

Coursework Report – 5COSC019C Object Oriented Programming

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Have you submitted the video with the demonstration of your system?

☒ Yes

☐ No

If the video has been submitted specify where:

☐ Blackboard

☒ On the cloud (file shared from Google drive, or OneDrive or DropBox, etc), or YouTube. **Copy here the link:**

<https://drive.google.com/file/d/17WG25sCVFZmFLWZbJg3ltLI0w5JYCPzX/view?usp=sharing>

Phase 1 – Design and class implementation

Task	Did you attempt the task?	Student's comments (To which extent you implemented the task? Have you encountered any problems or issue?)
Design a UML Use Case Diagram of your system (submitted in a separate file).	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	A proper use case diagram was created to cover each scenario.
Design a UML Class Diagram of your system (submitted in a separate file).	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	A proper class diagram was created to cover each scenario.
Implementation Class Product	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	A proper product class created to fulfill functionality.
Implementation Class Electronics	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	A proper electronic class created to fulfill functionality.
Implementation Class Clothing	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	A proper electronic class created to fulfill functionality.
Implementation Class User	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	The User class is created with only user credentials and getter methods. No other functionality based on user class is implemented.
Implementation Class Shopping Cart	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	A proper shopping cart class created to update shopping cart JFrame .
Implementation Interface WestminsterShoppingManager	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	A proper class and interface created manage and work on each functionality.

Phase 2 – Console menu implementation

Task	Did you attempt the task?	Student's comments (To which extent you implemented the task? Have you encountered any problems or issue?)
Add a product in the system with all the relative information (max 50 doctors)	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
Delete a product from the system by selecting the product ID. Display a message to confirm it has been removed and the total number of products in the system.	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
Print on the screen the list of the products in the system with all the relative information. The list should be ordered alphabetically.	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
Save in a file entered by the user so far. The user should be able to load back the information running a new instance of the application.	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.

Phase 3 – GUI Implementation

Task	Did you attempt the task?	Student's comments (To which extent you implemented the task? Have you encountered any problems or issue?)
The user can select the category through the drop down menu	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
The GUI is open and a list of products with the information as per specification has been displayed	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
Items with low availability are highlighted in red	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
The user can select a product and all the details are displayed as per specification in the below panel	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
The user can add products to the shopping cart and all the information are displayed in a separate frame	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Functionality is performed properly as per requirement.
The final price is displayed correctly	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	The final price is display correctly without adding the first purchase discount.

The discounts, if applicable, are displayed as per specification and the final price updated accordingly	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	The final price is display correctly without adding the first purchase discount.
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Phase 4 – Testing and system validation

Task	Did you attempt the task?	Student's comments (To which extent you implemented the task? Have you encountered any problems or issue?)
Test plan. (Submitted in a separate file).	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	The test plan is designed to cover every scenario
Implementation of an automated unit test for each scenario in the console menu.	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Implement Junit testing for console menu options successfully.
Error Handling across all the code, input validation and code quality.	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Used proper error handling techniques across all codes, implemented input validation and improved code quality.