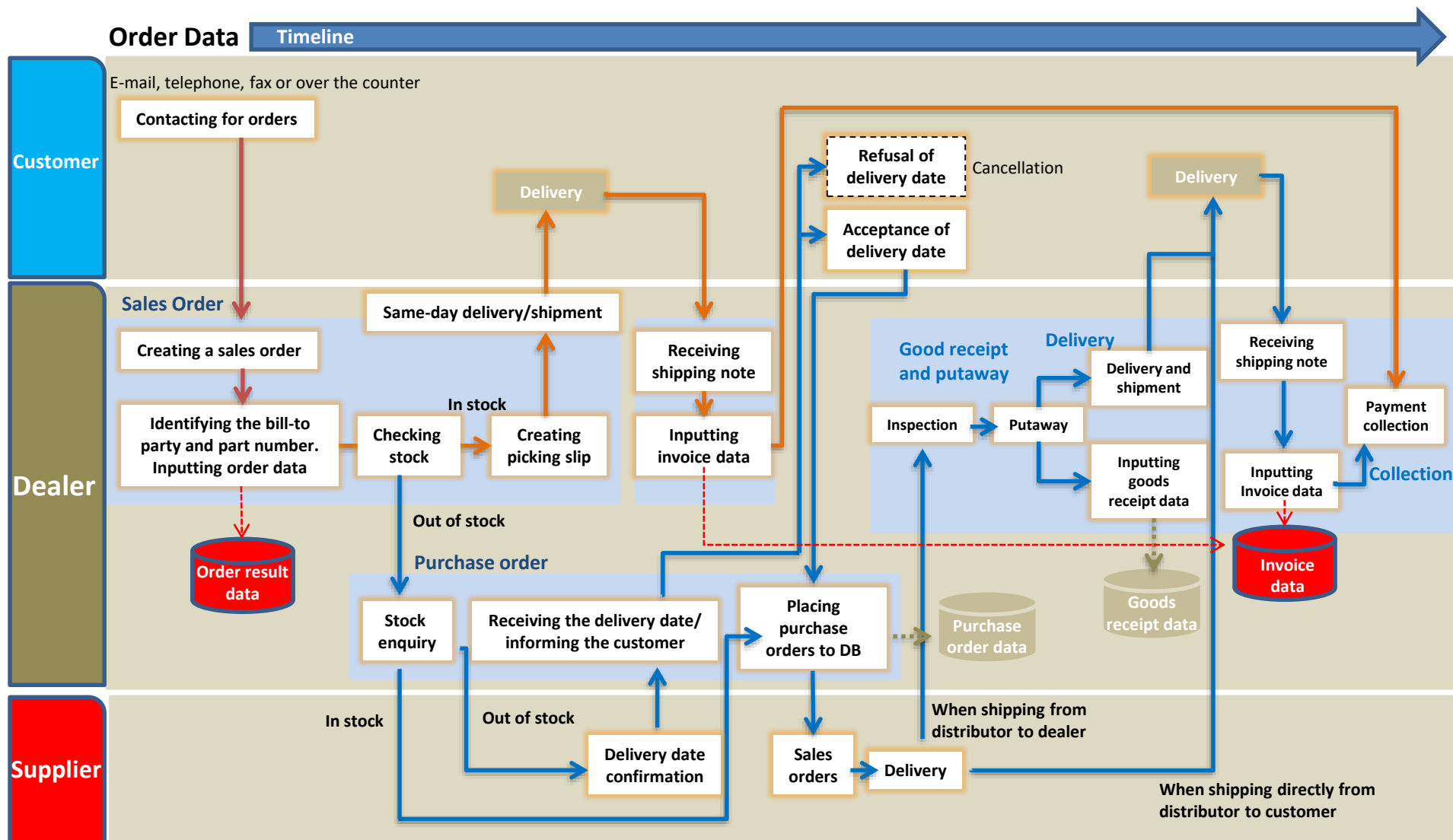
The overall flow of parts business goes as shown below.



# B. PARTS BUSINESS FLOW

## Order Data

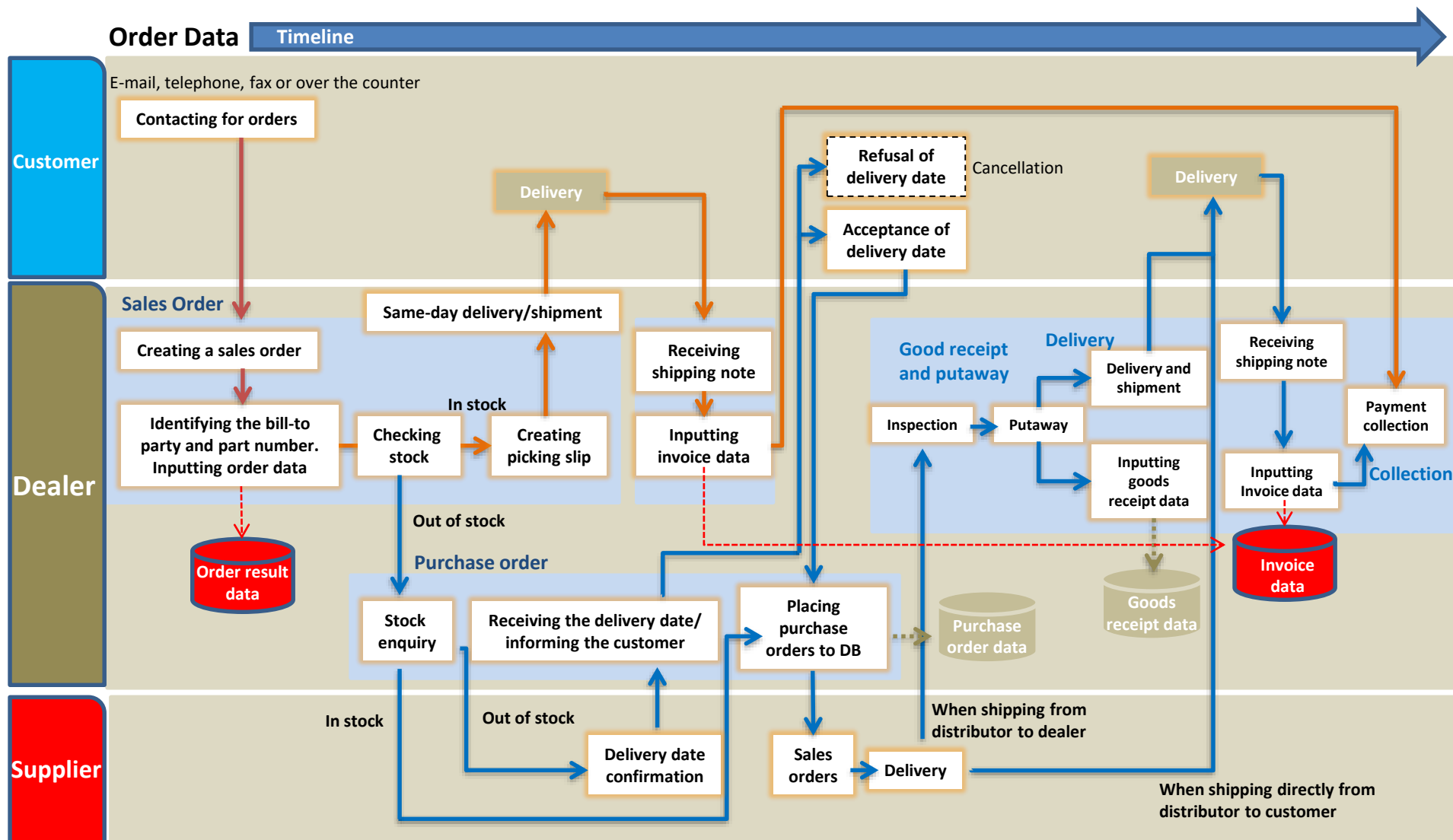
## Timeline



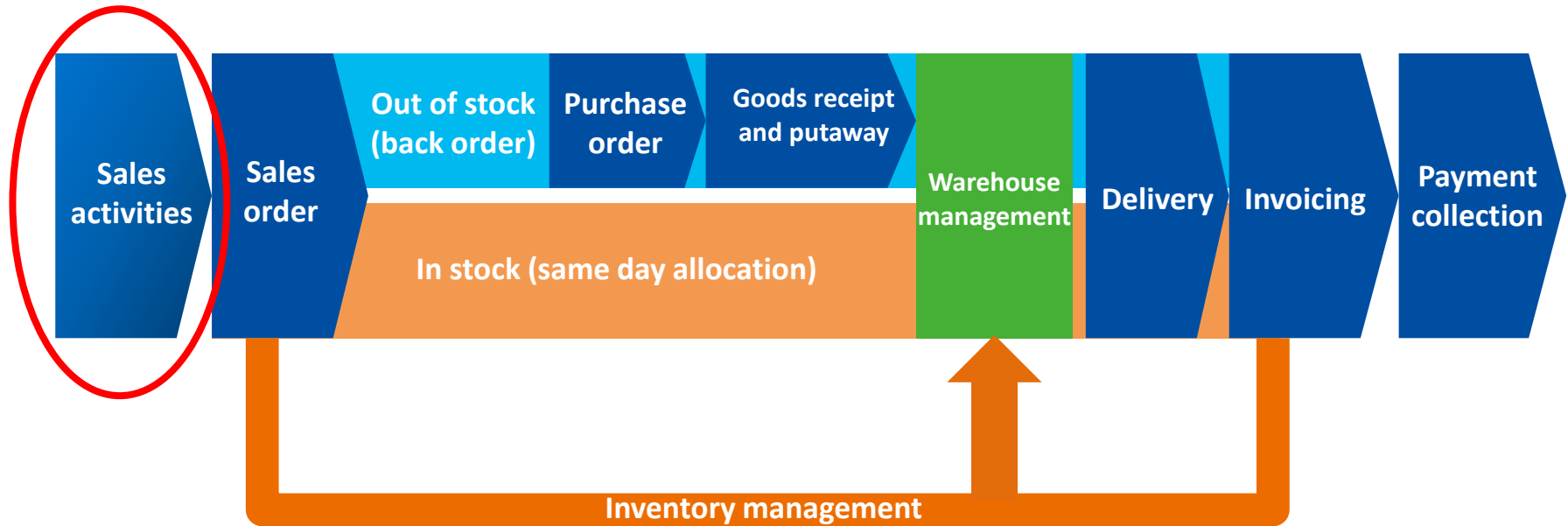
# B. PARTS BUSINESS FLOW

## Order Data

## Timeline



## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



# 1. SALES ACTIVITIES

## Sales activities means...

Engage in all areas of sales activities as the “face” of Isuzu parts business, such as building customer relations to payment collection, with a continuous effort to improve customer skills and product knowledge.

## Sales activity details

Constructing a positive relationship on a wide range of sales channels

Linking through internal communication  
(vehicle sales and services)



Regular visits to customers



Cultivating needs



Grasping sales trend of each customer and managing changes



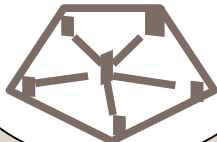
Marketing to beat out competitors



Immediately presenting a quotation. Taking steps towards receiving an order



Constructing safe and swift sales channels



Secure collection of payment



## Important points when making a visits

### Visits which lead to the next step

- Clarify the purpose of the visit
- Make appointments at the convenient time for the customer
- Gather necessary information to sell parts and provide information which is beneficial to the customer

(It is necessary to improve communication skills and knowledge about parts)



Be active in becoming a preferred business partner with the customer

# 1. SALES ACTIVITIES

## Important points in sales activities

### Activities based on PDCA

#### Plan

Make a monthly action plan and sales promotion measures based on business plan per branch

#### Do

Carry out sales activities

#### Check

Carry out analysis such as sales trend compared to the previous year per customer and plan recovery measures

#### Act

Carry out sales activities for the following week and month

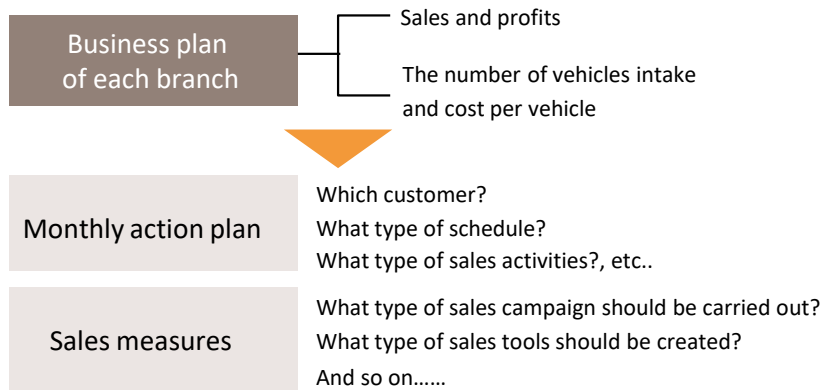


# 1. SALES ACTIVITIES

## Implementing sales activities using the PDCA method

### STEP ① Plan

Make a monthly action plan and sales promotion measures based on business plan per branch



### STEP ② Do

Carry out sales activities



### STEP ④ Act

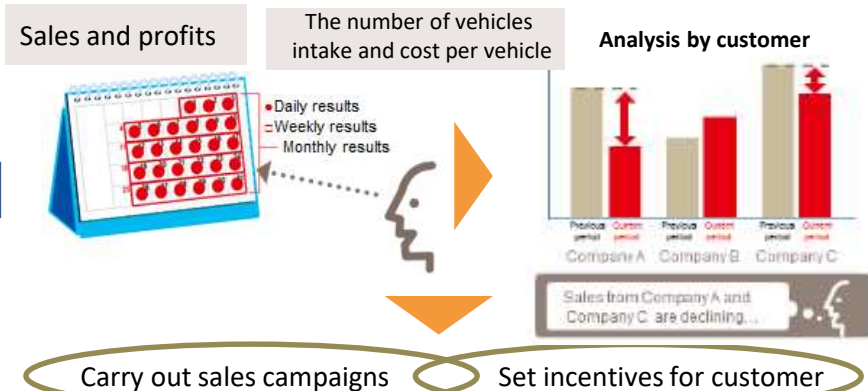
Carry out sales activities for the following week and month

Reflect the results on the following month's action plan and measures



### STEP ③ Check

Carry out analysis such as sales trend compared to the Previous year per customer and plan recovery measures



