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| **Practicum Case** |  |
| ISYS6197  Business Application Development |
| **Computer Science** | **O221-ISYS6197-DU01-03** |
| ***Valid on*** *Odd Semester Year 2021/2022* | **Revision 00** |

## Learning Outcomes

* Explain Object Oriented concept
* Solve the algorithm problem using Object Oriented concept

## Topic

* Session 03 - Inheritance

## Subtopics

* Introduction to Inheritance
* Superclass and Subclass
* Subclass Feature
* Final Class
* Super Keyword
* ArrayList and Vector

## Soal

*Case*

**Just DU It**

You are asked to build an application for a shoe shop called **Just DU It**. You are assigned to make a program with the description below:

* In the beginning, the program will show the title

Background pattern

Description automatically generated with low confidence

* The program will consist of **5 menus**:

1. Add Footwear
2. View Footwear
3. Update Footwear
4. Delete Footwear
5. Exit Program

* The program will ask the user to input choose menu which must be **inputted between 1 and 5.**

Background pattern

Description automatically generated with low confidence

* If the user chooses menu 1, then:
* The program will ask the user to input pet detail, which consists of:
* **Name**, which **length** must be between **3** and **25** characters (**inclusive**)
* **Price**, which must be numeric and **more than 10000**
* **Type**, which must be between **‘Heels’ or ‘RollerSkate’ (Case Sensitive)**
* If **Type is Heels**, user need to input the heels height, which must be numeric and between **1.0 and 9.0 (inclusive)**
* If **Type is RollerSkate**, user need to input the shoe total wheel, which must be numeric and between **2 and 4 (inclusive)**
* After fulfilling all validation, the program will display a message

Text

Description automatically generated with medium confidence

Text

Description automatically generated with medium confidence

* After that, return to the main menu
* If the user chooses menu 2, then:
* If there are **no footwear**, then display empty footwear message



* Otherwise, display list of footwear data

A picture containing table

Description automatically generated

* After that, return to the main menu
* If the user chooses menu 3, then:
* If there are **no footwear**, then show message and return to the main menu

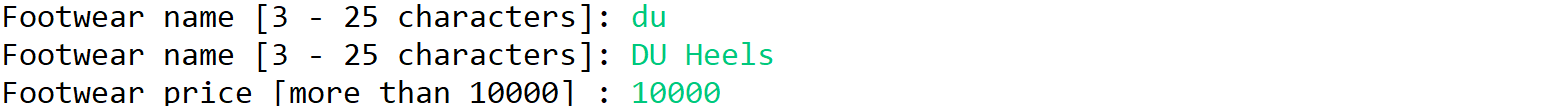


* Otherwise, display list of shoe data
* Validate that choice option must be **numeric** and between **1** and the **current total footwear data**

Table

Description automatically generated

* Ask the user to input its new name, which **length** must be between **3** and **25** characters (**inclusive**)



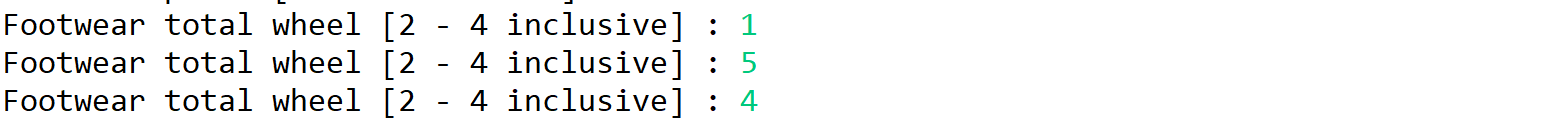
* Ask the user to input its new price, which must be numeric and **more than 10000**



* If the chosen footwear is a heel, ask the user to input its new height, which must be numeric and between **1.0 and 9.0 (inclusive)**



* If the chosen footwear is a roller skate, ask the user to input its new total wheel, which must be numeric and between **2 and 4 (inclusive)**



Finally, display a message indicating the corresponding footwear data has been updated.



* If the user chooses menu 4, then:
* If there are **no footwear**, then show message and return to the main menu



* Otherwise, display list of footwear data
* Validate that choice option must be **numeric** and between **1** and the **current total footwear data.**

Table

Description automatically generated

* Finally, display a message indicating the corresponding pet has been treated and **remove** it from the list.



* If the user chooses menu 5, then:
* Display a message of gratitude.
* Exit the program.

A picture containing graphical user interface

Description automatically generated

**Please ask your teaching assistant if there are any related questions.**