Graduation Project

1. Project Information:

• Project Title: NXT100_Odoo solutions_G4
• Course/Track: Odoo Application Consultant
• Team Members: - Mohamed Adel Abdulrahman
                    - Ahmed Mohamed Metwaly
                    - Ahmeed Hussein Ali
                    - Abdullah Ahmed
                    - Mohamed Rageb

2. Project Overview:

 • Objective: To implement the Odoo ERP system to streamline and manage the entire automotive manufacturing and sales process. This includes configuring Odoo modules for production, inventory management, sales, and customer relationship management to improve operational efficiency and data accur.

• Scope of Work:
-Install and configure Odoo ERP system for automotive manufacturing and sales.
- Customize existing Odoo modules to fit the needs of automotive production and sales.
- Migrate data from any existing systems into Odoo.
- Train users on how to effectively use the Odoo system.
- Develop comprehensive documentation for the implemented system..

• Expected Outcomes:
- A fully functional Odoo ERP system customized for automotive manufacturing and sales.
- Improved efficiency and accuracy in managing production, inventory, and sales.
- Enhanced reporting and analytics capabilities.
- Successful training of users and provision of documentation for ongoing system us.

3. Problem Statement:

Current processes for managing automotive manufacturing and sales are fragmented or manually handled, leading to inefficiencies and errors. Implementing a unified ERP system like Odoo is necessary to integrate and optimize these processes, improving overall operational efficiency.

4. Proposed Solution:

• Technologies Used: - Odoo ERP System Community

                    - Configuration tools and techniques within Odoo

                      - Data migration tools.

• System Architecture:
- Frontend: Web-based user interface provided by Odoo for interacting with the system.
- Backend: Odoo server handling business logic, process automation, and data management.
- Database: PostgreSQL database integrated with Odoo for storing all operational data.
- Integration: Use of Odoo's pre-built modules and configurations to support manufacturing, inventory, sales, and customer management functions.

5. Resources Needed

• Hardware/Software: - Odoo ERP system Community
                        - Odoo cloud

Accounting Dashboard Customers Vendors Accounting Reporting Configuration

New | Follow-up Levels
New ⚙ ☁ ↺

Description

10 days

Remind 10   days after due date ?

| Notification | Activity |

Schedule Activity ☑

Responsible ?   Follow-up Responsible

Activity Notes

Activity Type   Email

Summary   Notification

Accounting Dashboard Customers Vendors Accounting Reporting Configuration

New | Reconciliation Models
New ⚙ ☁ ↺   📖 Journal Entries 0

Name

Coffee and food

Type   ○ Button to generate counterpart entry   **Auto-validate** ? ☑   ⟳ Run manually
      ● Rule to suggest counterpart entry
      ○ Rule to match invoices/bills

| Bank Transactions Conditions | Partner Mapping |

Journals Availability ?   **Label** ?   Contains   coffee

Amount Type ?   Paid/Received   **Note** ?

Amount Condition ?   **Transaction Type** ?

      Partner is Set ?   ☐

COUNTERPART ENTRIES

	Account	Amount Type	Amount	Analytic Distribution	Journal Item Label	⇄
⠿	400047 Kitchen and Buffet Expenses	Percentage of balance	100			🗑

https://edu-tu-odoo1.odoo.com/web?reload=true#

Fiscal Position   Non-Egypt

Detect Automatically ? ✔
VAT required ? ☐
Foreign Tax ID ?
Country Group ?
Country ?

Tax Mapping	Account Mapping	

Tax on Product	Tax to Apply	
14% (Sales)	0% (Sales)	🗑
14% (Purchases)	0% (Purchases)	🗑
Add a line		

Legal Notes...

https://edu-tu-odoo1.odoo.com/web?reload=true#

Projects

Parent

Default Applicability   Optional

Color   🟦

Applicability			
Domain	Financial Accounts Prefix	Product Category	Applicability
Add a line			

New   Customer Payments
Draft Payment ⚙ ☁ ↺

≡ Journal Entry

Confirm   Draft   Posted

Draft

Internal Transfer	☐		Journal	Bank
Payment Type	○ Send ● Receive		Payment Method ?	Manual
Customer	CarMax		Company Bank Account	
Amount	LE15,000.00	EGP		
Date	10/12/2024			
Memo				

Send message   Log note   Activities   🔍 📎 🔒⁰   Follow

Today

Create Deferred Revenue

Code

10112

Account Name

deffered revenue

| Accounting |

Type ?	Current Liabilities ▾	Account Currency ?	
Default Taxes		Allow Reconciliation ?	☐
Tags ?		Deprecated	☐
Allowed Journals ?		Group ?	