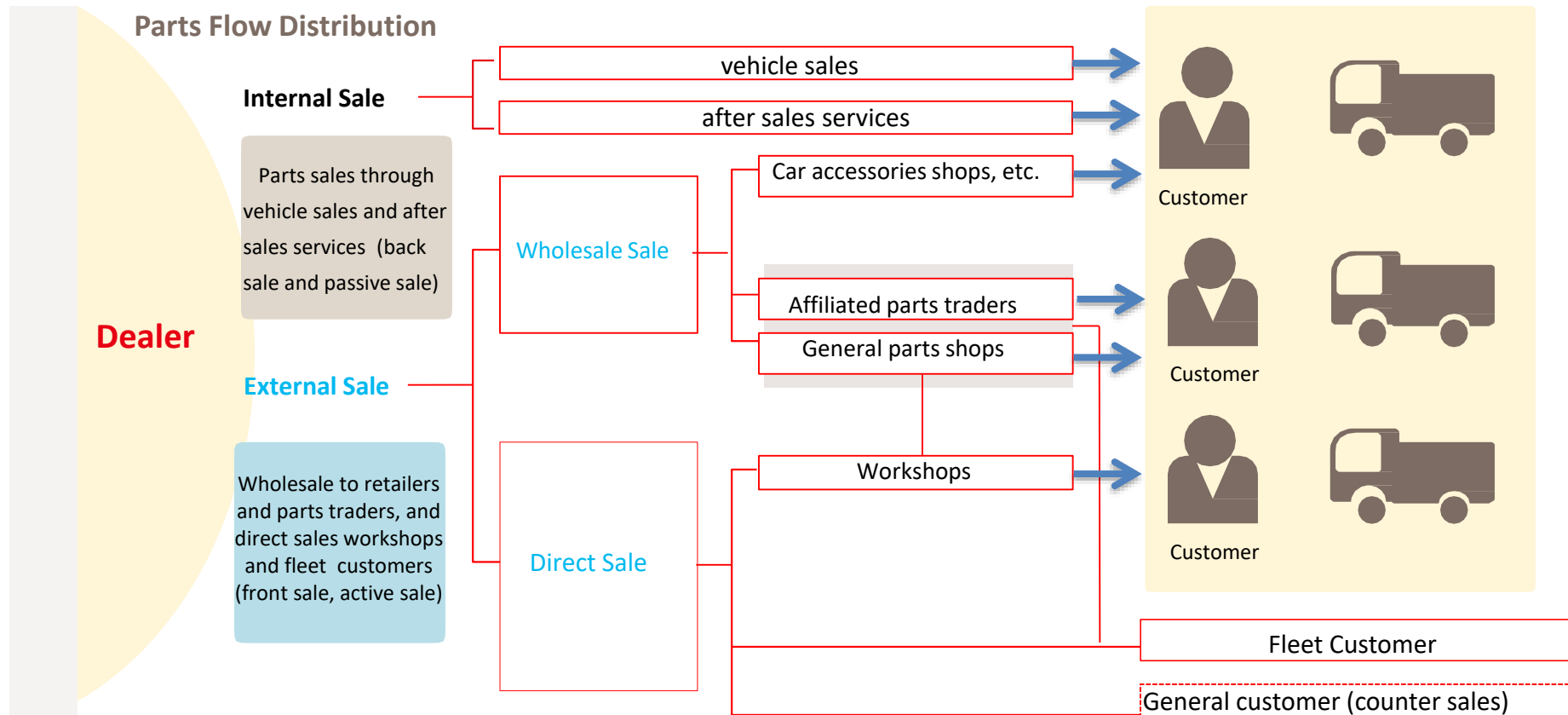


# 1. SALES ACTIVITIES

- **External Sale** (front sale, active sale, wholesale and direct sales)

*Note: Front sale can be divided into wholesale and direct sales and has a variety of distribution channels.*

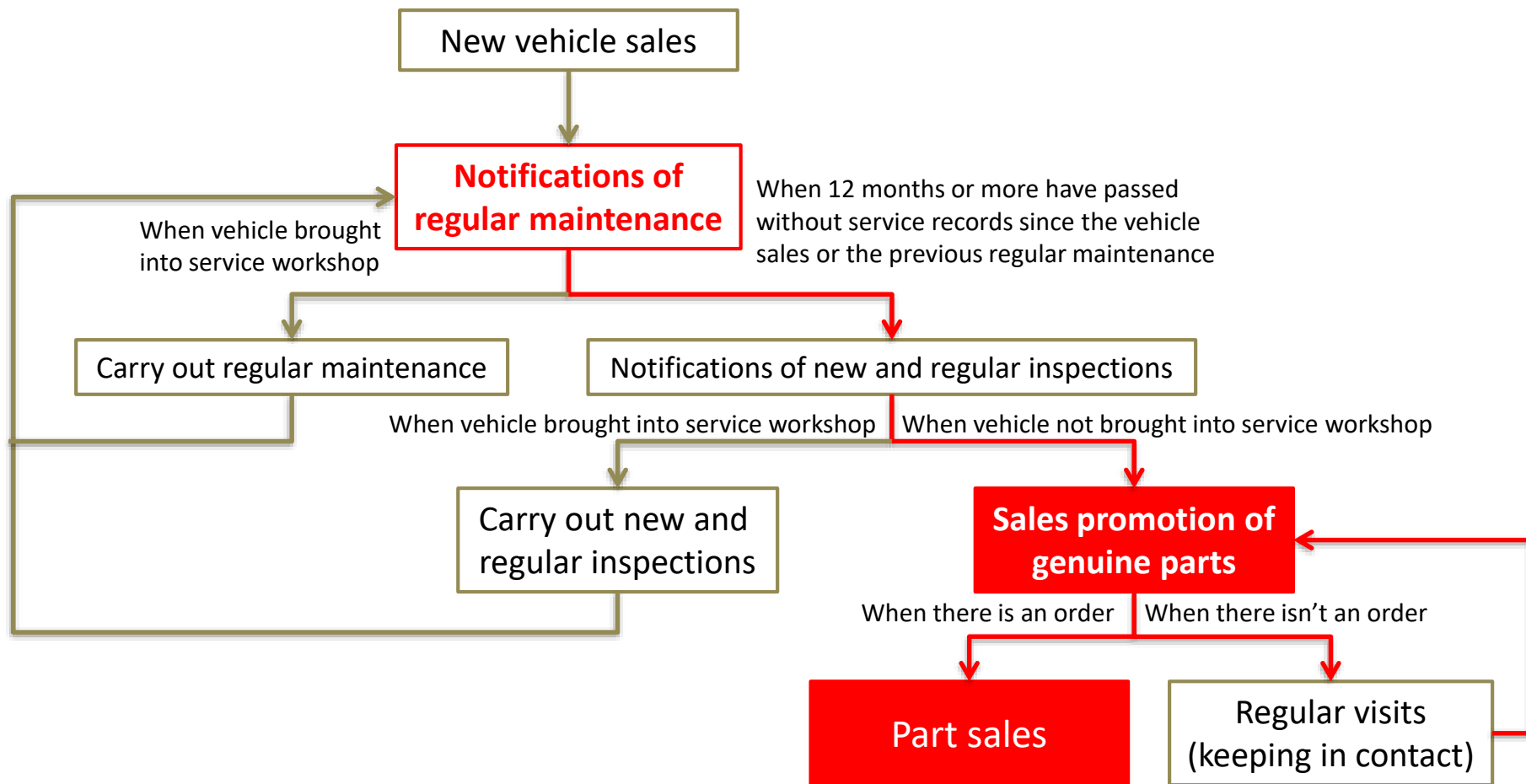
- **Internal Sale** (back sale, passive sale, with vehicle sales or through services).



# 1. SALES ACTIVITIES

**Internal sales (back sales/passive sales): Part sales triggered by the notifications of regular maintenance**


Promote sales of Isuzu parts utilizing <Notifications of regular maintenance>



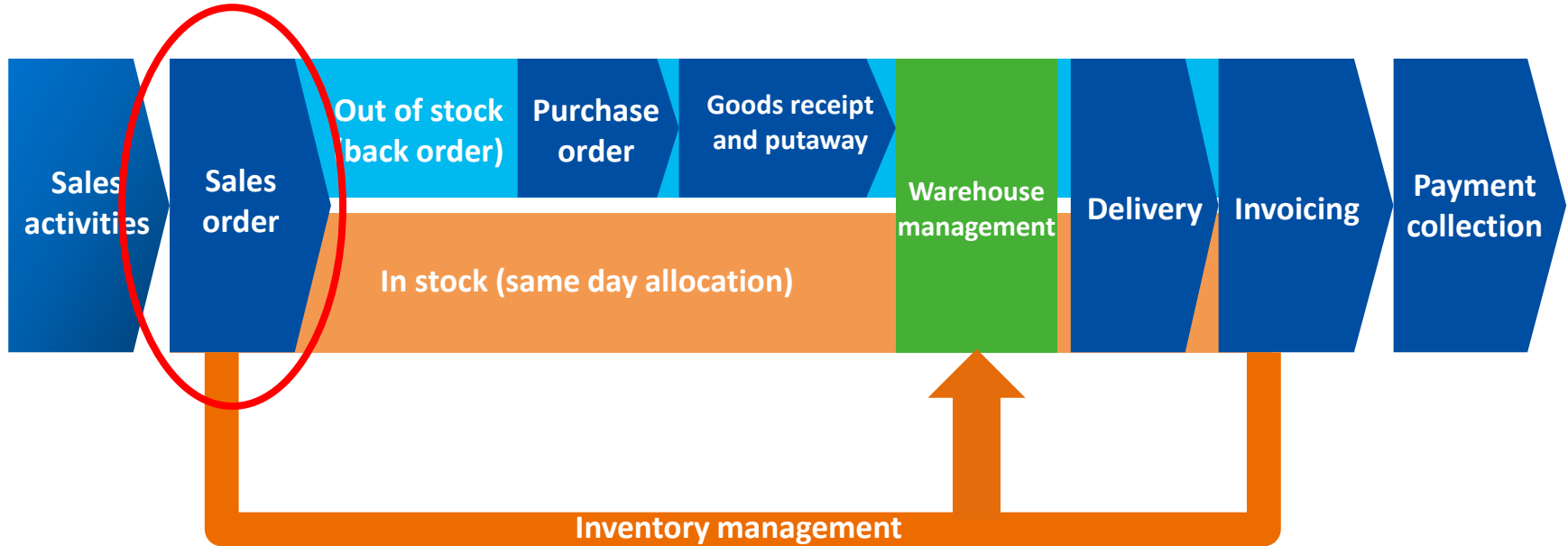
# 1. SALES ACTIVITIES

## Constructing an external sales channels (front sales / active sales)

Understand the different nature of wholesale and direct sales when giving advice and making sales.

|                                       | Wholesale Sales  | Direct Sales  |                           |  |
|---------------------------------------|--|---|---------------------------|--|
| Targeted customer                     | Parts distributors and car accessories shops                                       | Fleets  | Large scale repair shops  | Small scale repair shops and general customers (counter sales) |
| Customer's needs                      | Fast moving parts  | Maximum vehicle uptime  | Increasing repaired units | Carrying out maintenance of vehicles in a speedy manner        |
| Customer's main income source         | Part sales   | Loading, transportation, production, sales, etc.                          | Vehicle maintenance       |  |
| Important points for sales activities |  |   |                           |  |
| Visiting Frequency                    | ◎  | ○   | ○                         | △  |
| Target Parts                          | Competitive Parts  | Specific parts required for specific vehicles/Parts with cost performance |                           | Inexpensive parts  |

## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



## 2. SALES ORDER

### Sales Order Process

- Creating a sales order based on the customer's order
- Confirming the bill-to party and identifying the correct part numbers
- **Inputting sales order data**

**Important Point**

In order to optimize the inventory management, divide the orders into orders in which data is counted for demand forecast and orders in which data is not counted.

Normal flow

Sales Order

Data input



Data is counted for demand forecast

**Make sure to register the sales order accordingly to the nature of the order for the purpose of accurate demand forecast.**

**X**

**Problematic case 1** Counting a one-time large order from one customer for the demand forecast

Calculation for demand forecast

Part B  
Order of 100 pcs

Input

Part B Order result  
data of 100 units

→ Using such order data may result in accurate demand forecast

**Problematic case 2** Not counting cancelled parts for demand forecast

Calculation for demand forecast

Part C  
Order of 1 pc

Cancellation

Part C not counted or accumulated

→ Not reflected in the next demand forecast

|                                 | One-time large order from one customer | Cancelled Parts              | Back Ordered Parts                     |
|---------------------------------|--|------------------------------|--|
| Calculation for demand forecast | Not counted<br>×                       | Counted (do not delete)<br>○ | Counted after sales order is made<br>○ |

## 2. SALES ORDER

### Sales Order Process

## External Sales (or Front / Active Sales)

**Step 1** Create a sales order slip after receiving the order from the customer.

| Shop front / counter  | Phone | Fax | E-mail |
|---|-------|-----|--------|
| Confirm the necessary points on the order slip <ul style="list-style-type: none"> <li>• Company name/full name of the customer</li> <li>• Model year/model code/VIN</li> <li>• Required part name</li> <li>• Required quantity</li> </ul> |       |     |        |



**Create a sales order slip**

**Keep the slip**

Record the customer order with the sales order slip to avoid problems such as forgetting, delays or mistakes.

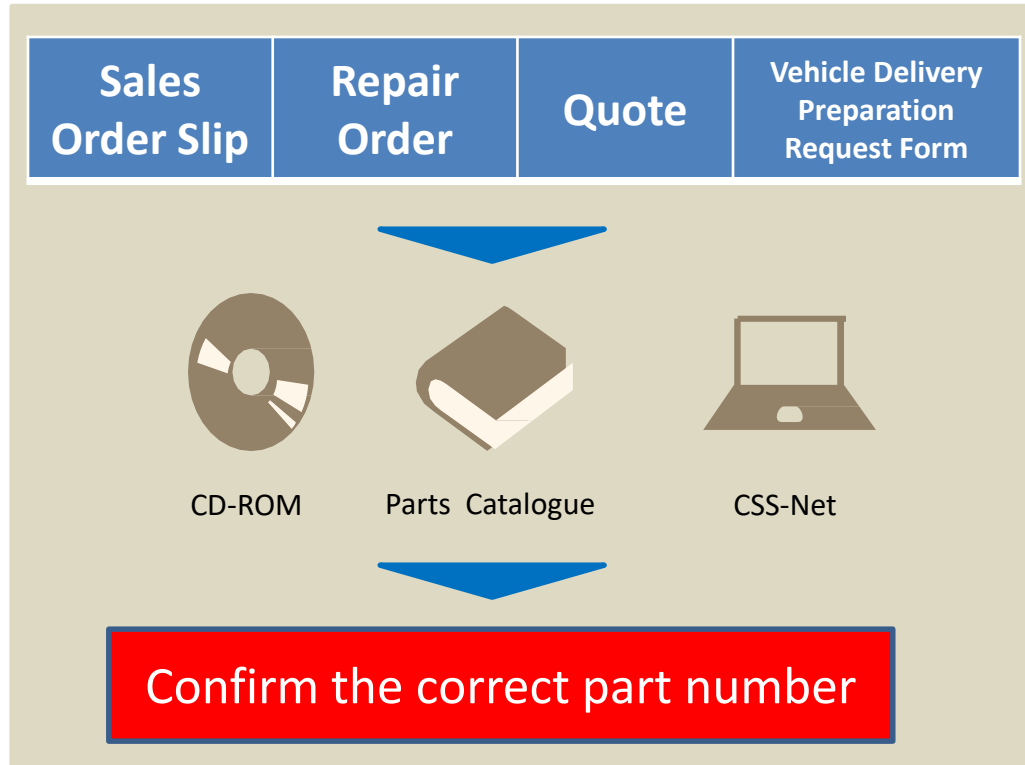
## 2. SALES ORDER

### Sales Order Process

### External Sales (or Front / Active Sales)

#### Step 2

- Identify the part number correctly using tools issued by Isuzu.
- Confirm the bill to party.



