



**FUNCTIONAL AND TECHNICAL SPECIFICATION
DOCUMENT
EWARENAVI CHECK-IN STATION WEB
APPLICATION**

**DOCUMENT VERSION 1.1
20/10/2021**

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DOCUMENT HISTORY

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APPROVALS


Name	Title	Signature	Date
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1. Introduction

Functional Specification Document (“FSD”) is to document the customized functional requirements and specified design to tailor suit Hartalega Sdn Bhd (“HSB”) business requirements.

1.1 Purpose of the document

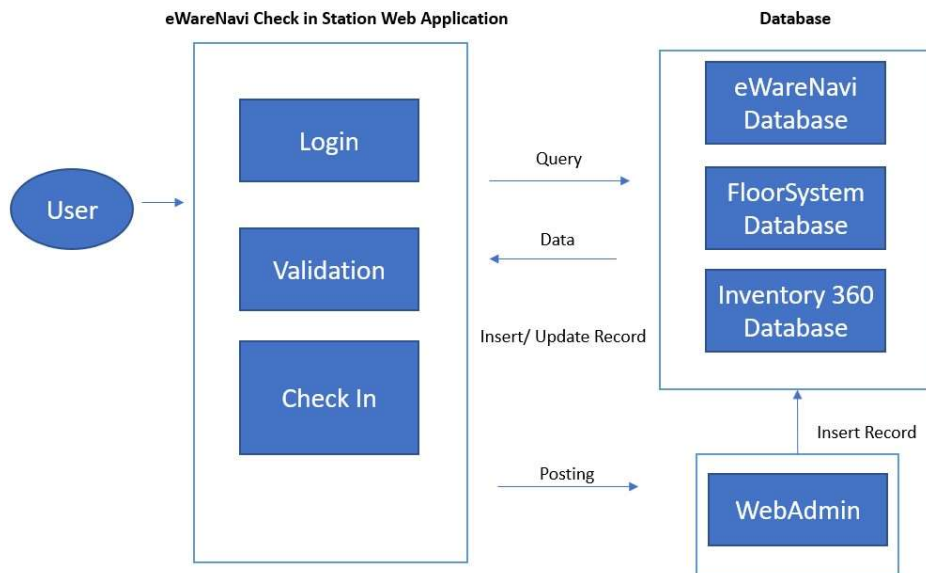
The Functional Specification Document is a document that provides detailed information on *how* the system solution will function and the requested behavior. This document is created based on the high-level requirements identified in the Business Requirements Document and provides traceability on the functional specifications back to the business requirements. Included in this document will be the detailed functional requirements including process flows, diagrams, and mock ups.

1.2 Project Objective

- Create a web application to Check-In for eWareNavi/ Inventory 360 and integration to Microsoft D365 based on Make-To-Order (MTO) or Make-To-Stock (MTS).