Asset Model name

Phones

DEPRECIATION METHOD

Method ?	Straight Line	
Duration ?	5	Years
Computation	Constant Periods	

ACCOUNTING

Depreciation Account ?	حساب مجمع الاهلاك
Expense Account ?	مصروف الاهلاك
Journal	Tax Adjustments

Send message   Log note   Activities

🔍 📎 👤⁰   Follo

Payment Terms

15 Days

Early Discount ✔	2.00 % if paid within	5 days
	Reduced tax: Never ▾	

DUE TERMS

	Due	After	
100.000000	Percent	15 Days after invoice date	🗑
Add a line			

PREVIEW

Example: 1,000.00 LE on 10/12/2024

Payment terms: 15 Days

Early Payment Discount: **980.00 LE** if paid before **10/17/2024**

1# Installment of **1,000.00 LE** due on **10/27/2024**

✔ Show installment dates

Inventory Overview Operations Products Reporting Configuration

Save Discard Settings Unsaved changes   Search...

- General Settings
- Sales
- Calendar
- Purchase
- Inventory
- Manufacturing
- Maintenance
- Accounting
- Project
- Sign
- Planning
- Employees

Operations

☑ **Packages** ?
Put your products in packs (e.g. parcels, boxes) and track them

☑ **Warnings**
Get informative or blocking warnings on partners

☑ **Quality** ?
Add quality checks to your transfer operations

☐ **Quality Worksheet**
Create customizable worksheets for your quality checks

☐ **Reception Report**
View and allocate received quantities.

☑ **Batch Transfers** ?
Process transfers in batch per worker

☑ **Wave Transfers**
Process operations in wave transfers

Picking Policy
When to start shipping

Ship products as soon as available, with back orders ▾

Annual Inventory Day and Month
Day and month that annual inventory counts should occur.

31 December   ▾

Inventory Overview Operations Products Reporting Configuration

New Products
Hyundai elentra ⚙ ☁ ↺

Extra Prices 0 | Documents 0 | Variants 2 | On Hand 0.00 Units | More ▾   2 / 3 ‹ ›

☆ **Hyundai elentra**

☑ Can be Sold ☑ Can be Purchased

| General Information | Attributes & Variants | Sales | Purchase | Inventory | Accounting |

OPERATIONS

Routes ? ☐ Dropship Subcontractor on Order
☑ Buy
☐ Manufacture
☐ Resupply Subcontractor on Order
☐ Dropship
→ View Diagram

TRACEABILITY

Tracking ? ⦿ By Unique Serial Number
○ By Lots
○ No Tracking

LOGISTICS

Responsible ?   A Mohamed Adel

Customer Lead Time ?   3   days

HS Code ?

Origin of Goods ?

General Settings

Sales

31 Calendar

Purchase

Inventory

Manufacturing

Maintenance

Accounting

Project

Sign

Planning

Employees

Point of Sale

→ Storage Categories

Advanced Scheduling

☑ **Security Lead Time for Sales** ❓
Schedule deliveries earlier to avoid delays

Move forward expected delivery dates by
2.00   days

Days to Purchase
Days needed to confirm a PO

2.00   days

☐ **Security Lead Time for Purchase** ❓
Schedule request for quotations earlier to avoid delays

Logistics

☑ **Dropshipping** ❓
Request your vendors to deliver to your customers

Location Name
Inventory adjustment

Parent Location ?
Virtual Locations

ADDITIONAL INFORMATION

Location Type ?   Inventory Loss

Is a Scrap Location? ?   ☐

Is a Return Location? ? ☐

LOGISTICS

External note...