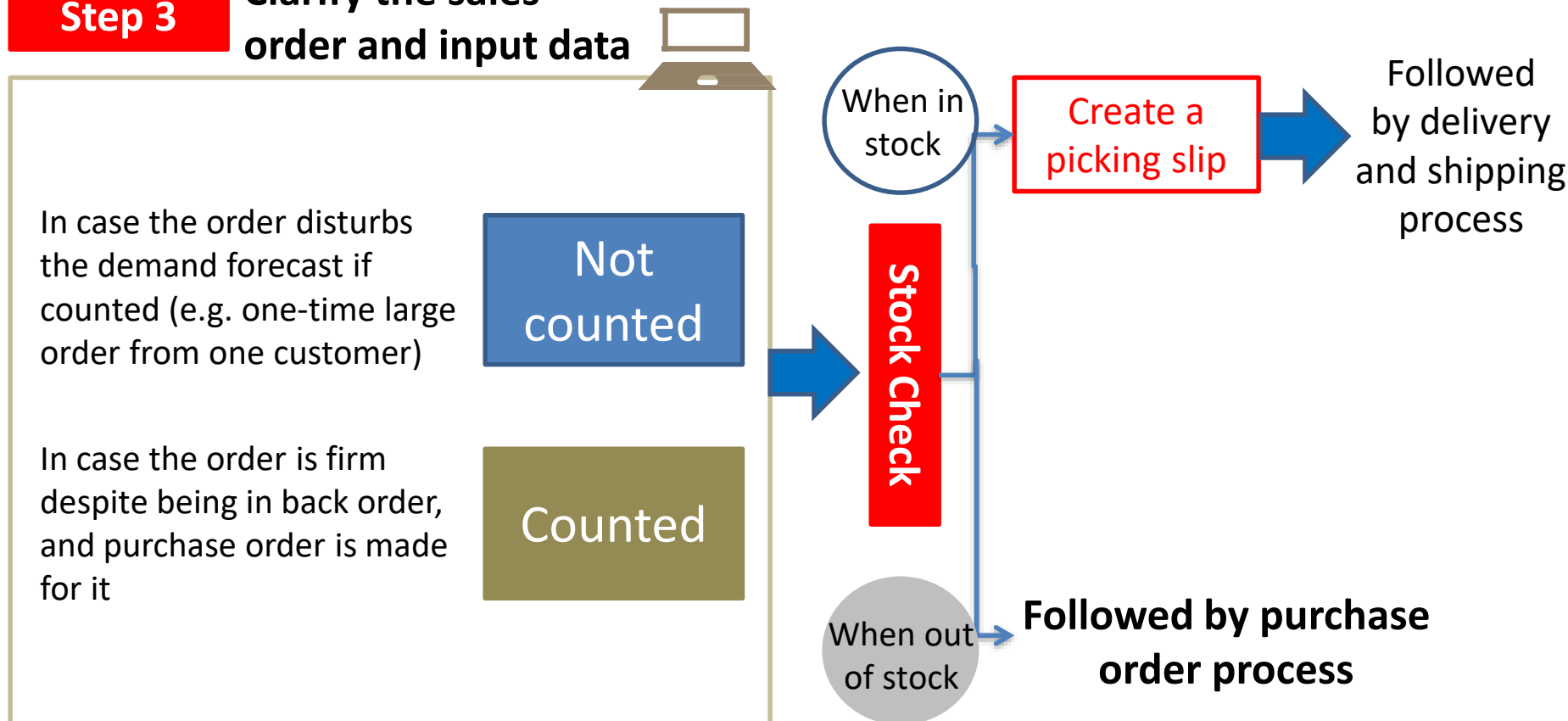
## 2. SALES ORDER

### Sales Order Process

### External Sales (or Front / Active Sales)

#### Step 3

Clarify the sales order and input data



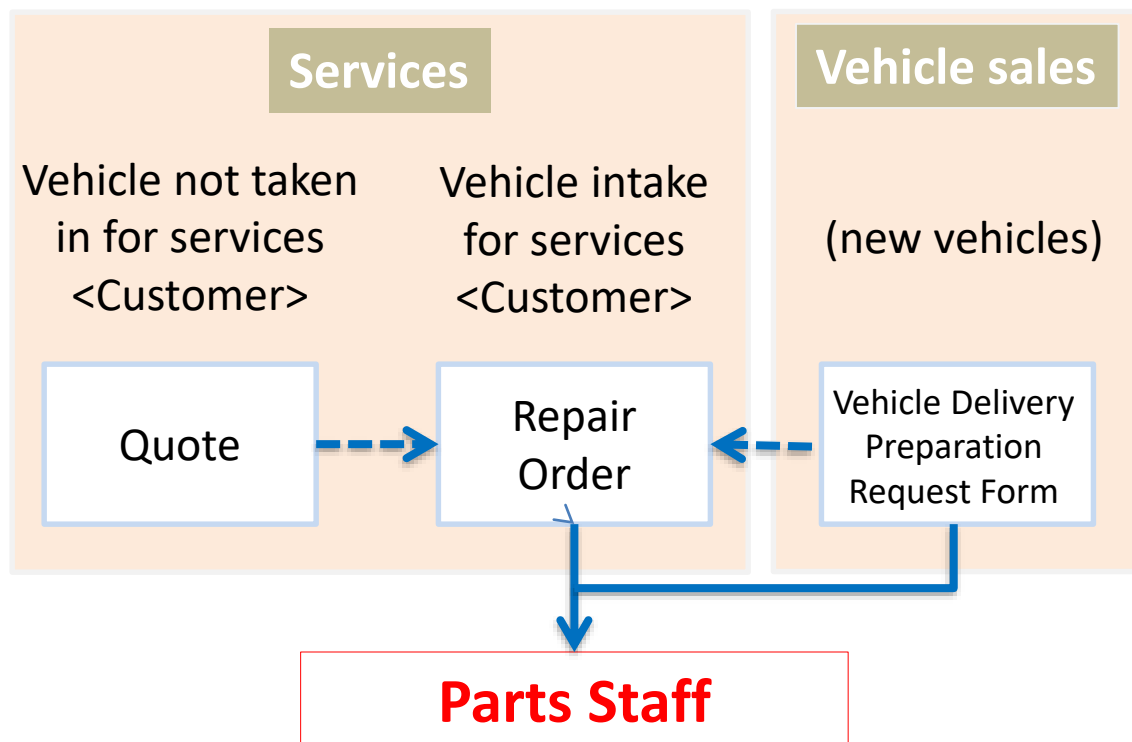


## 2. SALES ORDER

### Sales Order Process

### Internal Sales (or Back / Passive Sales)

**Step 1** Sort the order after receiving the order from the customer



**Take the order with the Quote, Repair Order or Vehicle Delivery Preparation Request Form to avoid problems such as forgetting, delays or mistakes.**



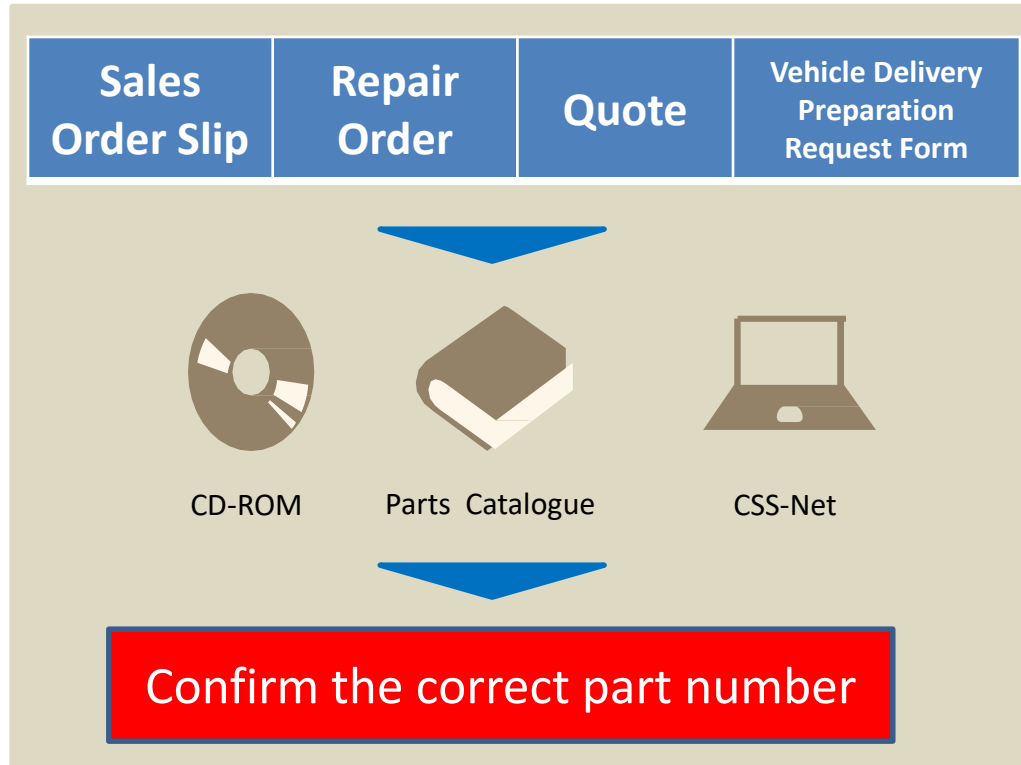
## 2. SALES ORDER

### Sales Order Process

### Internal Sales (or Back / Passive Sales)

#### Step 2

- Identify the part number correctly using tools issued by Isuzu
- Confirm the bill to party



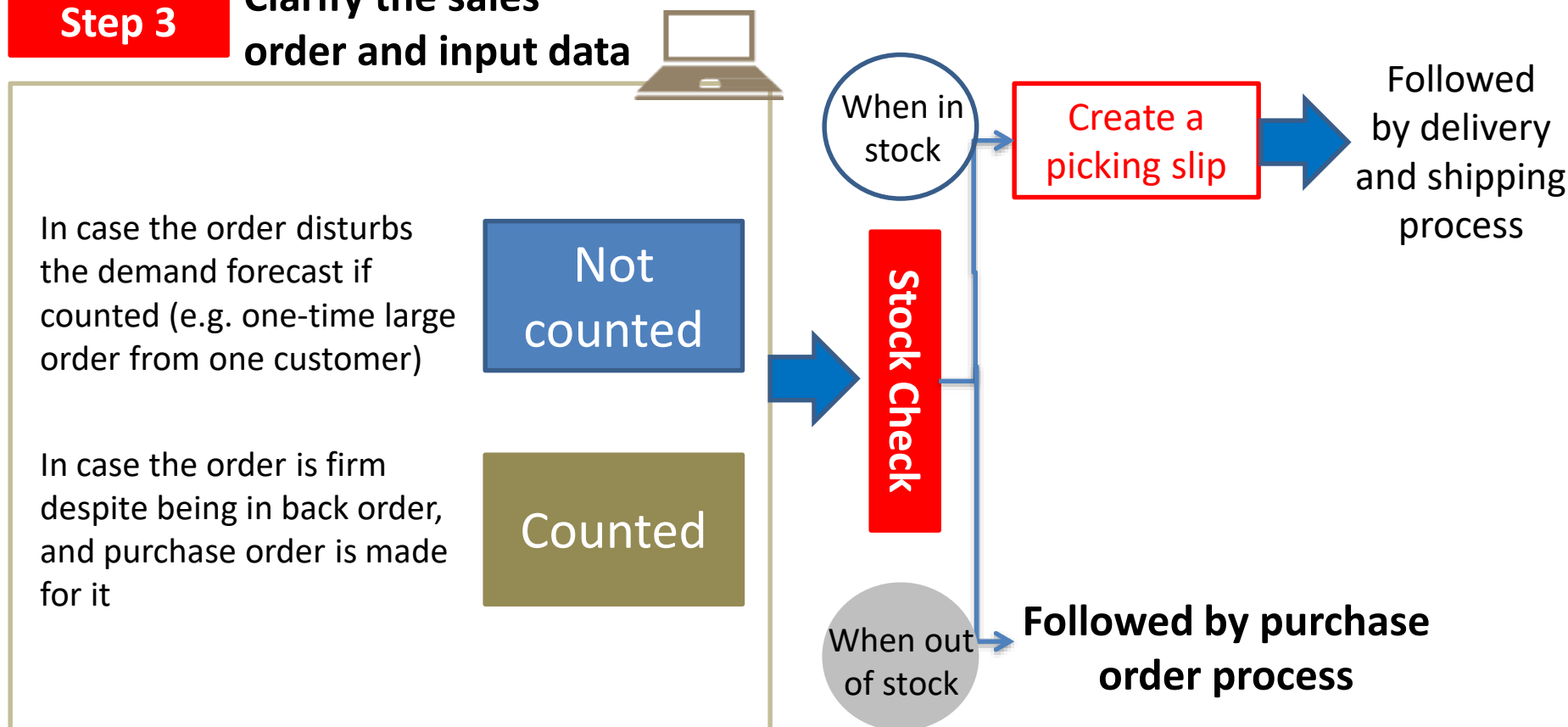
## 2. SALES ORDER

### Sales Order Process

### Internal Sales (or Back / Passive Sales)

#### Step 3

Clarify the sales order and input data



## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



# 3. PURCHASE ORDER

## Purchase Order Process

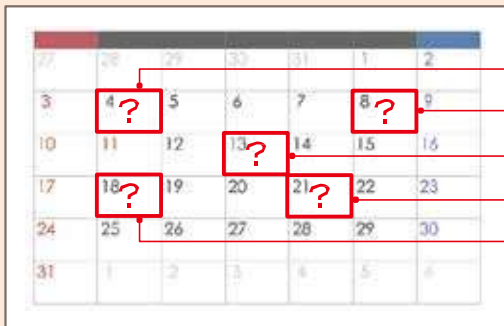
- Stock enquiry to distributor or supplier
- **Keeping the customer informed with delivery date**
- Making purchase orders to the distributor or supplier immediately after confirming a sales order

**Important point**

<Enable the vehicle maintenance schedule to be fixed  
→ The customer can plan the vehicle usage>

Therefore, it is necessary to swiftly confirm the delivery date of out-of-stock parts, inform the customer and make urgent delivery.

Not knowing the delivery date leads to...



Unable to make a maintenance schedule

A longer wait for delivery date lead to...



Delivery date

Decrease in vehicles uptime

# 3. PURCHASE ORDER

**1**

**Immediately confirm the delivery date and inform the customer about the delivery date**

- Informing the exact delivery date enables the customer to make the maintenance schedule easier.
- It is important to communicate negative information swiftly and accurately which could cause problems such as delays.