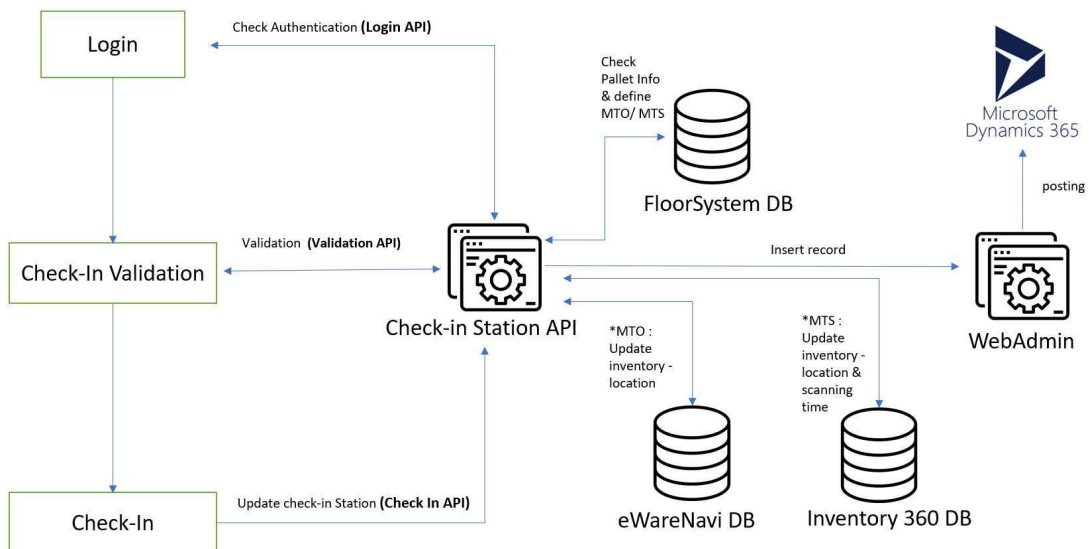
2. System Overview

2.1 Architectural Diagram



2.2 Data Flow Diagram

Proposed Data Flow diagram (“to-be”)



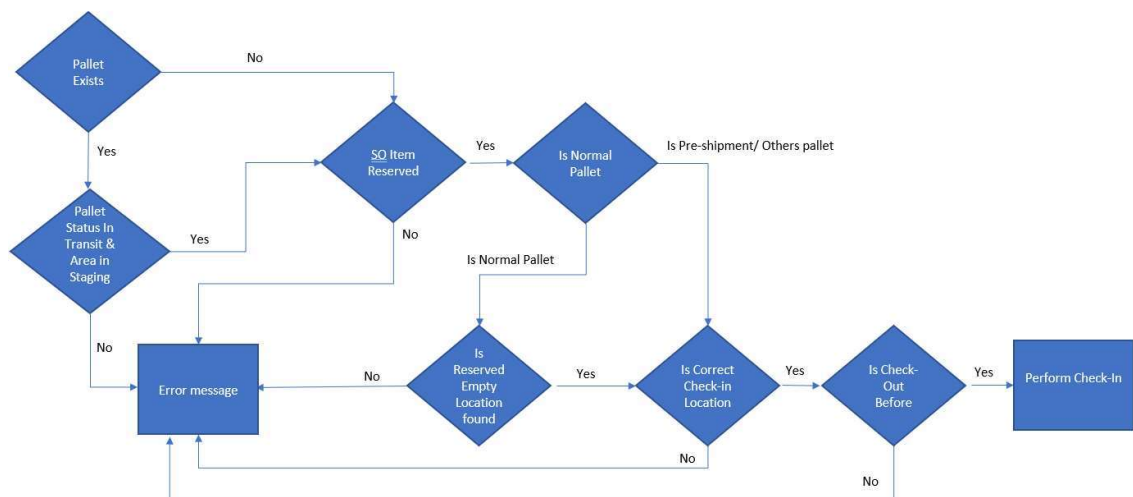
3. Functional Specifications

3.1 Login

1. Using same username and password at eWareNavi to login system.

3.2 Check-in Validation

1. Retrieve Pallet information from Floor System and Inventory 360 Database
2. Based on the pallet information to determine whether is MTO or MTS
 - a. If Pallet ID found within the floor system (EWN_CompletedPallet), the pallet is MTO
 - b. If Pallet ID found within the inventory 360 (tblStockMaster), the pallet is MTS
3. If MTO (eWareNavi Database)



4. If MTS (inventory 360)
 - i) Check-in warehouse validation – validate correct check-in warehouse

3.3 Check-In

1. Posting to WebAdmin
2. If MTO (eWareNavi Database)
 - i) Update eWareNavi inventory - common location
3. If MTS (Inventory 360 Database)
 - i) Update Common location
 - ii) Update Scanning time