ACCOUNTING INFORMATION

Stock Valuation   999011 Inventory Adjustment Loss
Account (Incoming) ?

Stock Valuation   500024 Inventory Adjustment Gain
Account (Outgoing) ?

New   **Warehouses**
edu- tu odoo ⚙ ☁ ↺   ⟳ Routes   🔖 1 / 1 ⟨ ⟩

Warehouse
Main Warehouse (cairo

Short Name? WH-Ca   Address   edu- tu odoo

| Warehouse Configuration |

SHIPMENTS   **RESUPPLY**

Incoming Shipments? ○ Receive goods directly (1 step)   Buy to Resupply? ☑

○ Receive goods in input and then stock (2 steps)   Dropship   ☑
                                                    Subcontractors?
● Receive goods in input, then quality and then stock (3 steps)
                                                    Resupply   ☑
Outgoing Shipments? ○ Deliver goods directly (1 step)   Subcontractors

○ Send goods in output and then deliver (2 steps)   Manufacture to   ☑
                                                    Resupply?
● Pack goods, send goods in output and then deliver (3 steps)
                                                    Manufacture? ○ Manufacture (1 step)

                                                    ○ Pick components and then manufacture (2 steps)

New   **Product Packagings**
Battery Packaging ⚙   🔖 1 / 1 ⟨ ⟩

Packaging
Battery Packaging

Product   Battery   Package Type
Purchase? ☑   Contained quantity? 5.00   Units
Sales? ☐   Barcode?
Routes?

New   Reordering Rules ⚙   🔍 Trigger Auto ✕ Search...   ▼   1-4 / 4 ‹ ›   ≡ ▮

	Product	Location	On Hand	Forecast		Route		Min Qua...	Max Qua...	To Order	UoM
☐	Hyundai Tuscan...	WH-Ca/Stock	0.00	2.00 📈		Buy	ⓘ	2.00	0.00	0.00	Units
☐	Hyundai elentra...	WH-Ca/Stock	0.00	2.00 📈		Buy	ⓘ	2.00	0.00	0.00	Units
☐	Kia Cerato (Red)	WH-Ca/Stock	0.00	2.00 📈		Manufacture	ⓘ	2.00	0.00	0.00	Units
☐	Kia sportage (W...	WH-Ca/Stock	0.00	2.00 📈		Manufacture	ⓘ	2.00	0.00	0.00	Units

New   **Shipping Methods**
Standard delivery ⚙ ☁ ↺   🔖   1 / 1 ‹ ›

Shipping Method

Inside Cairo and giza

Provider   Fixed Price   **Fixed Price**   LE600.00

     Install more Providers   **Free if order amount is**   ☐
                                                               above ?
Routes

                                              Delivery Product   [Delivery_007] Standard delivery

Destination Availability	Description

Filling this form allows you to filter delivery carriers according to the delivery address of your customer.

Countries   Egypt ✕

States   Cairo (EG) ✕   Giza (EG) ✕

Zip Prefixes ?

Purchase Orders Products Reporting Configuration

Save Discard Settings Unsaved changes

Q Search...

- General Settings
- Sales
- 31 Calendar
- Purchase
- Inventory
- Manufacturing
- Maintenance
- Accounting
- Project
- Sign
- Planning
- Employees
- Point of Sale

Orders

☑ **Purchase Order Approval**
Request managers to approve orders above a minimum amount

Minimum Amount   LE10,000.00

☑ **Warnings**
Get warnings in orders for products or vendors

☑ **Receipt Reminder**
Automatically remind the receipt date to your vendors

☑ **Lock Confirmed Orders**
Automatically lock confirmed orders to prevent editing

☑ **Purchase Agreements** ❓
Manage your purchase agreements (call for tenders, blanket orders)

Invoicing

Bill Control ❓
Quantities billed by vendors

○ Ordered quantities
● Received quantities

☑ **3-way matching** ❓
Make sure you only pay bills for which you received the goods you ordered