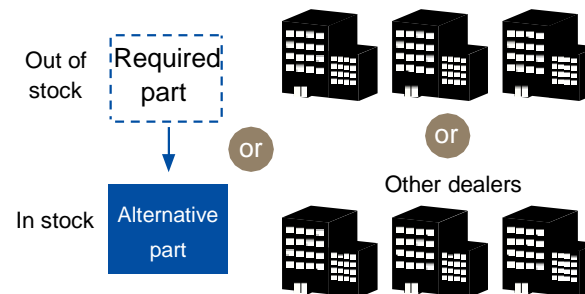
**2**

**Make special arrangements when the customer is in urgent need**

- In addition to requesting the distributor to bring the delivery date forward, be flexible and look for ways to meet customer's required delivery date using the methods listed on the right.



"We can deliver on this date"



# 3. PURCHASE ORDER

## Purchase Order Process

### Step 1

Confirm the stock location and delivery date of the part with the distributor or supplier.



### Step 2

Inform the customer about the delivery date and confirm whether or not the customer will order the part.



Inform the delivery date

“We can deliver the part on \_\_\_\_.”

Confirm if the customer will order the part

“Will this meet your maintenance or repair schedule?”



### 3. PURCHASE ORDER

#### Purchase Order Process

When the delivery date is accepted and order is firm;

#### Step 3 A Confirm the order-to party and make the order

**Parts for inventory**

(parts delivered from the distributor)



**Order to the distributor**

**Parts for direct delivery**

(parts delivered from the supplier)



**Order to the supplier**



**To goods receipt and putaway**

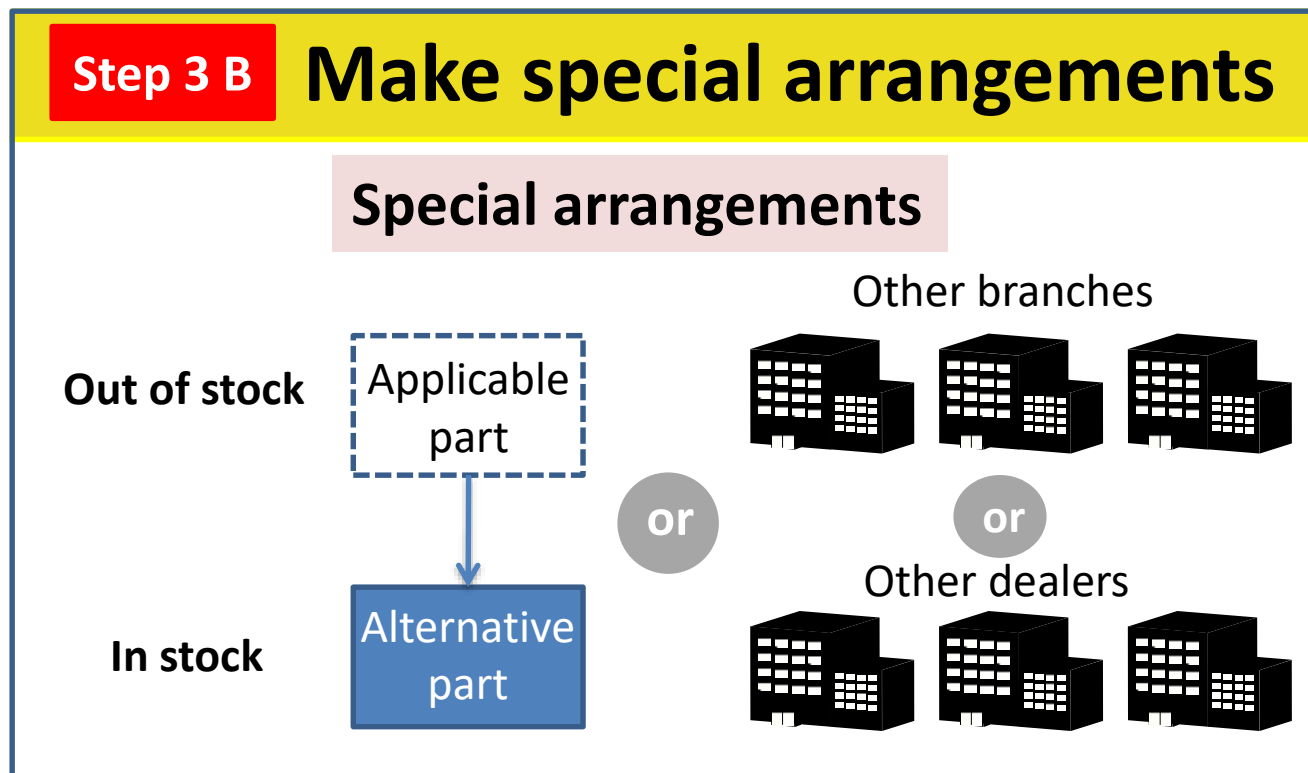
In case of direct delivery, there is no goods receipt or putaway



### 3. PURCHASE ORDER

#### Purchase Order Process

When the delivery date is not accepted but the customer requests to adjust the delivery date;



# 3. PURCHASE ORDER

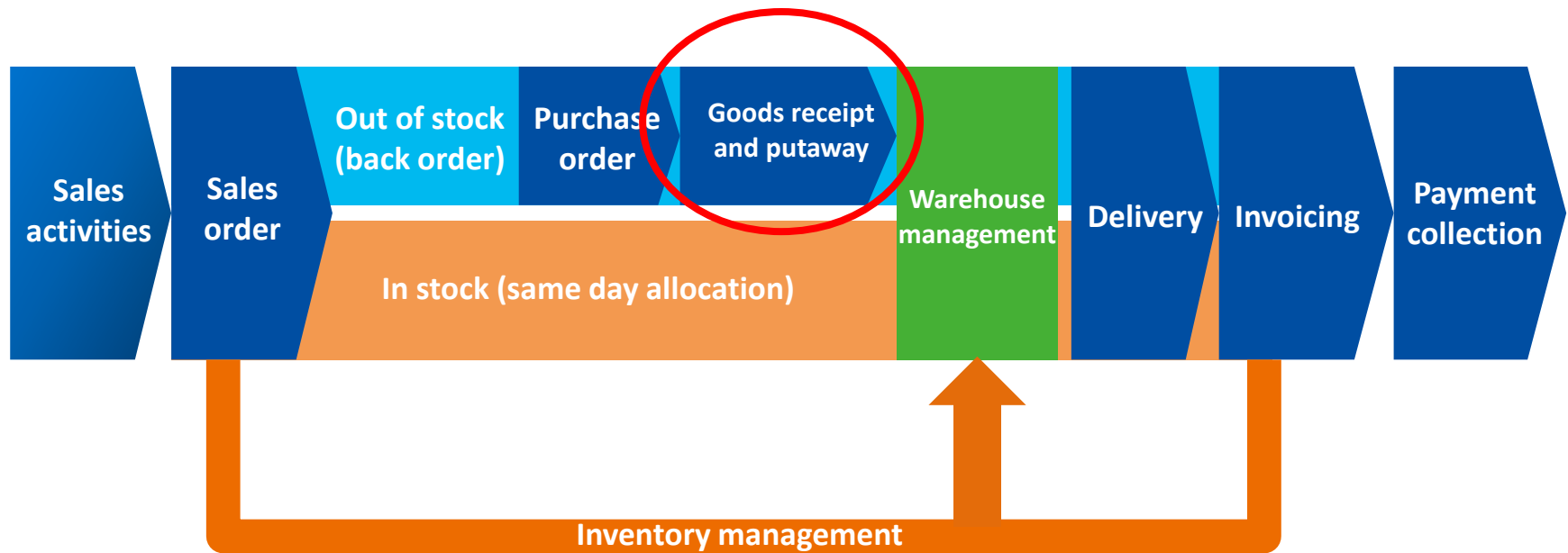
## Purchase Order Process

When the delivery date is not accepted and order is cancelled;

### Step 3 C Register cancellation



## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



# 4. GOODS RECEIPT AND PUTAWAY

## Good Receipt and Putaway Process

- Confirming the delivered part number and quantity.
- **Inputting goods receipt data.**

Important  
point

Process goods receipt and putaway swiftly in order to prevent the discrepancy between shelf stock and system stock.

Recording putaway data before binning on the shelf physically in the warehouse leads to...

Misinform the customer that can deliver the parts immediately when the parts are not on the shelf yet.

**= Loss of confidence**

Not recording the putaway data after the physical binning leads to...

Misinform the customer that the parts are not available.

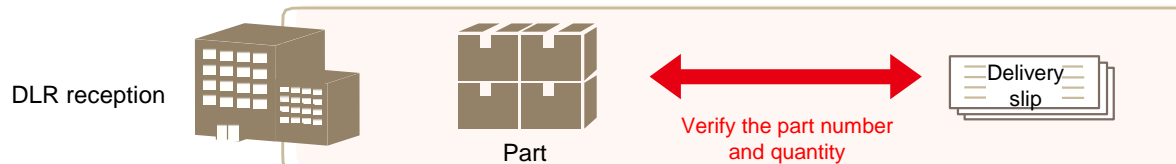
**= Loss of sales**

|                                    | Action   |
|------------------------------------|--|
| Confirmation of parts and quantity | <ul style="list-style-type: none"> <li>• Make sure to check at the goods arrival</li> <li>• Inform the distributor or supplier for discrepancy</li> <li>• Inform the customer accordingly</li> </ul> |
| Data Input                         | <ul style="list-style-type: none"> <li>• Input the goods receipt and putaway data immediately</li> </ul>   |

# 4. GOODS RECEIPT AND PUTAWAY

## Goods Receipt and Putaway Processes

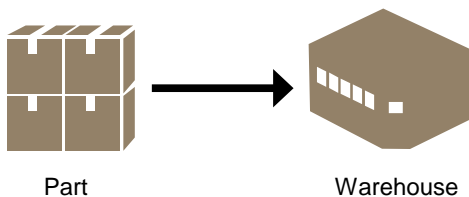
### Step 1 Verify the delivery slip when the part arrives



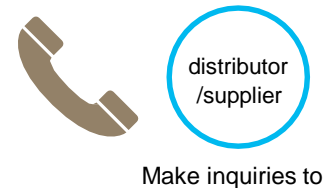
Verification  
When correct

Verification  
When not correct

### Step 2 A Store the part in the warehouse (putaway)



### Step 2 B Ask the distributor or supplier for the delivery date of the correct part



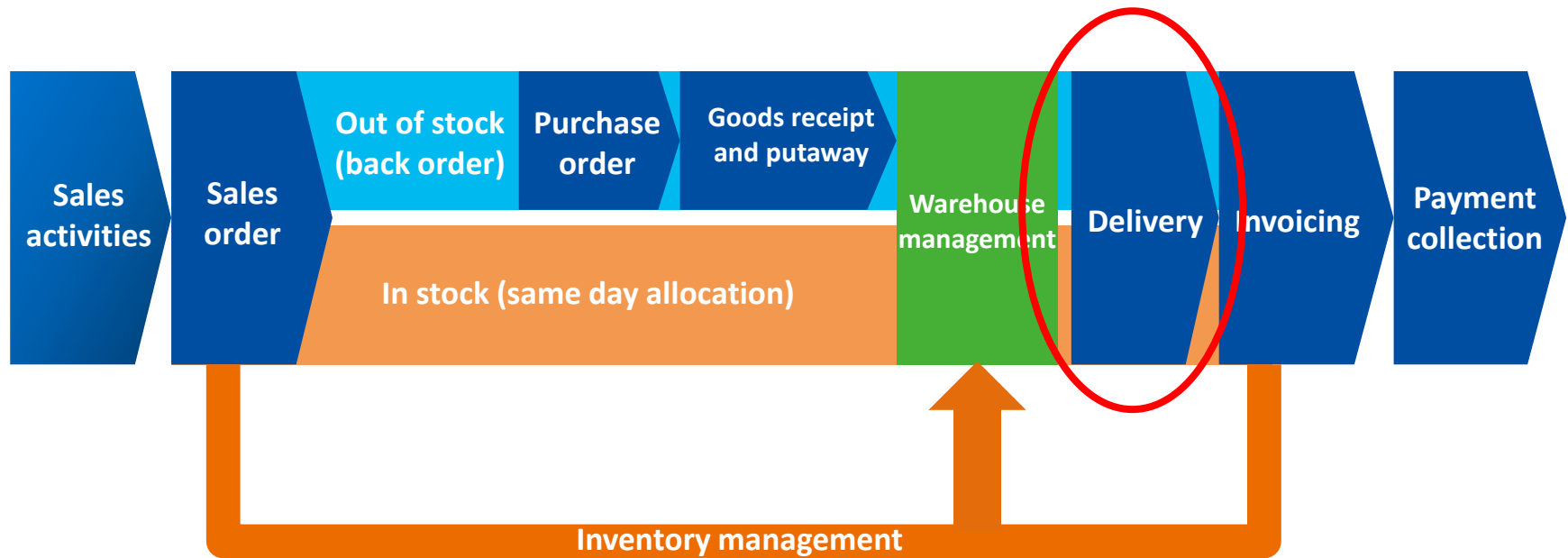
### Step 3 A Input the purchase data



### Step 2 B Tell the customer about the change in delivery date



## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



# 5. DELIVERY

## Delivery Process

- Deliver the correct part at the designated time and place without any mistakes

Important  
point

**Set up the most efficient routing for parts delivery with the cost reduction in mind**

### Best Delivery

- Keep the delivery staff and delivery vehicle in good order to avoid failed deliveries.
- When the arrival time may be different than scheduled, inform the customer of the new expected delivery time.

### Cost Reduction

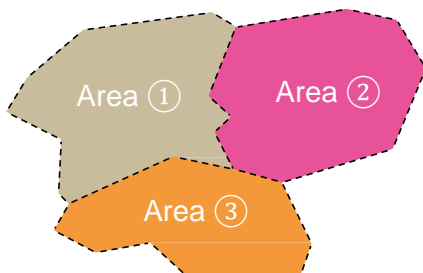
- Construct lean and efficient delivery routes to reduce costs.

