

FINAL PROJECT REPORT

ABOUT

PHARMACY APK

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11

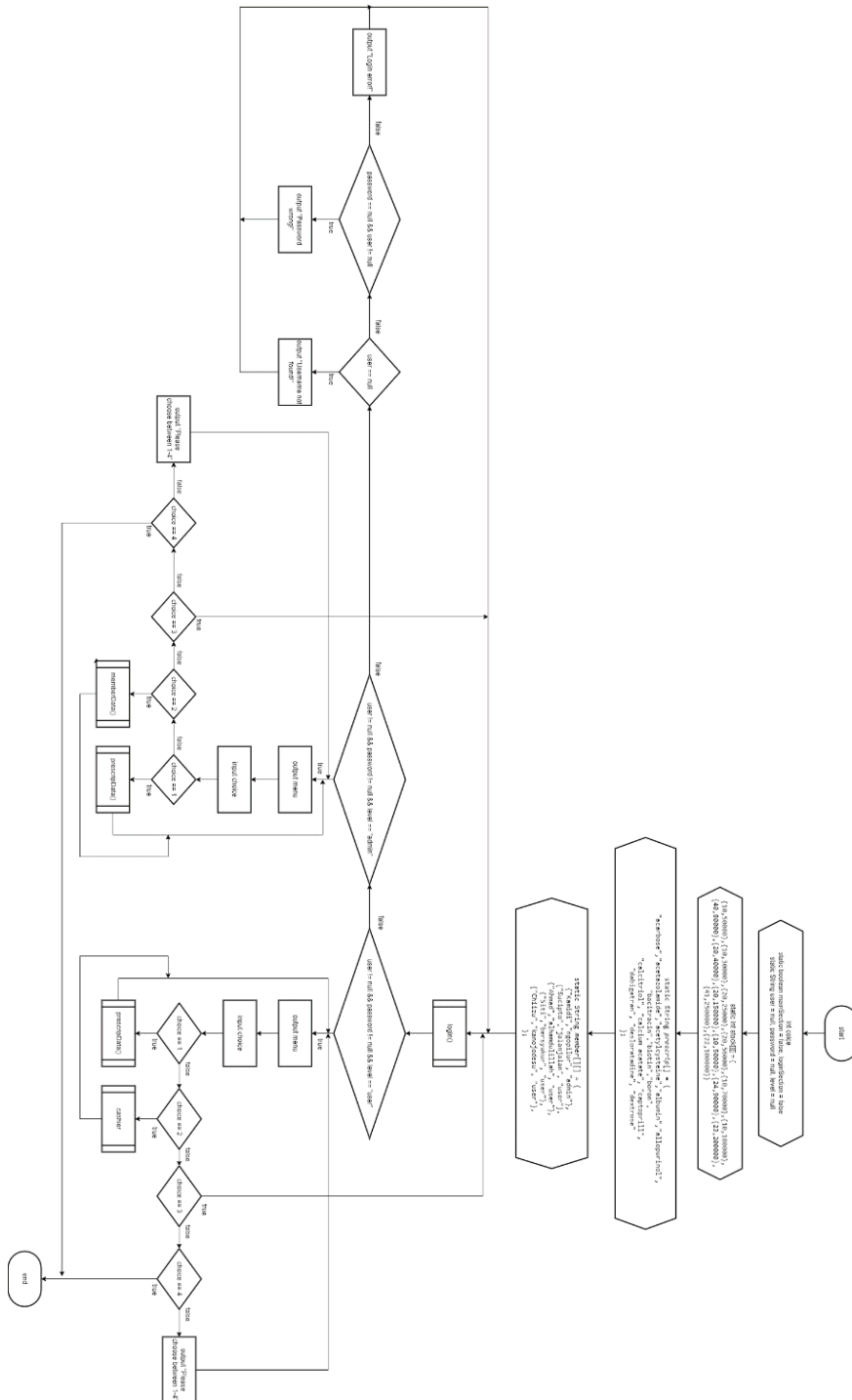


POLITEKNIK NEGERI MALANG

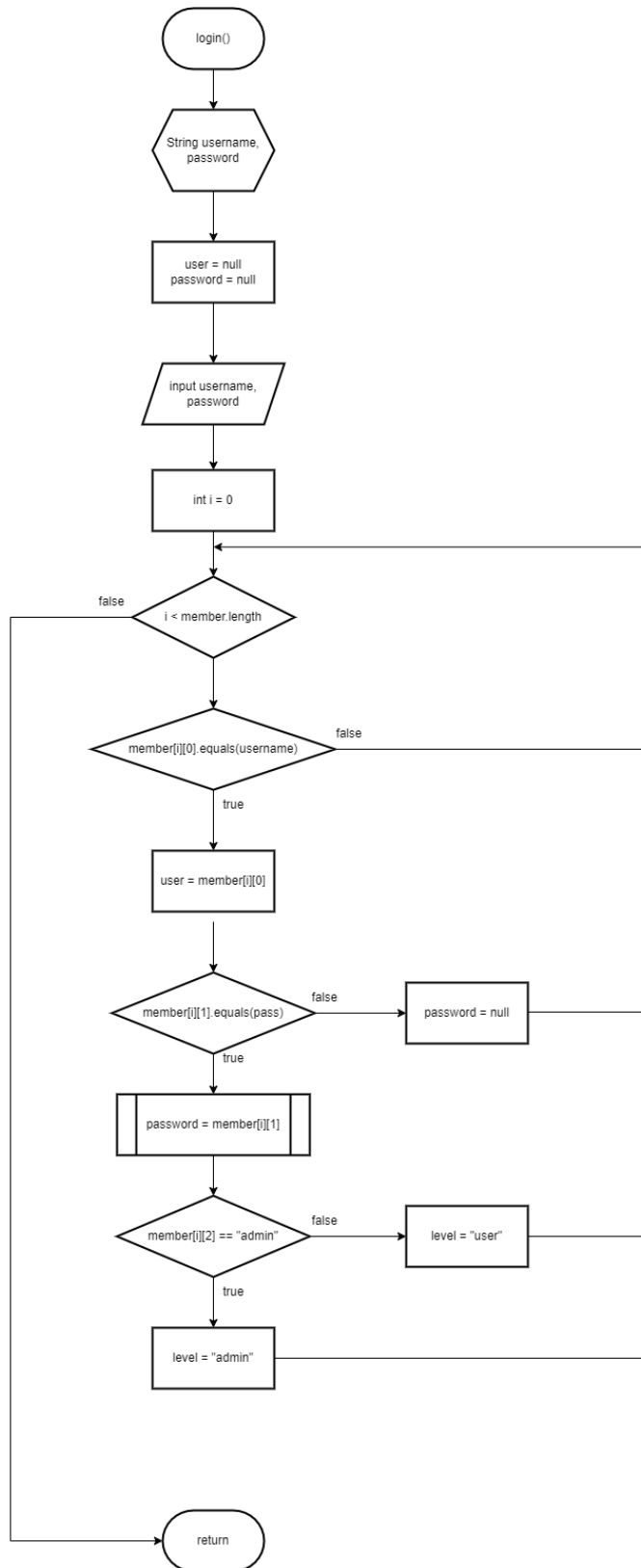