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Purchase Orders Products Reporting Configuration

New | Blanket Orders
New ⚙ ☁ ↺

Confirm   Cancel

Draft ⟩ Ongoing ⟩ Closed

Reference
New

Purchase Representative	Mohamed Adel	
Agreement Type	Blanket Order	
Vendor	Hyundai	
Currency	EGP	

Agreement Deadline   12/31/2024 19:00:00
Ordering Date
Delivery Date ?
Source Document   e.g. PO0025
Operation Type   Main Warehouse (cairo: Receipts

Products

Product	Custom Description	Quantity	Ordered Quantities	UoM	Unit Pr ⇄
Hyundai Tuscan (White)		100.00	0.00	Units	420,000.00

Add a line

🏷 Coupons
10

🔖   1 / 1   ‹ ›

Generate Coupons

Program Name
2% discount Coupon

Program Type	Coupons
	Generate & share coupon codes manually. It can be used in eCommerce, Point of Sale or regular orders to claim the Reward. You can define constraints on its usage through conditional rule.
Currency	EGP
Pricelist	

Start Date ?	10/10/2024
End date ?	10/31/2024
Limit Usage	☑ to 10 usages
Available On	☑ Point of Sale ☑ Sales
Point of Sale ?	All PoS

Rules & Rewards

Conditional rules   Add

If minimum 1 item(s) bought
If minimum 1,000,000.00 LE spent (tax excluded)

Among:
⚙All

Rewards   Add

10.00% discount on your order

2.00% discount (Max 10,000.00 LE) on your order

Location Name
Gifts & Donations

Parent Location ?
Virtual Locations

ADDITIONAL INFORMATION

Location Type ?	Inventory Loss
Is a Scrap Location? ?	☐
Is a Return Location? ?	☐

LOGISTICS

External note...

ACCOUNTING INFORMATION

Stock Valuation Account (Incoming) ?	400046 Gifts & Donations
Stock Valuation Account (Outgoing) ?	

New   Pricelists
      False (EGP) ⚙ ☁ ↺

Open: Pricelist Rules   ✕

Super Extra

Currency   EGP

Price Rules   Configuration

Applicable On

All Products

Add a line

PRICE COMPUTATION

Computation	○ Fixed Price	The computed price is expressed in the default Unit of Measure of the product.
	○ Discount	
	● Formula	

Based on ?	Other Pricelist	Other Pricelist with a 0.0 % discount and -60,000.00 LE extra fee
Other Pricelist	Default EGP pricelist (EGP)	Example: 100.00 LE * 1.0 + -60,000.00 LE → -59,900.00 LE
Discount ?	0.00 %	
Extra Fee ?	-60,000.00	
Rounding Method ?	0.00	
Margins ?	5,000.00 → 10,000,000.00	

CONDITIONS

| Apply On ? | ● All Products | Min. Quantity ? | 2.00 |
| | ○ Product Category | | |

Save & Close   **Save & New**   Discard

Send message   Log note   Activiti   🔍 ✎ 👤⁰   Follow

A   **Mohamed Adel** - 1 minute ago
    Creating a new record...

Save   Discard   Settings   Unsaved changes   🔍 Search...

	General Settings
	Sales
31	Calendar
	Purchase
	Inventory
	Manufacturing
	Maintenance
	Accounting
	Project
	Sign
	Planning
	Employees
	Point of Sale

☑ **Variants** ❓
   Sell variants of a product using attributes (size, color, etc.)

   → **Attributes**

☑ **Units of Measure**
   Sell and purchase products in different units of measure

   → **Units of Measure**

☑ **Product Packagings**
   Sell products by multiple of unit # per package

☑ **Variant Grid Entry**
   Add several variants to an order from a grid

☑ **Deliver Content by Email**
   Send a product-specific email once the invoice is validated

Pricing

☑ **Discounts**
   Grant discounts on sales order lines

☑ **Pricelists** ❓
   Set multiple prices per product, automated discounts, etc.