# 5. DELIVERY

## Constructing a delivery route

### Step 1

Divide own sales territory into smaller manageable areas to construct optimal routes



However,



Consider a dedicated delivery for fleet customers



### Step 2

Confirm acceptable time frame for receiving parts each destination

Dealer

**A** Part required in the first hour in the morning

**B**

Only possible to receive parts in the afternoon

**C**

Part required by noon

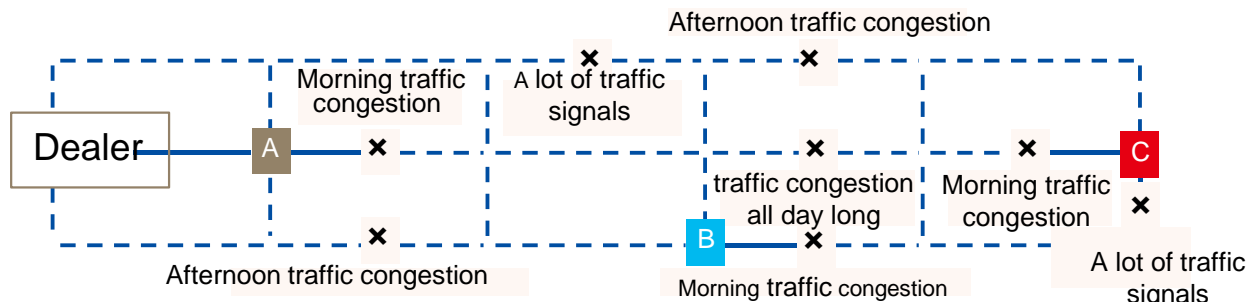


# 5. DELIVERY

## Constructing a delivery route

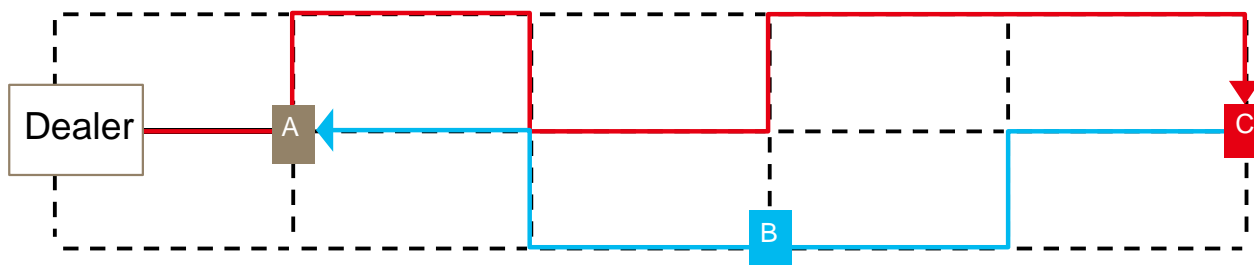
### Step 3

Understand the traffic conditions from the dealer to the delivery destination



### Step 4

Consider efficient routes and create an overall map of delivery routes



# 6. CLAIMS HANDLING

## Types of Claims

At receiving / Storing

Warehouse

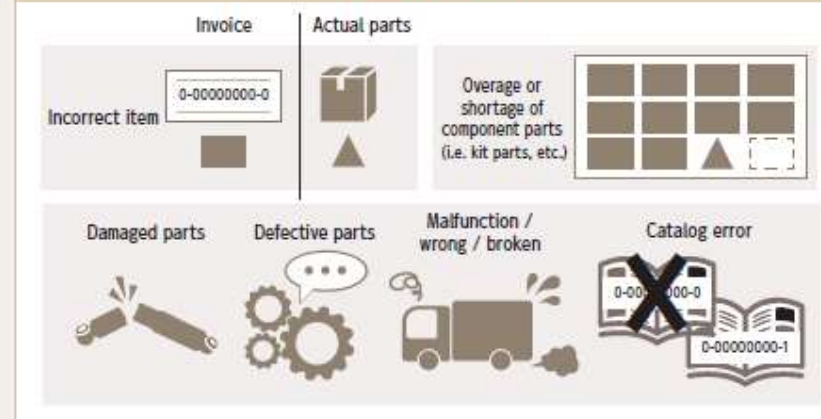
After delivery



### Claims found during goods receipt

|   | Invoice                            | Actual parts                      |
|---|------------------------------------|-----------------------------------|
| A Over-supply                                   | 3 pcs                              |                                   |
| B Short-supply                                  | 5pcs                               |                                   |
| C Incorrect item<br>(e.g. right or left hand)   | 0-00000000-0<br>Parts (Right Hand) | 0-00000001-0<br>Parts (Left Hand) |
| D Incorrect price                               | \$100.00                           | \$95.00                           |
| E Others<br>(e.g. no delivery,<br>damage, etc.) | 0-00000000-1<br>5pcs               |                                   |

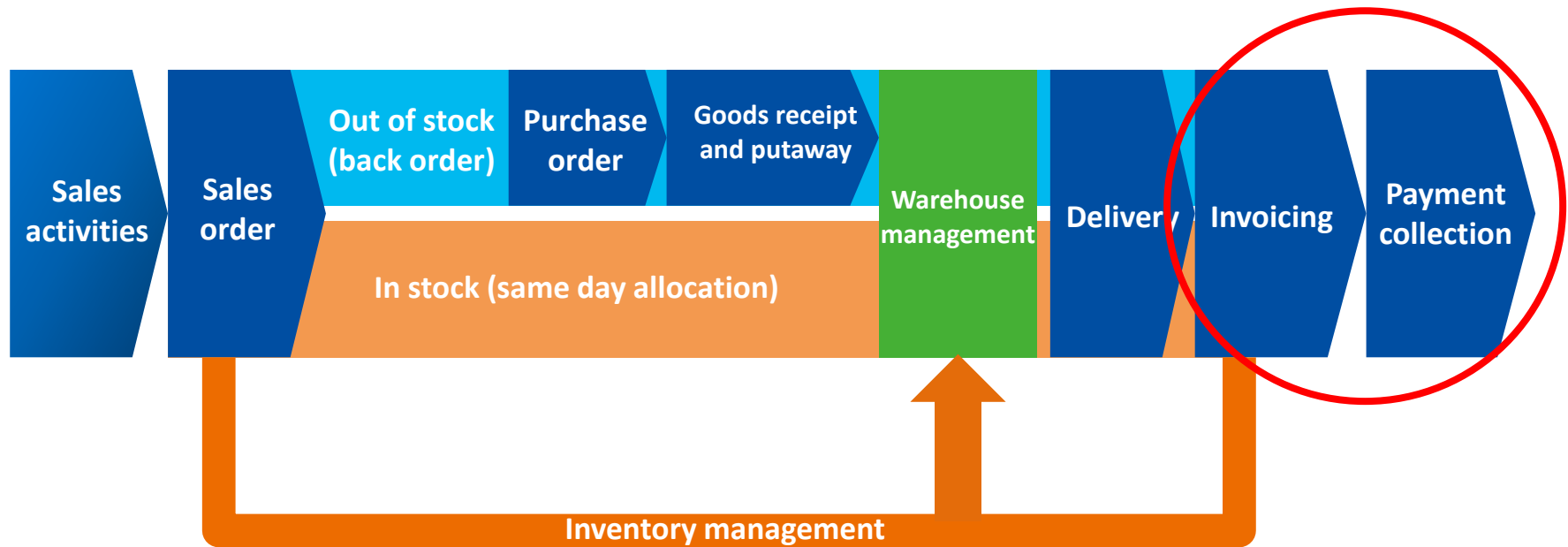
### Customers claim



### Handling the customer claim



## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



# 7. INVOICING AND PAYMENT COLLECTION

## Invoicing and payment collection process

- Record invoice data based on the delivery note
- Make sure to collect payments on time

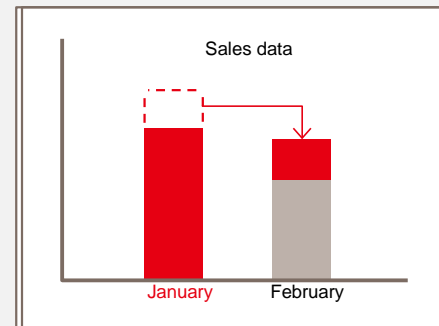
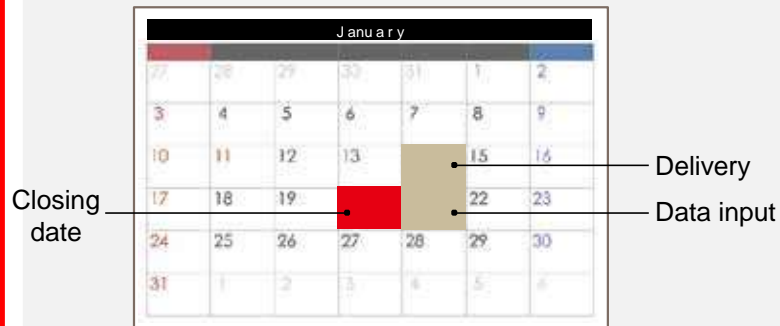
Important point

**Record invoice data immediately to avoid data entry after fiscal closing data.**

(Example)

The closing date is the 20th of the month and the payment term is the last day of the following month

**Sales meant for January is recorded in February in reality**



→ Sales data for January is not totalled correctly preventing proper inventory management

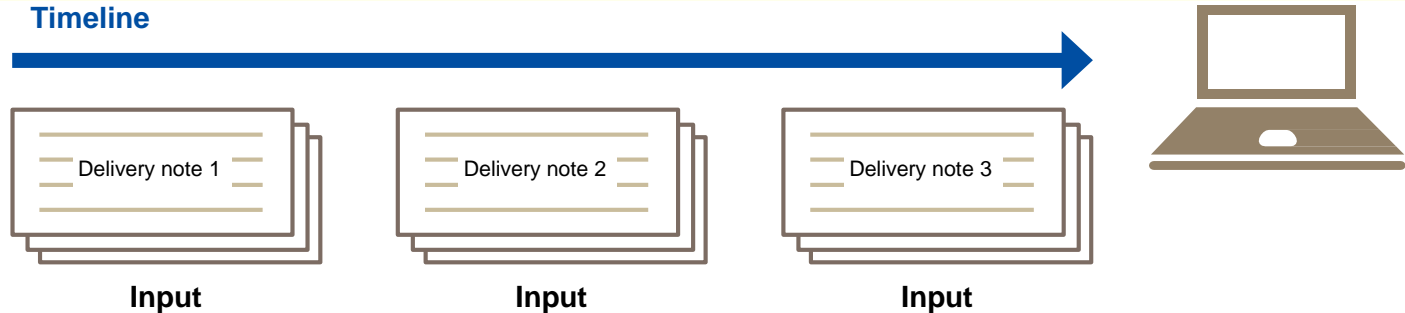
→ Payment collection cannot be made at the end of February causing a negative financial impact (Payment collection cannot be made until March)

# 7. INVOICING AND PAYMENT COLLECTION

## Invoicing and payment collection process

### Step 1 Record data immediately after receiving the delivery note

Timeline

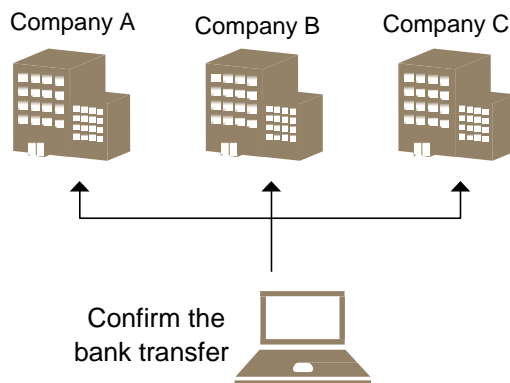


When using a bank transfer

When receiving cash

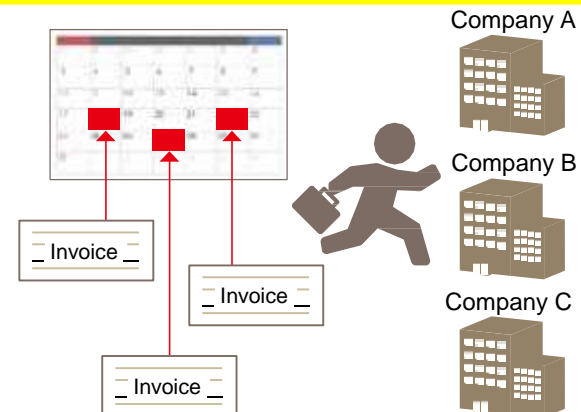
#### Step 2 A

Confirm payment has been transferred on the payment due date

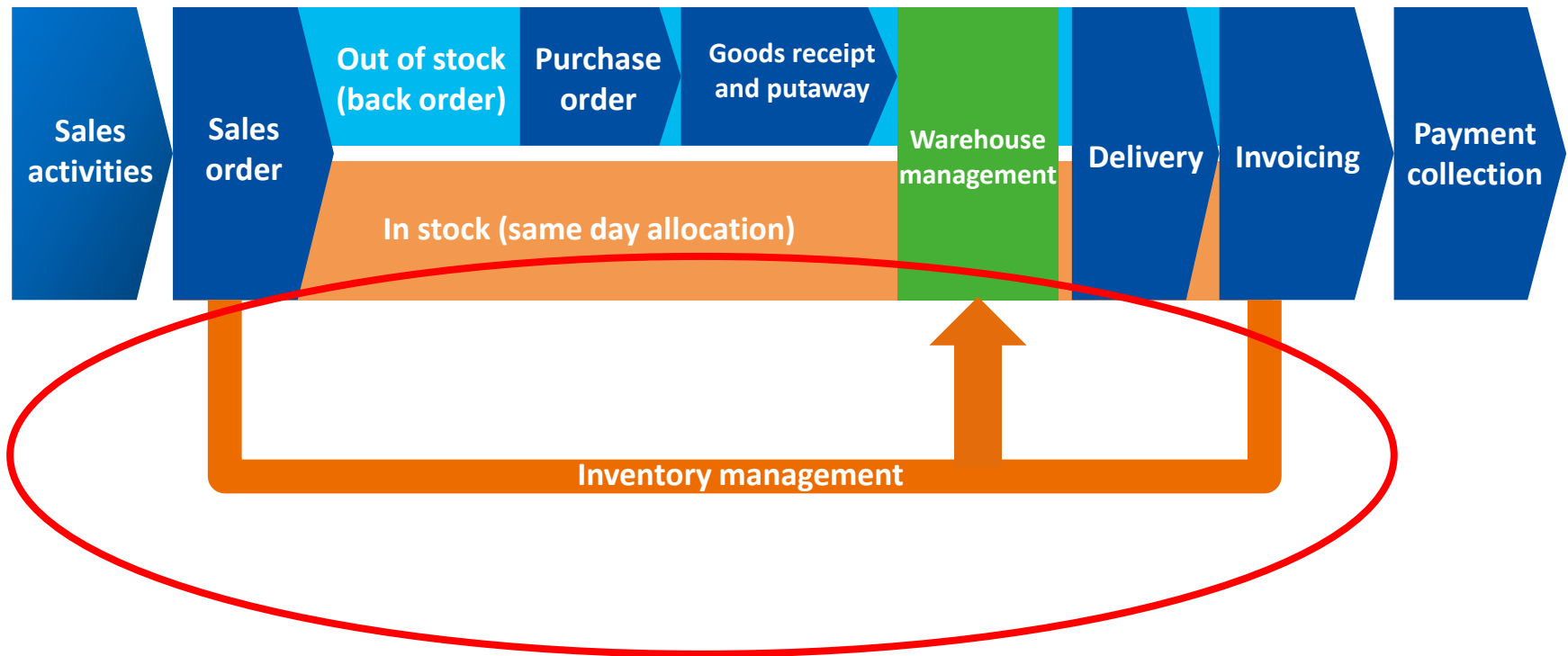


#### Step 2 B

Adjust your visit schedule around the payment due date to ensure payment collection



## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



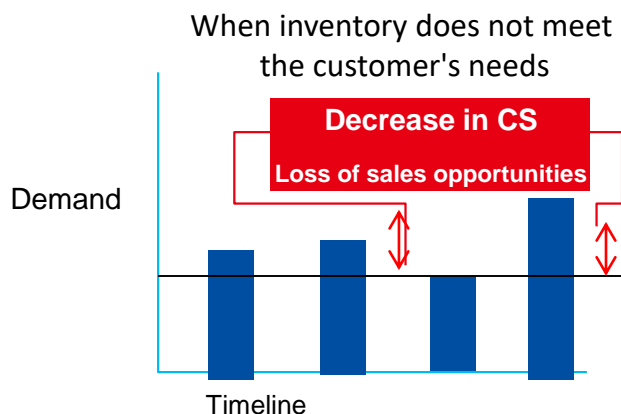
# 8. INVENTORY MANAGEMENT

## Inventory management work flow

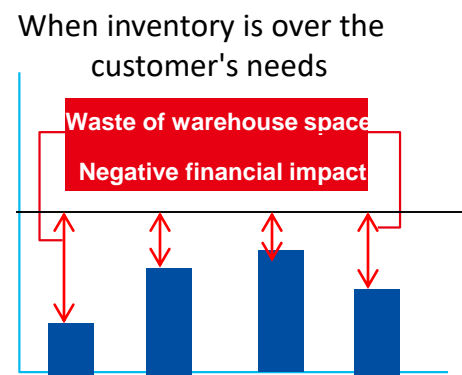
- Determine fixed (mandatory) stock list
- Execute demand forecast
- Determine the right quantity of stock and make purchase orders to prevent parts from running out of stock
- Ensure the running of appropriate inventory management using management KPIs

### The Goal of Inventory Management

To maintain an appropriate amount of inventory of parts necessary for vehicles repair and maintenance while taking into account of the customer's needs and the optimal inventory for the dealership themselves.