13 DECEMBER 2022

1.1 Flowchart

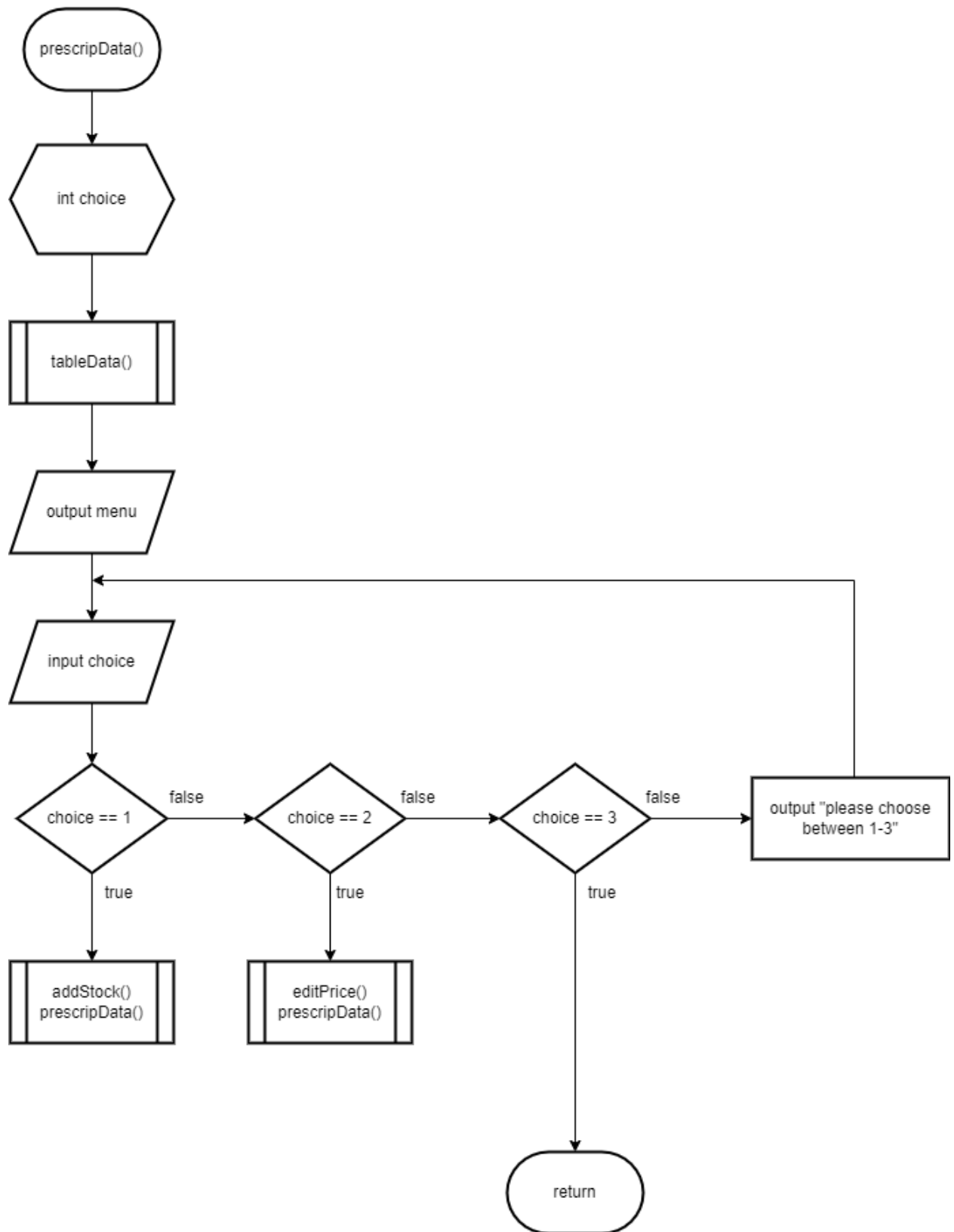
1. Main Function