   ○ Multiple prices per product
   ● Advanced price rules
     (discounts, formulas)

   → **Pricelists**

☑ **Margins**
   Show margins on orders

☑ **Discounts, Loyalty & Gift Card**
   Manage Promotions, coupons, loyalty cards, Gift cards & eWallet

Customer Account
   Let your customers log in to see their documents

   ○ On invitation
   ● Free sign up

Manufacturing   Operations   Products   Reporting   Configuration

| Save | Discard | Settings |

Q Search...

General Settings
Sales
Calendar
Purchase
Inventory
Manufacturing
Maintenance
Accounting
Project
Sign
Planning
Employees
Point of Sale

Operations

☑ **Work Orders** ❓
Process operations at specific work centers

🖶 Print barcode commands
→ Work Centers
☐ **Work Order Dependencies**
Set the order that work orders should be processed in.
Activate the feature within each BoM's Miscellaneous tab

☑ **Shop Floor**
Manage your manufacturing orders from the shop floor app

☐ **Barcode Scanner**
Process manufacturing orders from the barcode application

☐ **Unlock Manufacturing Orders**
Allow manufacturing users to modify quantities to consume,
without the need for prior approval

☐ **Allocation Report for Manufacturing Orders**
View and allocate manufactured quantities

☑ **Subcontracting** ❓
Subcontract the production of some products

☐ **Timer**
Show the timer on the work order screen

☑ **Quality**
Add quality checks to your work orders
☐ **Quality Worksheet**
Create customizable worksheets for your quality checks

☐ **By-Products**
Produce residual products (A + B -> C + D)

Planning

☑ **Master Production Schedule** ❓
Plan manufacturing or purchase orders based on forecasts

☑ **Security Lead Time** ❓
Schedule manufacturing orders earlier to avoid delays
2.00   days

Manufacturing   Overview   Operations   Planning   Products   Reporting   Configuration

| Replenish | Add a Product | Master Production Schedule |

Q Search...

1-2 / 2   < >

		Oct 11	Oct 12	Oct 13	Oct 14	Oct 15
☐ Hyundai elentra (blue) by Units - Main Warehouse (cairo 🏔		0.00	-1.00	1.00	3.00	3.00
- Actual / Forecasted Demand		0.00 / 3.00	0.00 / 0.00	0.00 / 0.00	0.00 / 0.00	0.00 / 0.00
+ Suggested Replenishment Replenish	1 ≤...≤ 2	2.00	2.00	2.00	0.00	0.00
= Forecasted Stock	◉ 3	-1.00	1.00	3.00	3.00	3.00

New **Work Centers**
New ⚙ ☁ ↺

◔ OEE	📊 Lost	📊 Load	📊 Performance	🔧 Maintenance
0.00%	0.00 Hours	0.00 Minutes	0%	0

Work Center Name	Hall 1	Code	
Tag		Working Hours	Standard 40 hours/week

Alternative
Workcenters ?

| General Information | Specific Capacities | Equipment | Maintenance |

PRODUCTION INFORMATION

			COSTING INFORMATION		
Time Efficiency ?	95.00	%	Cost per hour ?	126.00	per workcenter
Capacity ?	1.00			50.00	per employee
OEE Target ?	90.00	%	Analytic Distribution		

OPERATIONS

Setup Time	05:00	minutes
Cleanup Time	5	minutes

Allowed Employees ?

DESCRIPTION

New **Manufacturing Orders**
WH-Ca/MO/00003 ⚙

🚚 Transfers 2	↑ Traceability	⇄ Product Moves	≡ Overview

🔖 1/1 <

Scrap Unlock Maintenance Request Unbuild Print Labels

Draft Confirmed **Done**

MO Reference
☆ WH-Ca/MO/00003

Product	Kia sportage (White)			Start Date ?	10/11/2024 20:31:14
Quantity	1.00 / 1.00	Units	To Produce 📊	End ?	10/11/2024 20:34:37
Bill of Material ?	Kia sportage			Responsible	🅰 Mohamed Adel
Lot/Serial Number	0000001				

| Components | Work Orders | Miscellaneous |

Product	From	To Consume	Quantity	UoM	Consumed	⇄
tires	WH-Ca/Pre-Production	4.00	4.00	Units	☑	≡
motor	WH-Ca/Pre-Production	1.00	1.00	Units	☑	≡
Brake discs	WH-Ca/Pre-Production	1.00	1.00	Units	☑	≡
Chassis	WH-Ca/Pre-Production	1.00	1.00	Units	☑	≡
Alternator	WH-Ca/Pre-Production	1.00	1.00	Units	☑	≡