- When inventory does not meet the customer's needs parts cannot be available to customers who require repairs or maintenance leading to vehicle downtime.
- Customer satisfaction also declines which in turn reduces confidence in Isuzu.



- Warehouse space is limited, so an excessive amount of inventory leads to a waste of warehouse space (i.e. non moving stock).
- Excess inventory means an excessive inventory value which has a negative financial impact (increase of financial burden).

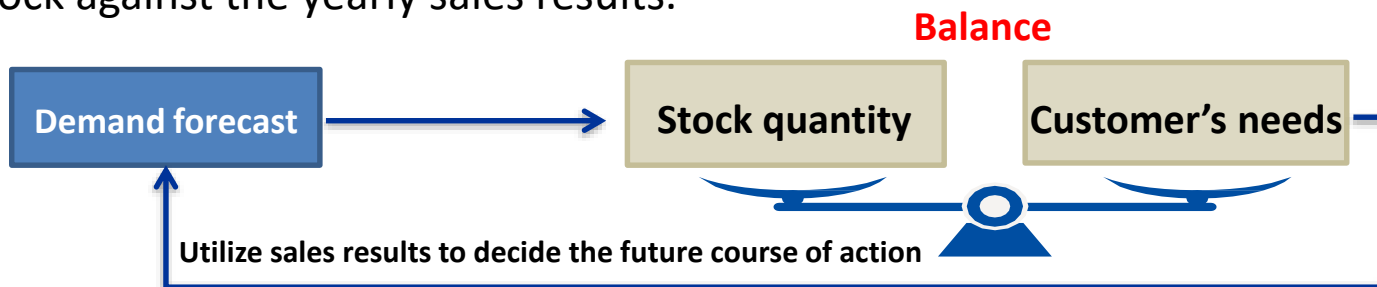
# 8. INVENTORY MANAGEMENT

## The Goal of Inventory Management

Important  
point

**Review and update the inventory parameters based on the result data, and carry out demand forecast for each part, in order to achieve appropriate inventory.**

- Using the latest 12 months demand data, review the inventory at least once every 6 months
- “the number of parts is limited” is part of the nature in the basic thinking of inventory management
- Carrying out demand forecast utilizing this fundamental idea enables to maintain a minimum required quantity of inventory which is also the optimal amount for the dealer and serves customer’s needs at the same time.
- It is important to determine the target stock quantity by checking the current stock against the yearly sales results.



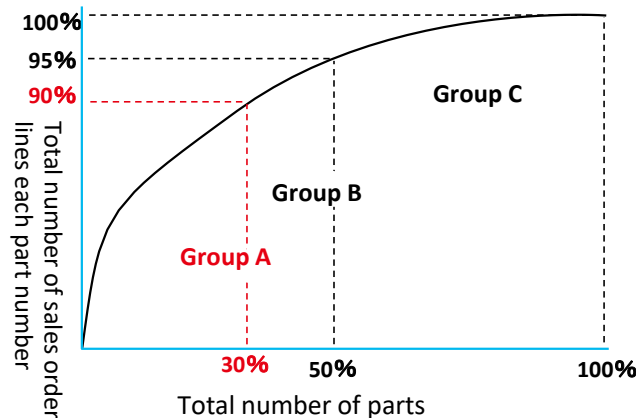


# 8. INVENTORY MANAGEMENT

## Inventory Management Process Flow

To manage the maintenance of the appropriate amount of inventory, follow the steps below.

### Step 0 Classify parts using ABC analysis and determine fixed inventory



#### Demand trend of spare parts

Generally, the limited number of parts covers the majority of sales.

#### Group A

Top selling products  
(Regular replacement parts, etc.)

e.g. element, clutch,  
fan belt etc.

#### Group B

Parts necessary  
for repair

e.g. panel etc.

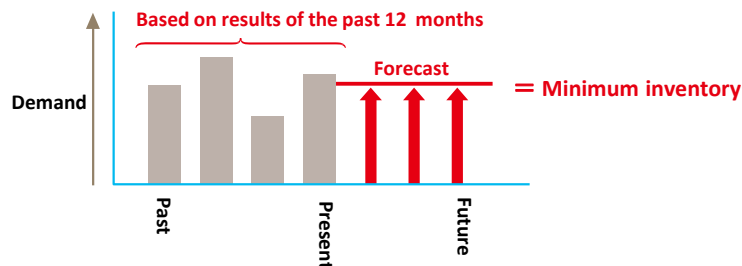
#### Group C

Parts with  
unpredictable  
demand

e.g. cab, frame, etc.

Demand forecast

### Step 1 Run the demand forecast to calculate an appropriate inventory quantity

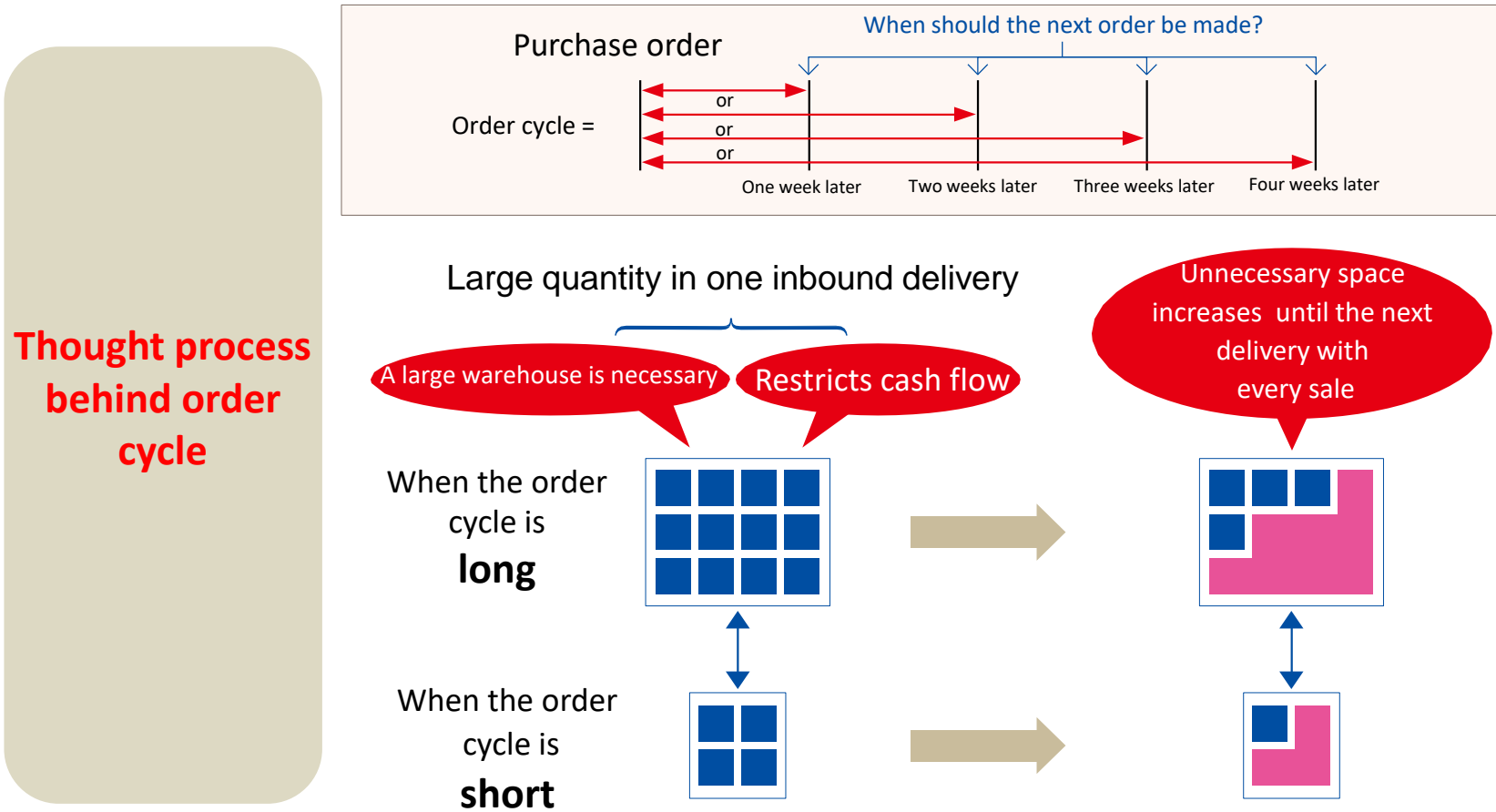


- Calculate target inventory quantity from the last 12 months' average to cover seasonal trends
- Make regular reviews (every 3 or 6 months)

# 8. INVENTORY MANAGEMENT

## Inventory Management Process Flow

### Step 2 Make purchase orders based on the order cycle and procurement lead time

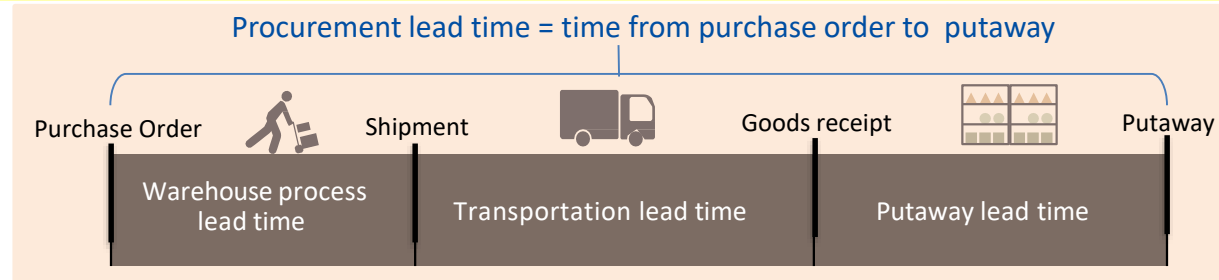


# 8. INVENTORY MANAGEMENT

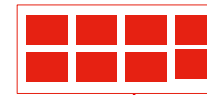
## Inventory Management Process Flow

### Step 2 Make purchase orders based on the order cycle and procurement lead time

**Thought  
process behind  
procurement  
lead time**

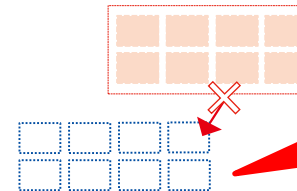


When estimate for  
lead time is  
**too long**



There is still a lot of  
inventory when new  
deliveries arrive

When estimate for  
lead time is  
**too short**



Deliveries do not  
arrive even when  
inventory is low

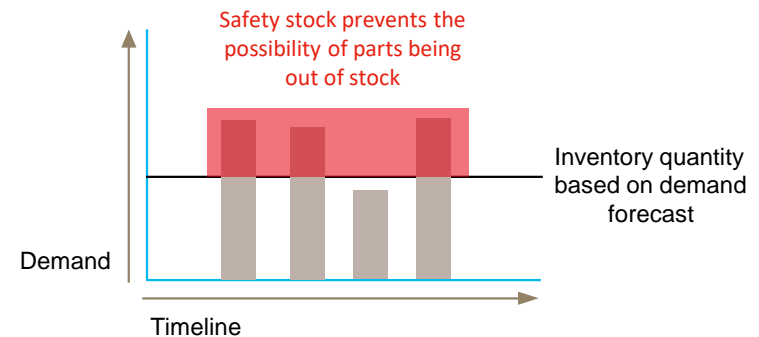
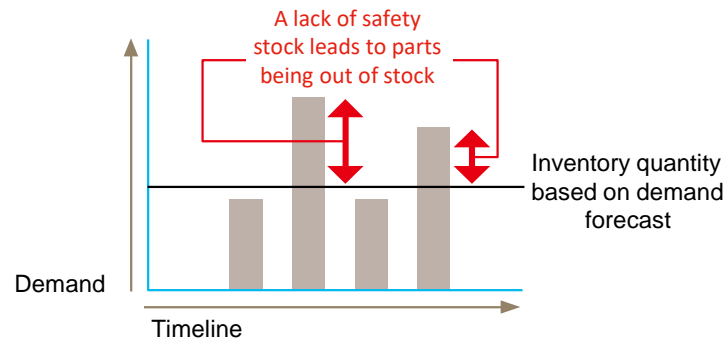


# 8. INVENTORY MANAGEMENT

## Inventory Management Process Flow

### Step 3

### Calculate amount of safety stock necessary to cover demand fluctuations



**Factor this in when calculating the appropriate amount of inventory**  
 Inventory management includes analysis utilizing demand data  
 Organize demand data by part number and update it regularly

$$\text{Forecast quantity} \times (\text{Lead time} + \text{Order cycle}) + \text{Safety stock}$$

Total stock

Cycle stock (An inventory of \_\_\_\_\_ pcs is necessary for \_\_\_\_\_ days)

# 8. INVENTORY MANAGEMENT

Total stock

$$\text{Forecast quantity} \times ( \text{Lead time} + \text{Order cycle} ) + \text{Safety stock}$$

E.g.

Preconditions

1. 1 month is to be 4 weeks
2. Lead time between purchase order and putaway is 2 weeks
3. Frequency of purchase order is once a week
4. Order result in the past one year is below

| Jan | Feb | Mar | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec | Monthly average |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----------------|
| 50  | 45  | 55  | 45  | 40  | 55  | 60  | 50  | 40  | 50  | 40  | 50  | 48.33333        |

Forecast quantity

Calculate the average using the last 12 months' demand result.  
(The sum of order results in Jan-Dec) / 12 months = 48pcs

Lead time

Check the lead time from purchase order to putaway.  
2 weeks = 0.5 months

Order cycle

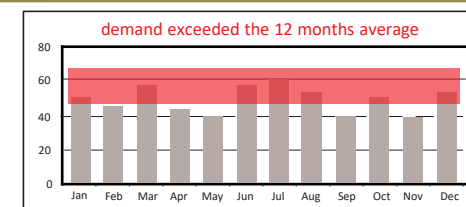
Check the frequency of purchase orders.  
once a week = once in 0.25 months

$$48\text{pcs} \times (0.5\text{months} + 0.25\text{months})$$

Cycle stock  
(Minimum inventory of 36pcs is necessary)

Safety stock

Consider how much stock you need when the demand has changed  
Depending on the capacity of the parts warehouse, keep the stock  
Such as for one week', or two weeks' worth of average demand, etc.