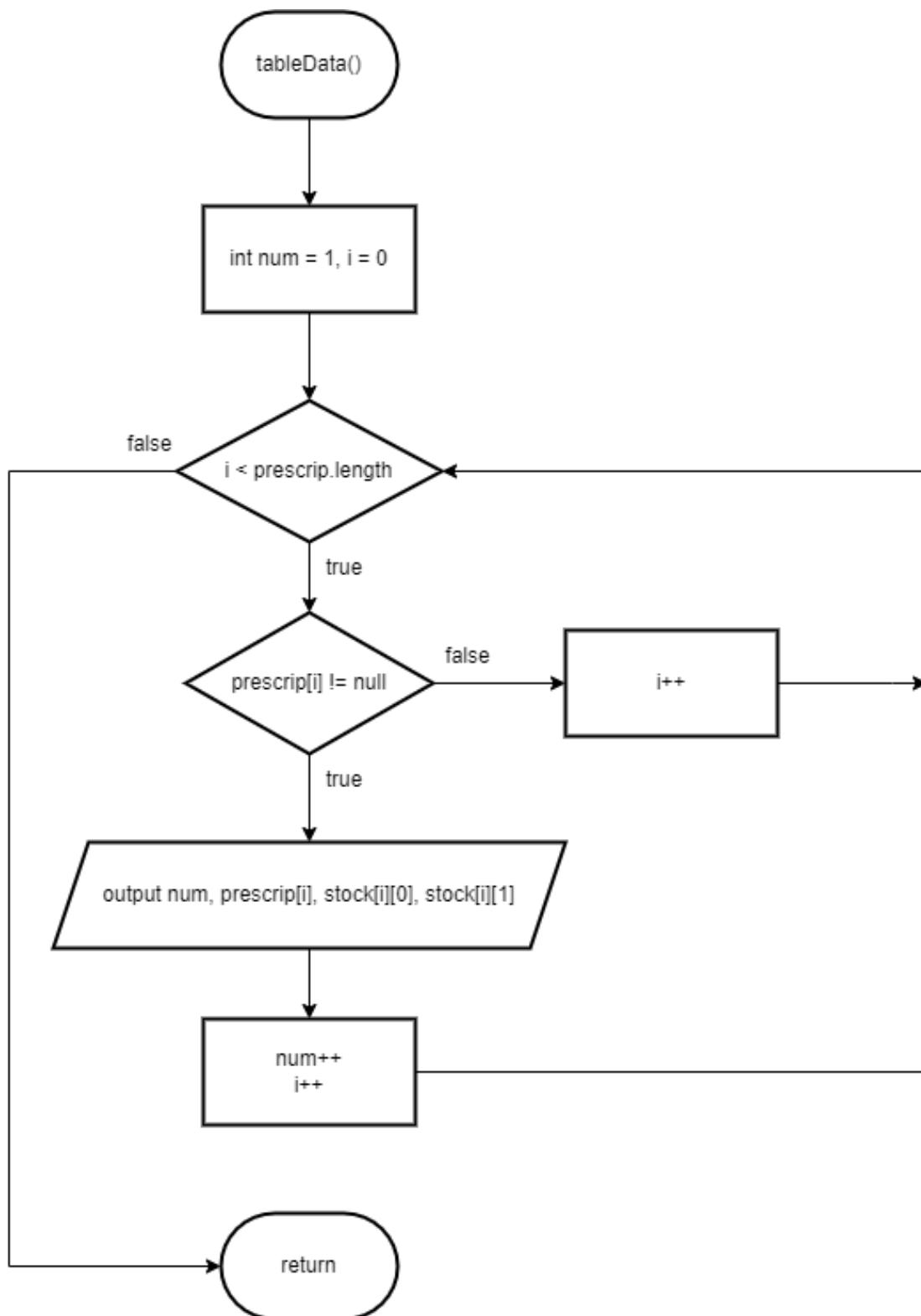
2. Login Function



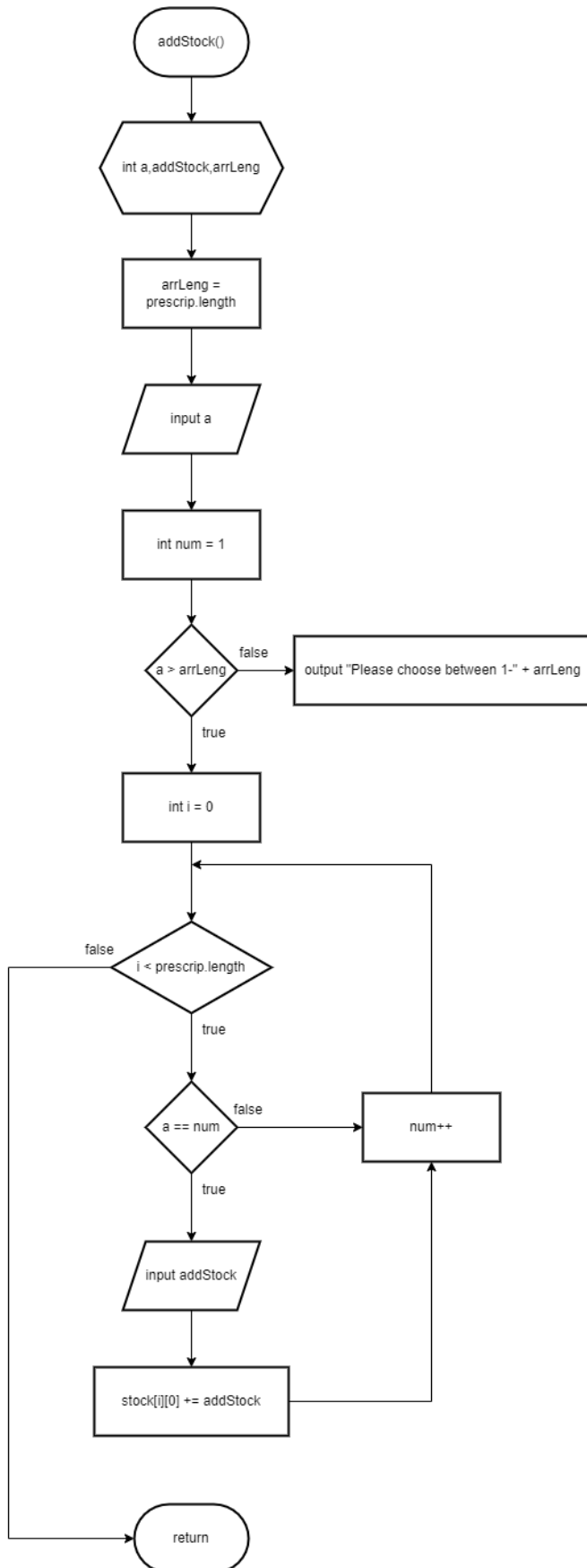