4. Technical Specifications

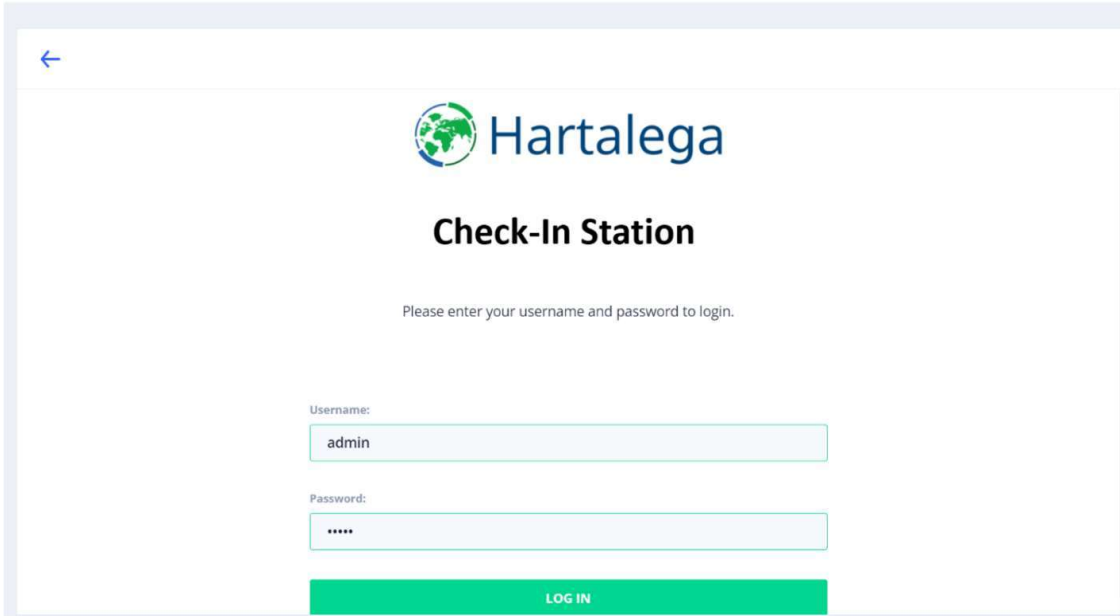
Module	Function	Database	Table/ Store Procedure / Query
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1.	Login	Login authentication	eWareNavi	COM_LOGINUSER
2.	Check-in Validation	Retrieve Pallet information	FloorSystem	usp_EWN_GetPalletData
			Inventory360	tblStockMaster
			MTO	
		Pallet existing validation	eWareNavi	select * from dnstock where pallet_no = :palletNo
		Pallet status validation	eWareNavi	select * from dnstock where warehouse_code = :warehouseCode and area_no = :areaNo and pallet_no = :palletNo"
		SO item reserved validation	eWareNavi	select * from dnworkinfo where job_type = '02' and receive_ticket_no = :soNo and item_code = :itemCode and warehouse_code <> :warehouseCode order by last_update_date desc
		Pallet Type Validation	FloorSystem	usp_EWN_GetPalletData
		Check-In Location (Warehouse) reserved validation	eWareNavi	select * from dnworkinfo where warehouse_code <> :warehouseCode and job_type = '02' and receive_ticket_no = :soNo and item_code = :itemCode and status_flag = '0' order by receive_line_no
		Check-In Location (Warehouse) validation	eWareNavi	select * from dnworkinfo where job_type = '02' and receive_ticket_no = "" + inSO + "" and item_code = "" + inItemCode + "" order by last_update_date desc
		Check-out validation	eWareNavi	select * from dnstock where pallet_no = :palletNo and area_no in ('STAG')
			MTS	
		Check-In Warehouse validation	Inventory360	sp_GetPalletDetails_ByPalletID_PalletComplete
3.	Check-In	MTO		
		Update eWareNavi inventory	eWareNavi	update dnstock set warehouse_code = :warehouseCode, area_no = :areaNo where pallet_no = :palletNo
		Posting to WebAdmin	TBC	TBC
		MTS		
		Update Common location	Inventory360	sp_tblStockTransaction_Insert_Carton; sp_tblBinLocation_Update_Status; sp_tblBinLocationDetails_Insert; sp_tblStockMaster_Update_NowLocationStatus; sp_GetPalletDetails_ByPalletID_PalletComplete; sp_tblStockCartonDetails_UpdateStatus; UPDATE tblStockDetails SET Status=@sts WHERE StockID=@sid AND Del=@del

