

## Exercise

### **Description:**

It is popular home cafeteria event and a local charity is looking to have a bake sale and second hand outlet to raise funds for the ones in need. They have promised you a public recognition if you make software to help run the sale.

There are five edible items they would like to sell on this sale with specific prices and quantities of each:

Brownie - 65c (48)  
Muffin - 1.00 € (36)  
Cake Pop - 1.35 € (24)  
Apple tart – 1.50 € (60)  
Water - 1.50 € (30)

Also they would like to sell toys and clothes, that people donate for sale. Sales list is limited to following items:

Shirt – 2.00 €  
Pants – 3.00 €  
Jacket – 4.00 €  
Toy – 1.00 €

Quantity of each second hand item in stock is inserted on the day of bake sale.

### **Business rules:**

Items for purchase are selected by clicking on picture of the product. Quantity equals amount of clicks on a product image.

Remember, that there is multiple sales persons, who are using tablets or mobile phones!

Image should be grayed out, if it is out of stock.

Total amount of payment is shown in the bottom of the screen.

Below total amount is options to reset and checkout. Checkout prompts paid cash amount to be inserted.

The application must calculate the smallest amount of change to give a person if they overpay.

Validations and cash returned functionality works as in every store. Be logical 😊

### **Technical stuff:**

Build a neat front-end and backend.

Use REST service and Postgres database.

Configure docker containers for backend application and database.

Configure swagger for API-s.

### **Hint:**

Use Stubs or Mocks or both when solving input and output problems.

### **Bonus:**

Add functionality to read the items, quantity and price all from a configuration file to database.