SL-3001
Software Construction and Development

Objectives:
- Tree View Controls
- List Textbox View
- File Handling
- Emails

- **Note: Perform all task in SCD_CRUD Project, which we are following in Lab**

Lab 9 (3 wtg)

Task 01: Tree View Control with Database [15 marks]

- **You have assigned a task to make Point of Sale System.**
- **There are Categories Level (level 1, level 2 and Level 3)**
- **A category can be in Level one or in Level two or in Level three category.**

Here Pizza, Burger and Drinks are three categories. All these are at level one

Here Small, Medium and Large categories are
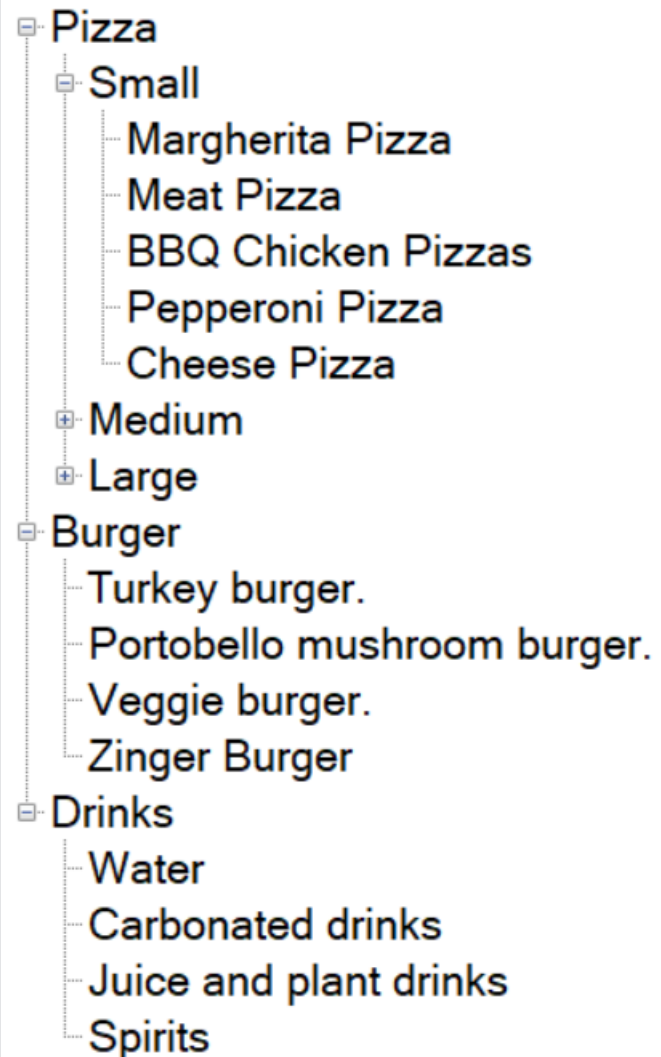
at second level.
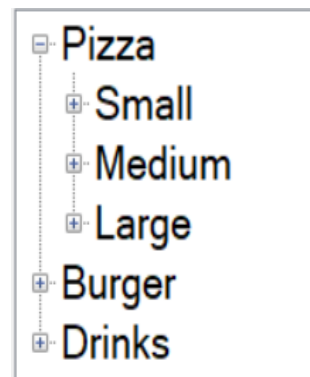
But Here When category doesn't have more sub child's category then there will be Item in each Category.

e.g. Small Category have Items:

- Margherita Pizza
- Meat Pizza
- BBQ Chicken Pizzas
- Pepperoni Pizza
- Cheese Pizza

Likewise, Burger category have its own items and Drinks category have its own Items:

```
⊟ Pizza
  ⊟ Small
      Margherita Pizza
      Meat Pizza
      BBQ Chicken Pizzas
      Pepperoni Pizza
      Cheese Pizza
  ⊞ Medium
  ⊞ Large
  ⊟ Burger
      Turkey burger.
      Portobello mushroom burger.
      Veggie burger.
      Zinger Burger
  ⊟ Drinks
      Water
      Carbonated drinks
      Juice and plant drinks
      Spirits
```

Database: There will be a Category tables and second one of Items tables

ANJUM\SQLEXPRESS....- dbo.Categories*

Column Name	Data Type	Allow Nulls
Cat_ID	int	☐
Cat_Name	nvarchar(50)	☐
Parent_Cat_ID	int	☐
Is_Child	bit	☐
Cat_Status	bit	☐
Cat_Level	int	☐

Item table:

Column Name	Data Type	Allow Nulls
Item_ID	int	☐
Cat_ID	int	☐
Item_Name	nvarchar(200)	☐
Item_Reg_Price	numeric(18, 2)	☐
Item_Status	bit	☐

Note: A Item can only be in One category but a Category may have multiple Items

Use the knowledge of Database and Design the Database and then Enter all records.

Then Display all these records in Tree View Control C# application.