		Update Scanning time	Inventory360	tblStockMaster
		Posting to WebAdmin	TBC	TBC

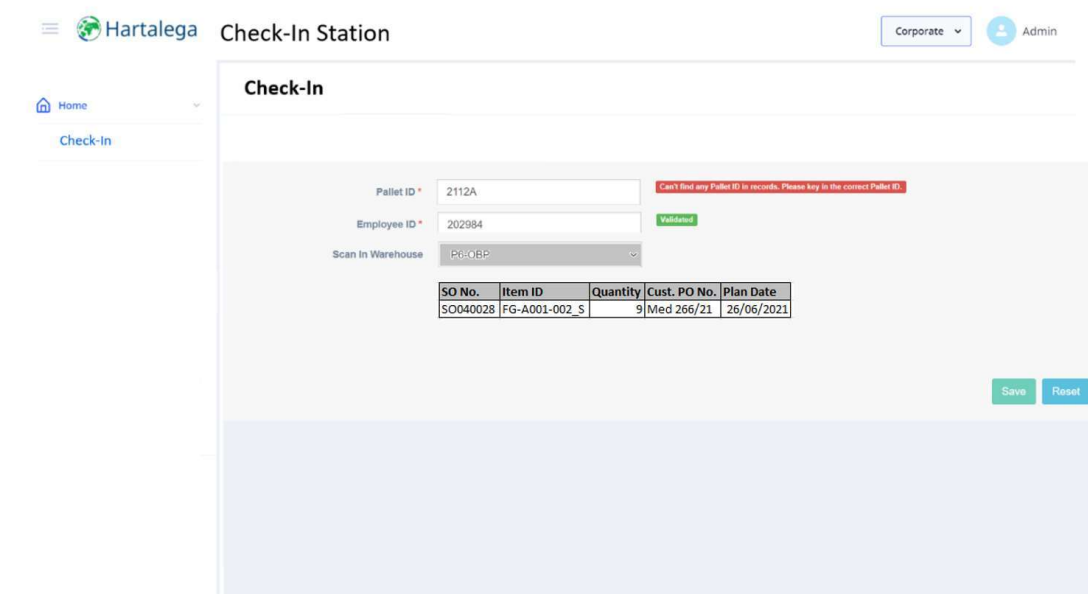
5. User Interface Design

5.1 Login Screen



The login screen features the Hartalega logo at the top center, followed by the title "Check-In Station". Below the title is a prompt: "Please enter your username and password to login." The form includes two input fields: "Username:" with the value "admin" and "Password:" with masked characters "*****". A green "LOG IN" button is positioned at the bottom center.

5.2 Check-In Screen



The check-in screen displays the Hartalega logo and "Check-In Station" title. It includes a "Corporate" dropdown menu and a user profile icon labeled "Admin". The left sidebar shows "Home" and "Check-In" options. The main form area is titled "Check-In" and contains the following fields:

- Pallet ID * (2112A) with a red error message: "Can't find any Pallet ID in records. Please key in the correct Pallet ID."
- Employee ID * (202984) with a green "Validated" status.
- Scan In Warehouse (P6:OBP) with a dropdown arrow.

Below these fields is a table with the following data:

SO No.	Item ID	Quantity	Cust. PO No.	Plan Date
SO040028	FG-A001-002_S	9	Med 266/21	26/06/2021

At the bottom right of the form are "Save" and "Reset" buttons.

** If Pallet ID is MTO, Scan In Warehouse drop-down listing will become read-only and default choose the Warehouse attached with login PC-Name/ IP address

5.3 Exception Message

No	Pallet Type	Scenario	Exception Message
1.	MTO/ MTS	Invalid Pallet No	Can't find any Pallet ID in records. Please key in the correct Pallet ID.
2.	MTO	Pallet ID found but not Status not Transit and Area in Staging	Duplicate pallet no. found in inventory.
3.	MTO	SO Item not reserved	Can't find any SO item reserved in records.
4.	MTO	Is Normal Pallet but not found any reserved empty location	SO: ["PONumber"] exceeded reserved storage plan. Please add pallet on your reservation plan/modify
5.	MTO/ MTS	Incorrect check-in location	Wrong destination. This production output pallet should be sent to ["reservedWarehouse"].
6.	MTO	Not found check-out records	This pallet has not performed Production Checkout yet.