Maintenance Dashboard Maintenance Equipment Reporting Configuration

New | Maintenance Requests
New ⚙

Cancel | New Request | In Progress | Repaired | Scrap

Request
hall 2

Created By	A Mohamed Adel	Team	Internal Maintenance
For	Work Center	Responsible	Mohamed Adel
Work Center	hall 2	Scheduled Date ?	10/14/2024 00:00:00
Request Date ?	10/11/2024	Duration ?	02:00 hours
Maintenance Type	○ Corrective	Recurrent	☐
	● Preventive	Block Workcenter ?	☑
Manufacturing Order		Priority	⭐ ⭐ ⭐

Notes | Instructions

Quality Overview Quality Control Products Reporting Configuration

New | Quality Control Points
QCP00001 ⚙

✔ Quality Checks
0

1 / 1 ＜ ＞

QCP00001

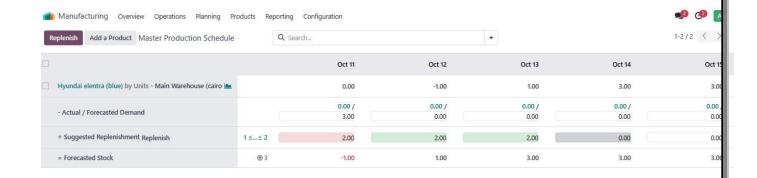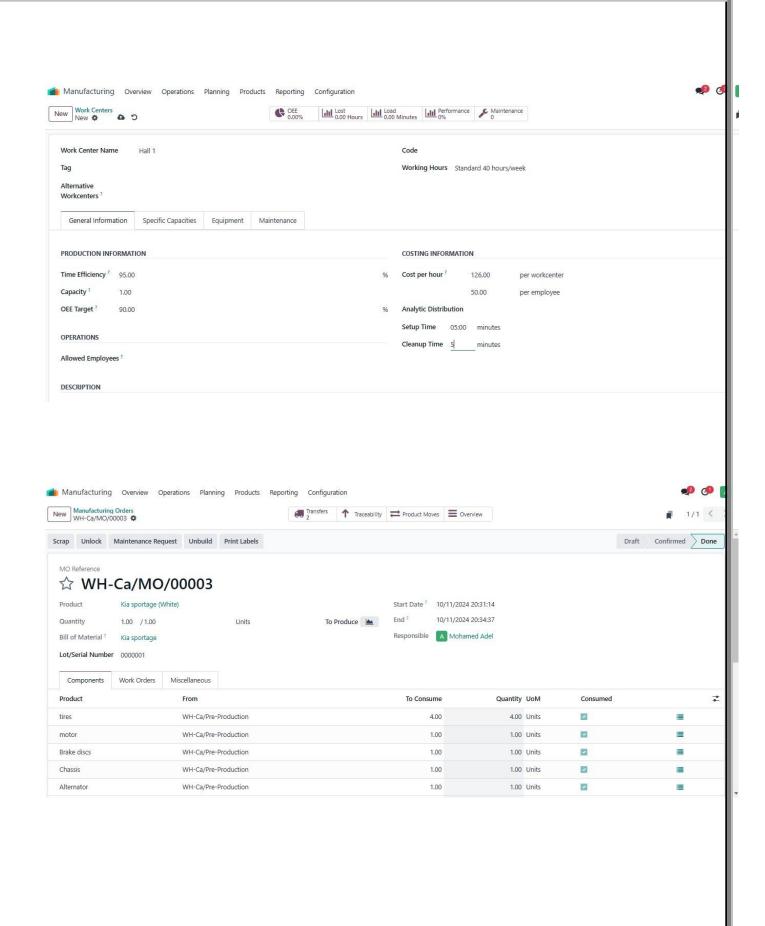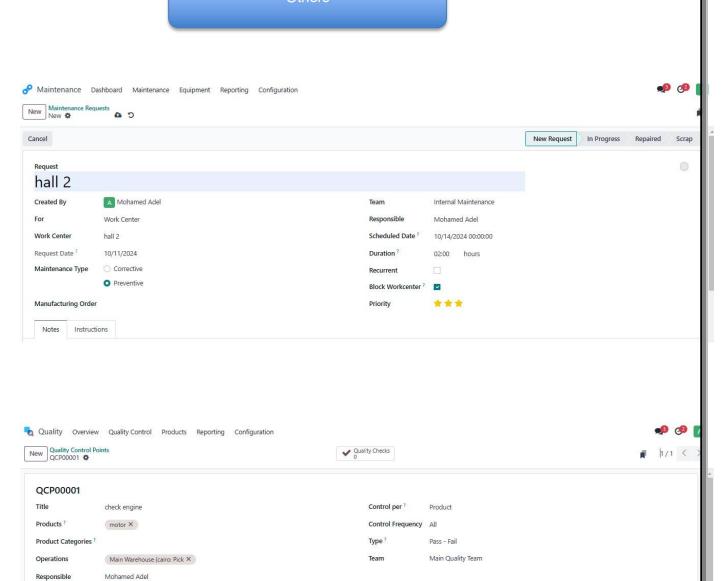|			
Title	check engine	Control per ?	Product
Products ?	motor ✕	Control Frequency	All
Product Categories ?		Type ?	Pass - Fail
Operations	Main Warehouse (cairo: Pick ✕	Team	Main Quality Team
Responsible	Mohamed Adel		