- Pizza
  - Small
  - Medium
  - Large
    - Margherita Pizza
    - Meat Pizza
    - BBQ Chicken Pizzas
    - Pepperoni Pizza
    - Cheese Pizza
- Burger
  - Turkey burger.
  - Portobello mushroom burger.
  - Veggie burger.
  - Zinger Burger
- Drinks
  - Water
  - Carbonated drinks
  - Juice and plant drinks
  - Spirits
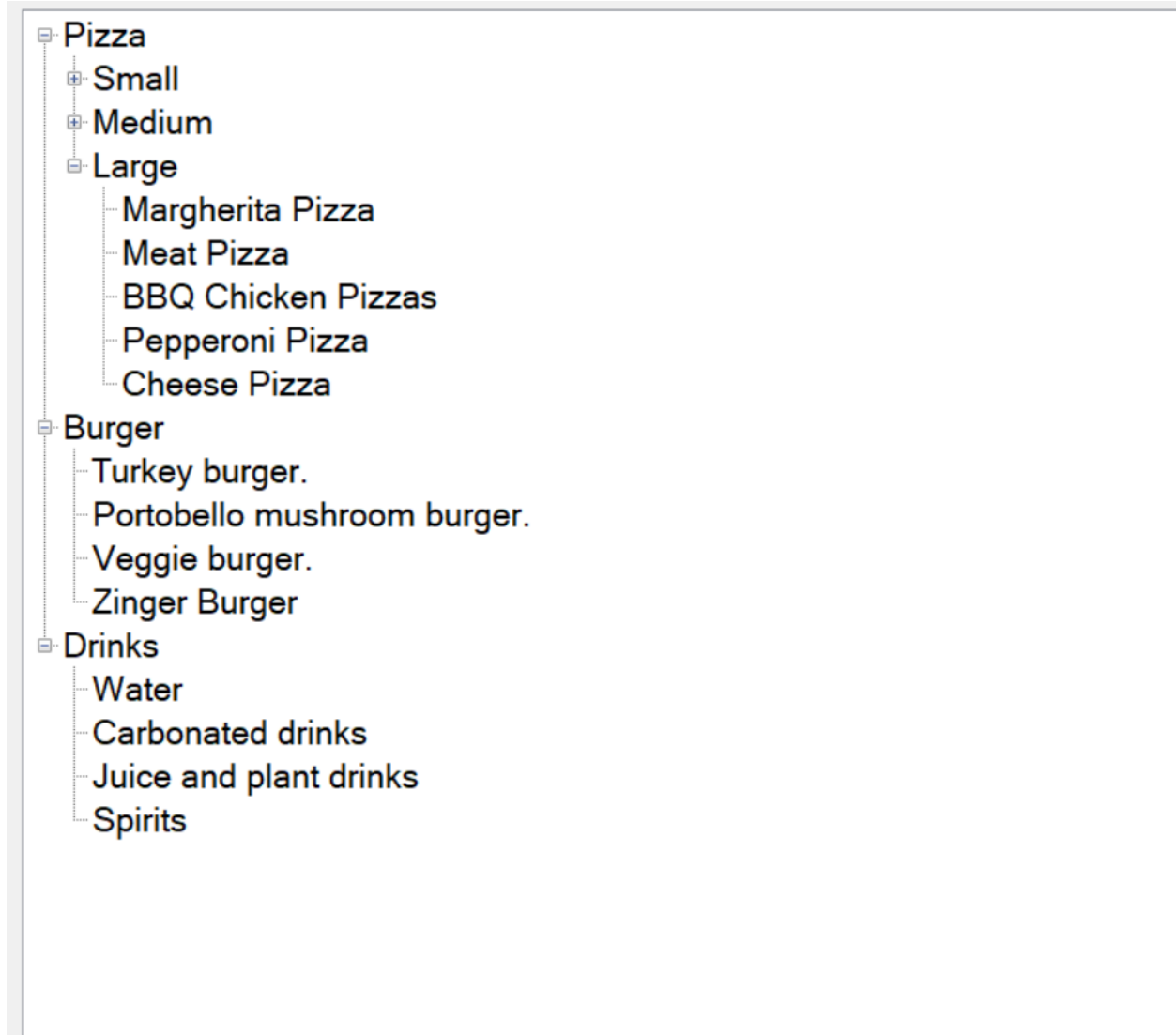
Lab 10 Task (3 wtg)

Task 03: Email and File Handling [10 marks]

There is a CSV file having List of Emails with cross ponding details.

Write a program that will read this file get the all information from it then send an each clients with respective Subject and Message.

	A	B	C	D	E
	To Email	Name	Subject	Message	
	p200452@pwr.nu.edu.pk	p200452@pwr.nu.edu.pk	Videos	Video provides a powerful way to help yc	
	p200169@pwr.nu.edu.pk	p200169@pwr.nu.edu.pk	Documents	To make your document look professiona	
	p200005@pwr.nu.edu.pk	p200005@pwr.nu.edu.pk	Thems	Themes and styles also help keep your dc	
	p200460@pwr.nu.edu.pk	p200460@pwr.nu.edu.pk	Buttons	Save time in Word with new buttons that	
	p200117@pwr.nu.edu.pk	p200117@pwr.nu.edu.pk	Picture	To change the way a picture fits in your c	
	p200091@pwr.nu.edu.pk	p200091@pwr.nu.edu.pk	Tables	When you work on a table, click where yc	
	p200484@pwr.nu.edu.pk	p200484@pwr.nu.edu.pk	Videos	Video provides a powerful way to help yc	
	p200463@pwr.nu.edu.pk	p200463@pwr.nu.edu.pk	Documents	To make your document look professiona	
	p200006@pwr.nu.edu.pk	p200006@pwr.nu.edu.pk	Thems	Themes and styles also help keep your dc	
	p200485@pwr.nu.edu.pk	p200485@pwr.nu.edu.pk	Buttons	Save time in Word with new buttons that	
	p200124@pwr.nu.edu.pk	p200124@pwr.nu.edu.pk	Picture	To change the way a picture fits in your c	
	p200084@pwr.nu.edu.pk	p200084@pwr.nu.edu.pk	Tables	When you work on a table, click where yc	