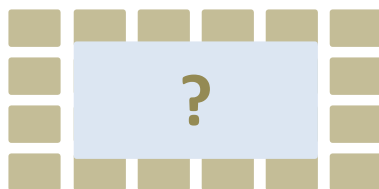


# 8. INVENTORY MANAGEMENT

## Inventory Management Process Flow

### Step 4 Ensure the running of appropriate inventory management using management KPIs

Proper inventory management  
cannot be visualized



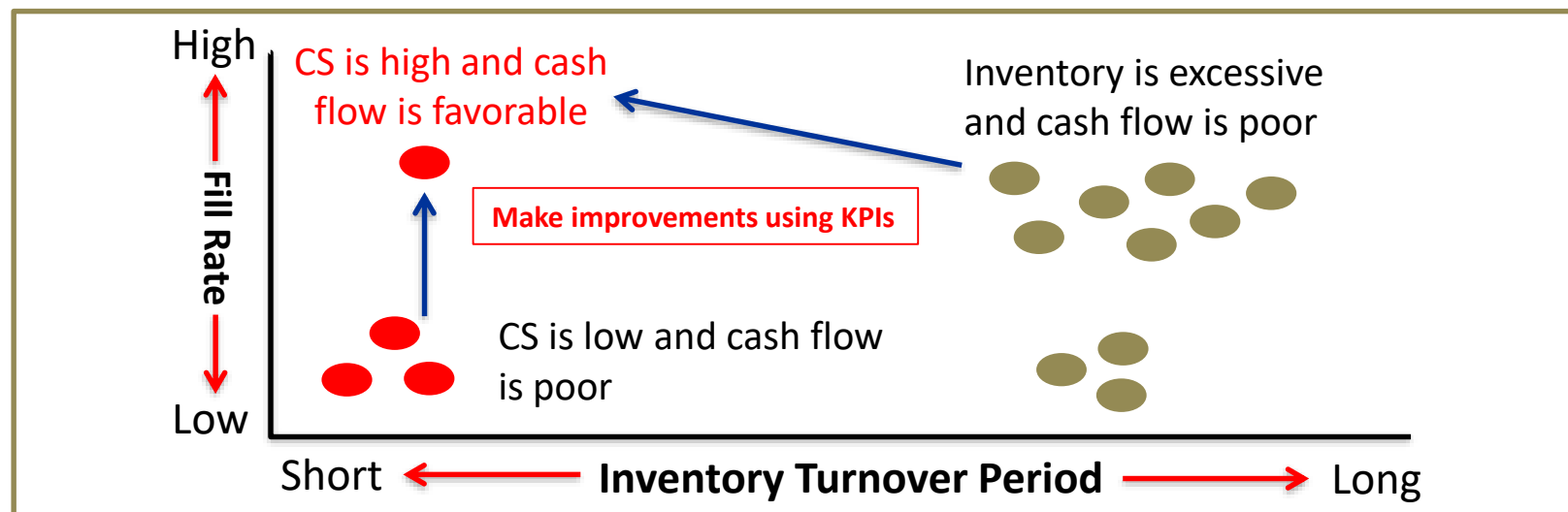
Determine that inventory is  
managed using KPIs

Fill rate

$$= (\text{no. of lines filled} / \text{total no. of order lines}) \times 100$$

Inventory Turnover Period

$$= (\text{monthly average inventory value} / \text{monthly average sales cost}) \times 30 \text{ days}$$



# 8. INVENTORY MANAGEMENT

## Inventory Management Process Flow

Thought process behind  
inventory turnover period

Inventory turnover period of 15 days  
(Inventory is sold and replaced in 15 days)

Inventory turnover period of 30 days  
(Inventory is sold and replaced in 30 days)

Inventory turnover period of 45 days  
(Inventory is sold and replaced in 45 days)

Inventory value

Amount of sales costs

Example

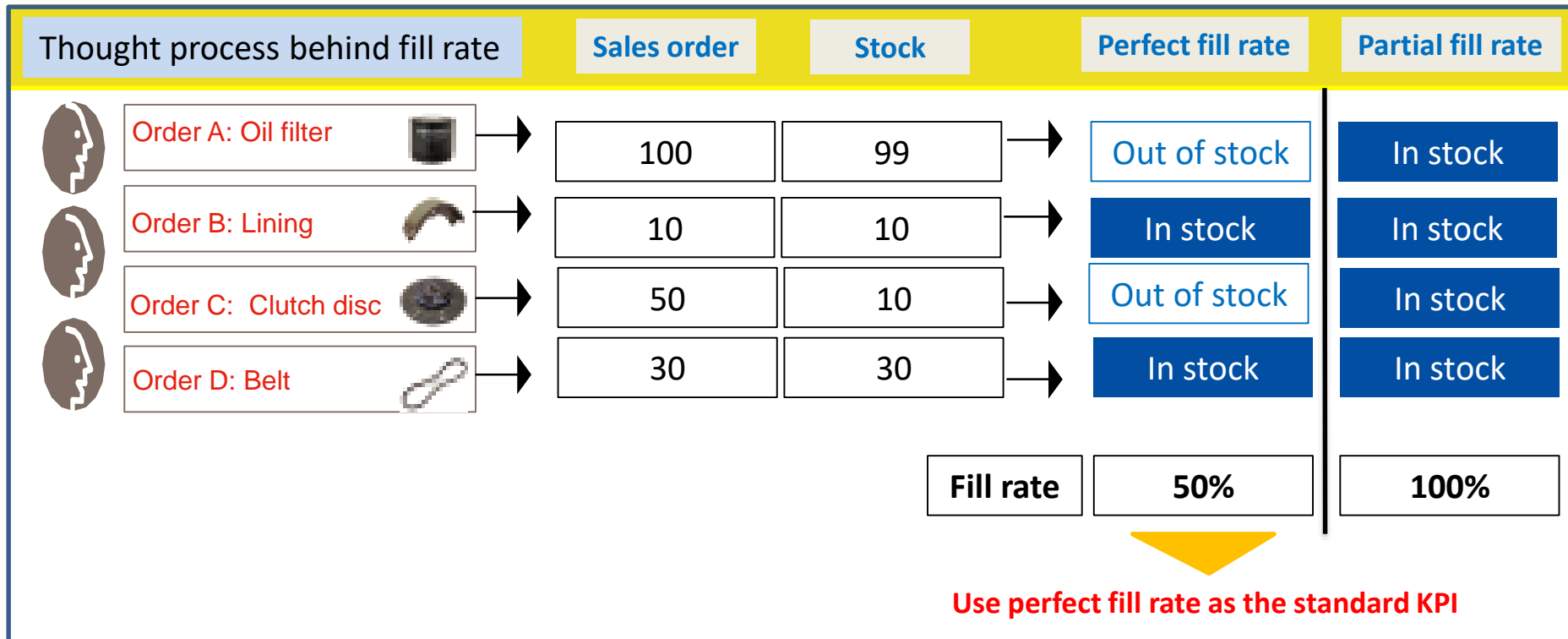
$$15 \text{ days} = \frac{10,000}{20,000}$$

$$30 \text{ days} = \frac{20,000}{20,000}$$

$$45 \text{ days} = \frac{30,000}{20,000}$$

# 8. INVENTORY MANAGEMENT

## Inventory Management Process Flow

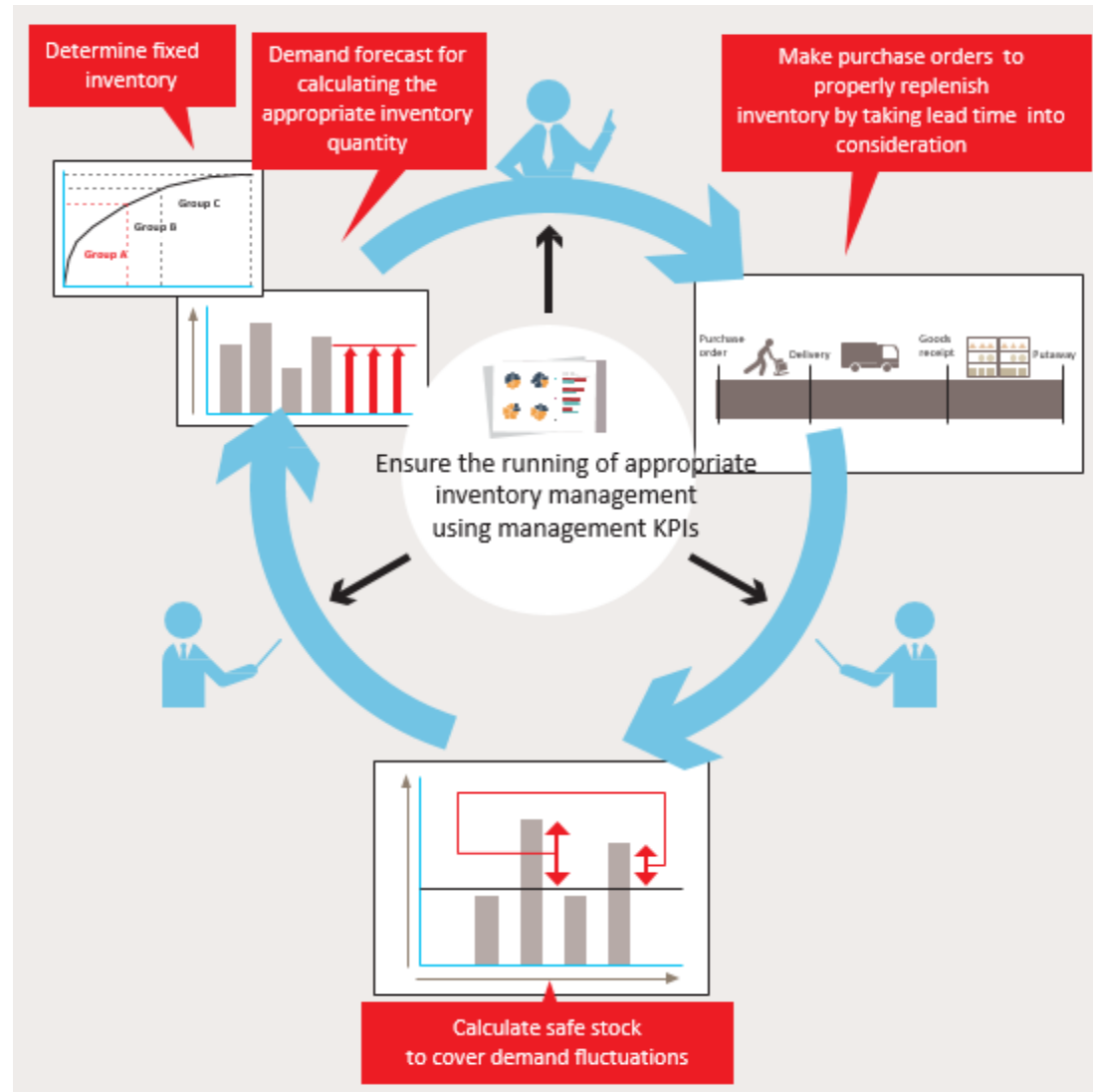




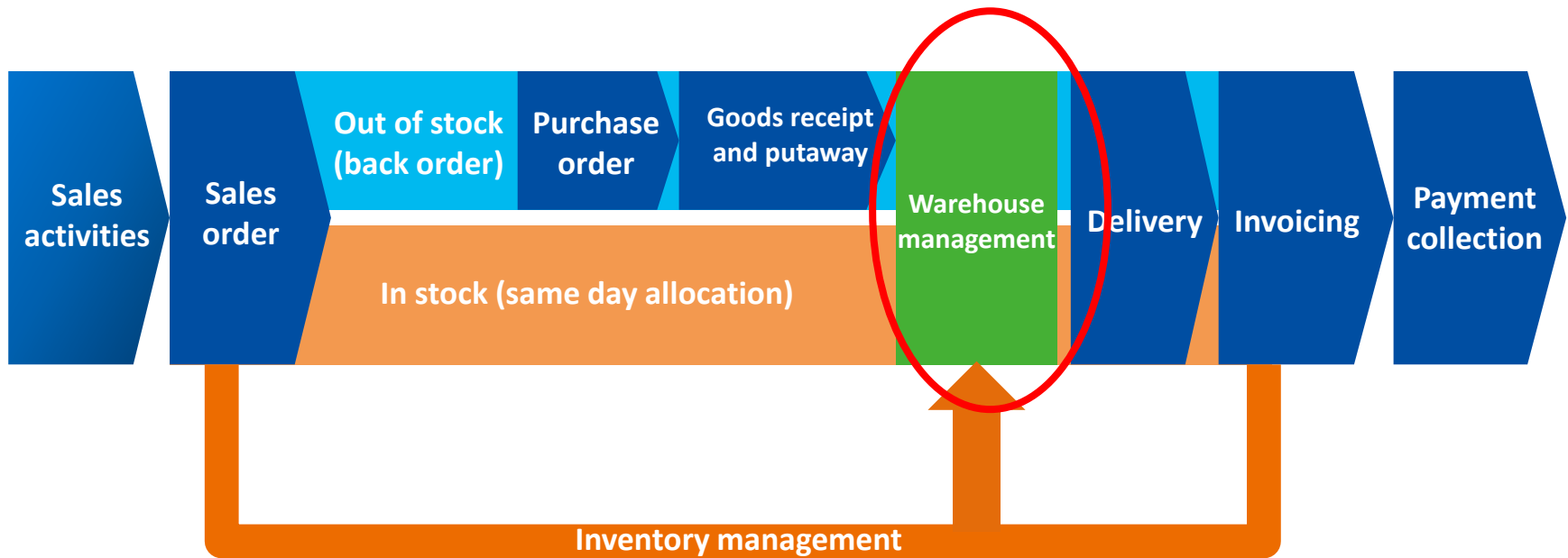
# 8. INVENTORY MANAGEMENT

## Inventory Management Process Flow

Carry out management in an ideal manner by constructing a proper inventory management system based on these steps;



## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW



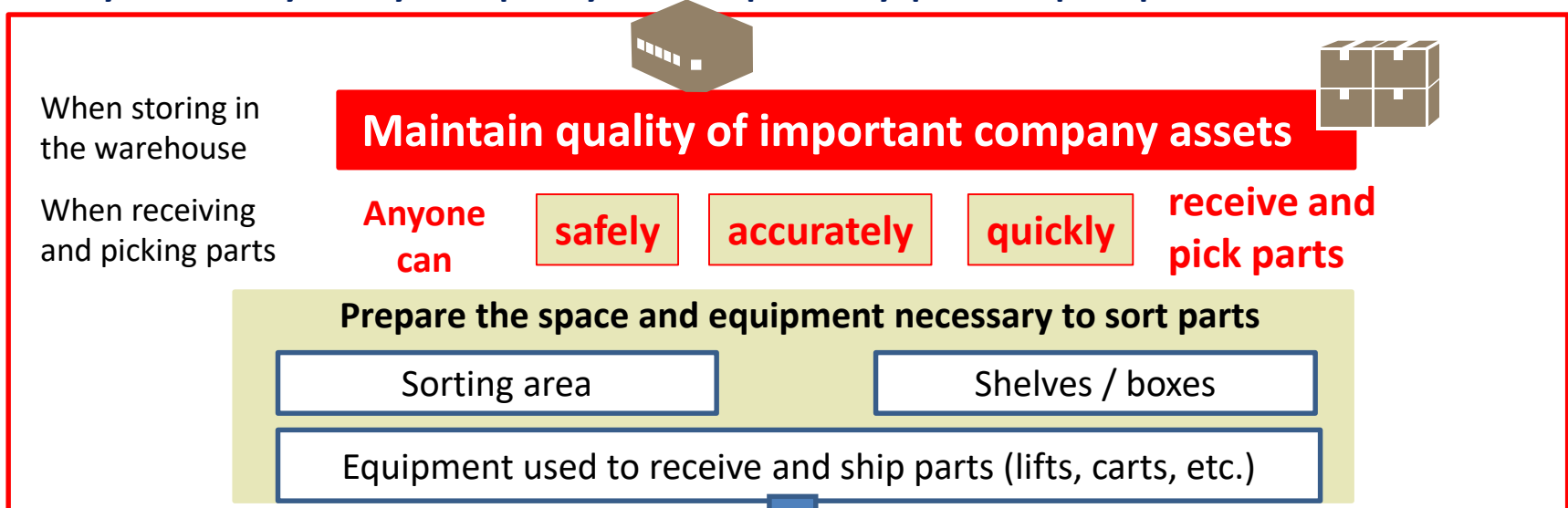
# 9. WAREHOUSE MANAGEMENT

## Warehouse management process

- Store the delivered part as inventory
- Pick and pack the parts for customer's order
- Carry out the 5S activities to maintain a clean workhouse
- Take inventory count regularly and check for quantity discrepancies

### The Goal of Warehouse Management

To maintain quality of stored parts in a limited space and keep a warehouse in which anyone can safely, accurately, easily and quickly receive, put away, pick and pack parts.



**Achieve high quality product supply all the time, every time**

# 9. WAREHOUSE MANAGEMENT

## The Goal of Warehouse Management

### 1 Set a proper storage area for each part

#### Manage parts by their characteristics and type

Set a storage area according to shape, size weight and type of each part.



Shape and type



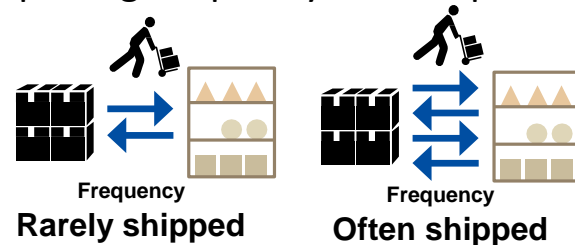
Size



Weight

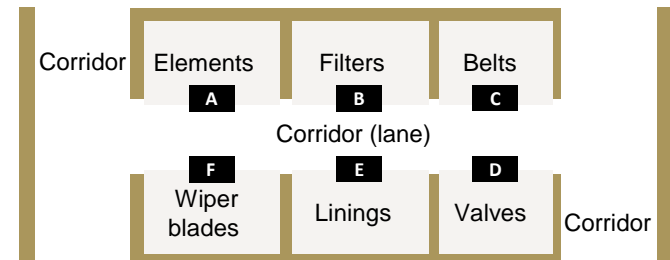
#### Manage parts by frequency

Set a storage area according to the picking frequency of each part.



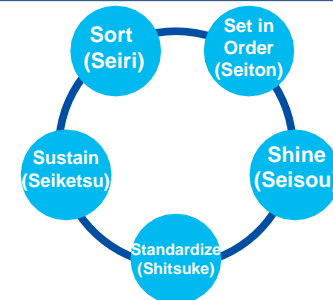
### 2 Set a specific location for each part in the storage area

Reduce receiving and picking times by assigning specific location numbers in the storage area in the warehouse.



### 3 Implement the 5S activities

5S activities are the methods which create a safe, clean and comfortable workplace in order to improve work efficiency.



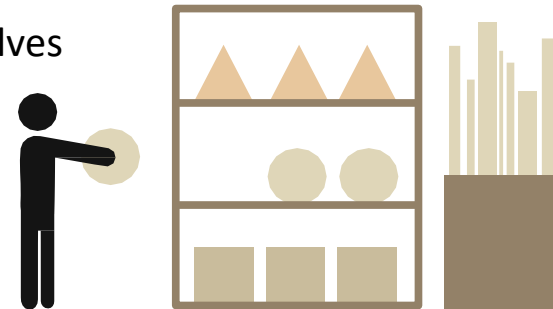
# 9. WAREHOUSE MANAGEMENT

Storage by parts characteristics

## Storage Methods

### Sort parts by shape, size, weight and type when storing

- Store heavy parts on lower shelves and light parts on higher shelves
  - Store small parts on small sized shelves
  - Store long parts together
- ➡
- Organize the warehouse for easy putaway and picking
  - Reduce risk of fall of heavy parts to increase safety



## Examples

### Manage the warehouse based on part size and type



# 9. WAREHOUSE MANAGEMENT

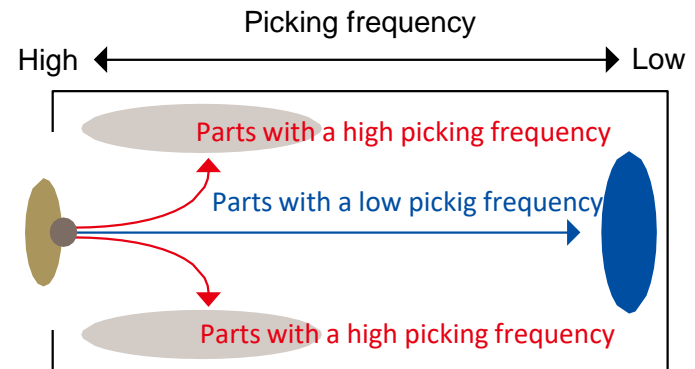
## Storage control by frequency

## Storage Methods

### Set storage areas according to picking frequency of parts

- Store high frequency parts close to the warehouse entrance and store low frequency parts in the back of the warehouse.

This reduces time to look for parts



## Examples

### Store parts based on part picking frequency



Parts with a low picking frequency

Parts with a high picking frequency



Parts with a low picking frequency

Parts with a high picking frequency

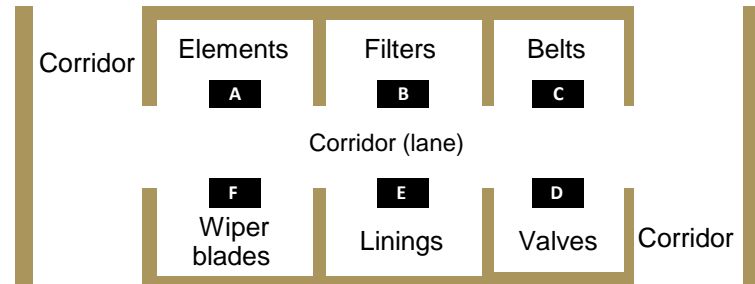
# 9. WAREHOUSE MANAGEMENT

## Location Management

## Storage Methods

### Set a specific location for a specific part in the warehouse

- Determine the storage areas for each part
- Set clear location tags on shelves and make them visible from corridor / lane
- Set one location for one part



Reduce putaway lead time and prevent putaway error

## Examples



Location display



Construct and manage the optimal locations

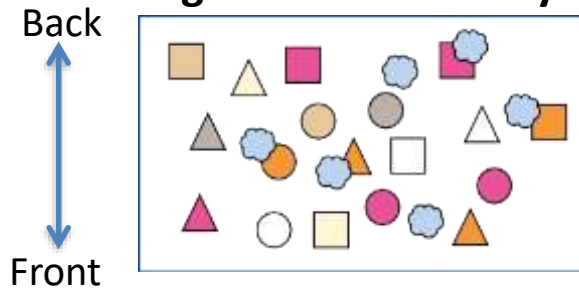


# 9. WAREHOUSE MANAGEMENT

## 5S Activities

5S activities are the method for a safe, accurate and quick putaway and picking parts.

### Disorganized and untidy state



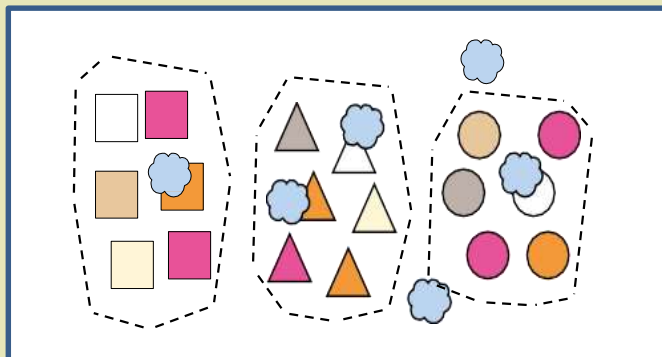
- Necessary items are mixed up with unnecessary items
- New items are mixed up with old items
- Parts cannot be picked out immediately
- The warehouse is scattered with garbage and dust

### Storage period



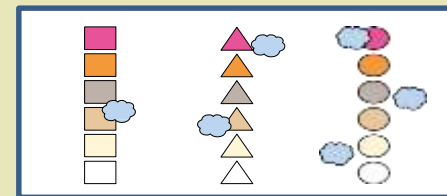
### 1. Sort (Seiri)

- Separate necessary and unnecessary items



### 2. Set in order (Seiton)

- Arrange parts with long storage periods in front
- Enable the immediate and accurate putaway of parts



**Why are parts with longer storage periods place in front?**

Longer storage periods lead to deterioration of parts quality, so placing these parts in front makes it easier to pick them (rule of first in, first out (FIFO)).

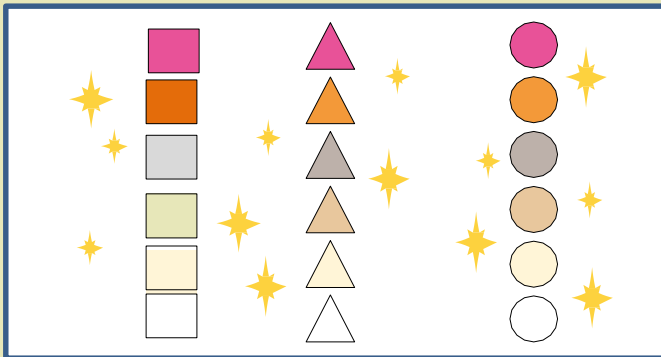


# 9. WAREHOUSE MANAGEMENT

## 5S Activities

### 3. Shine (Seisou)

- Clean the warehouse completely
- Maintain machines and equipment so they can be used immediately



### 4. Sustain (Seiketsu)

Systematically carry out and repeat the three steps to keep safe, easy and comfortable working environment at all times.

**Maintain high standards**



### 5. Standardize (Shitsuke)

Training and discipline, to “do without being told”

It is an on-going effort that all employees are continually seeking ways to improve their own performance by eliminating waste (muda, muri, mura)

Regular visits to customers ?

Sales activities

Regular visits to customers 7



Sales activities

Making sure to create order slip on every order, correctly and without delay



Sales order

Making sure to collect payments on time?



Invoicing and  
payment collection

Maintaining an appropriate amount of parts inventory?



Inventory management

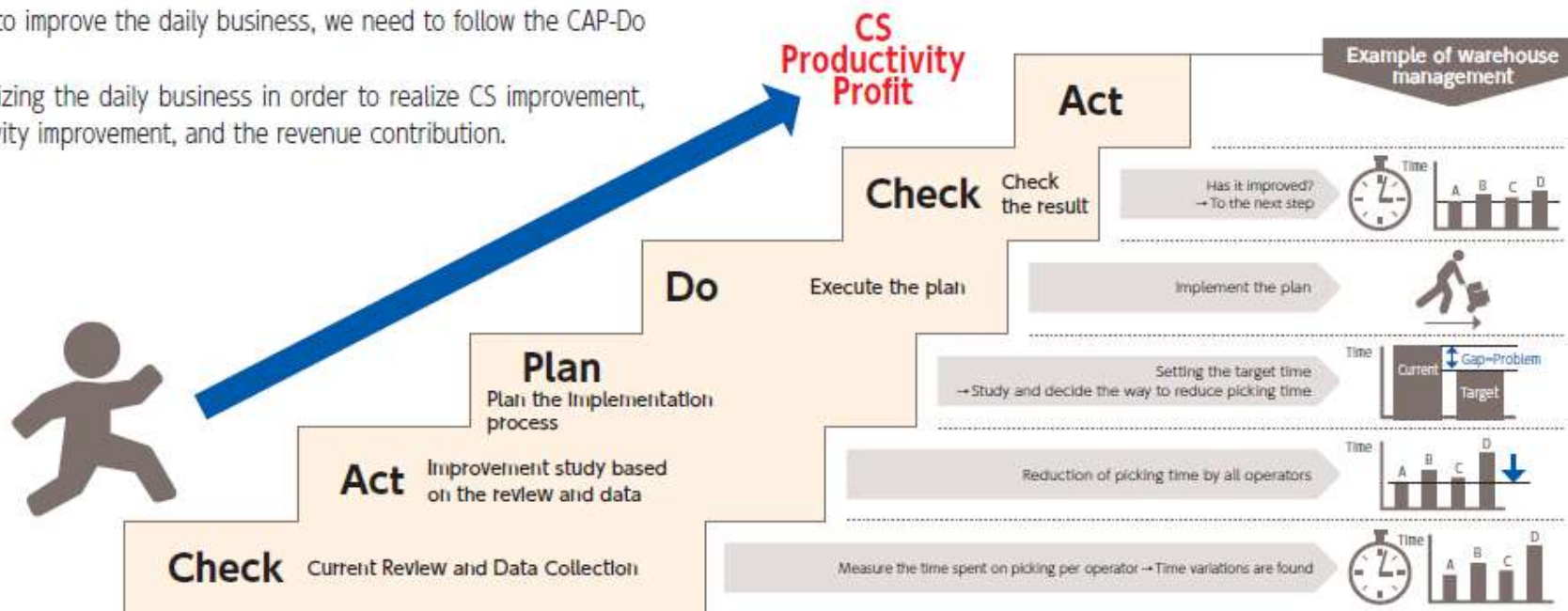
Anyone can safely, accurately, easily and quickly receive, put away, pick and pack parts?



### Warehouse management

In order to improve the daily business, we need to follow the CAP-Do steps.

Standardizing the daily business in order to realize CS improvement, productivity improvement, and the revenue contribution.



All workers make the on-going improvement effort proactively

## II. PARTS BUSINESS FUNCTIONS AND PROCESS FLOW