Instructions | Message If Failure | Notes

Describe the quality check to do...

odoo — Mohamed Adel — Customer Screen

Hyundai elentra (blue)
1.00 Units x 712,500.00 LE / Units
SN 0006
712,500.00 LE

SUV   Sedan   Search products...

GIFT

Hyundai elentra (blue) | Hyundai elentra (White) | Hyundai Tuscan (gray) | Hyundai Tuscan (Red) | Hyundai Tuscan (White) | Top-up eWallet

1,368,000.00 LE | 1,368,000.00 LE | 50.00 LE

| Cash In | Cash Out | 300 | LE ✕ |

Reason
Coffee and breakfast

Confirm 300.00 LE   Discard

Total: **712,500.00 LE**
Taxes: 87,500.00 LE

| ↻ Refund | 🗐 Customer Note | 🏷 Discount |
| IIII Enter Code | ★ Reset Programs | ★ Reward |

% Quotation/Order

👤 Customer	1	2	3	Qty
	4	5	6	% Disc
❯ Payment	7	8	9	Price
	+/-	0	.	⌫

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https://edu-tu-odoo1.odoo.com/pos/ui?config_id=1#cids=1   Sign in

Print
Total: 2 sheets of paper

Printer
Microsoft XPS Document Writer ∨

Copies
1

Layout
● Portrait
○ Landscape

Pages
● All
○ Odd pages only
○ Even pages only

Print   Cancel

Hyundai Tuscan (gray)   1,368,000.00 LE
  1.00 Units x 1,368,000.00 LE / Units
  SN 001

Hyundai elentra (White)   712,500.00 LE
  1.00 Units x 712,500.00 LE / Units
  SN 0005

10% on your order   -208,050.00 LE
  1.00 Units x -208,050.00 LE / Units

Tips   775.20 LE
  1.00 Units x 775.20 LE / Units

TOTAL
1,873,225.20 LE

Cash   1,873,225.20

CHANGE   0.00 LE
Tax   Amount   Base   Total
14%   230,045.20   1,643,180.00   1,873,225.20

Customer   معرض عالم اللورد للسيارات

« Bac

Payme

Summ

Cash

Validate   +/-   0   .   ⌫