3. prescripData Function



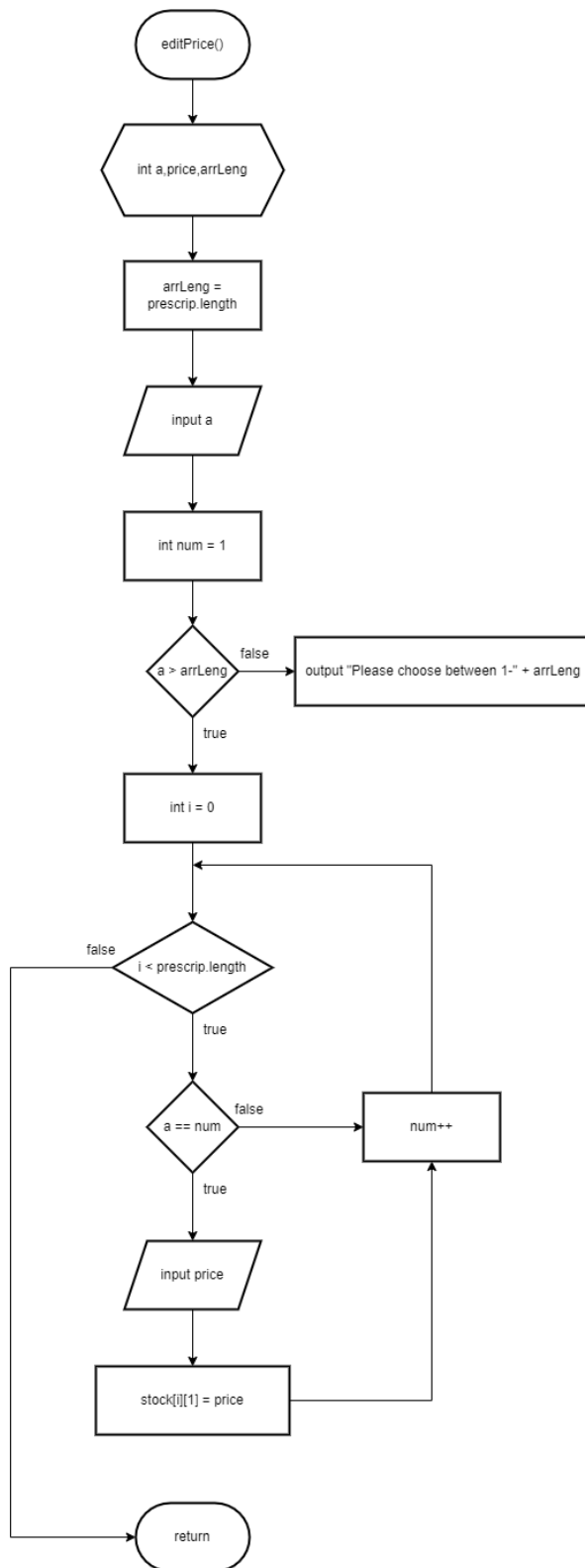
4. tableData Function



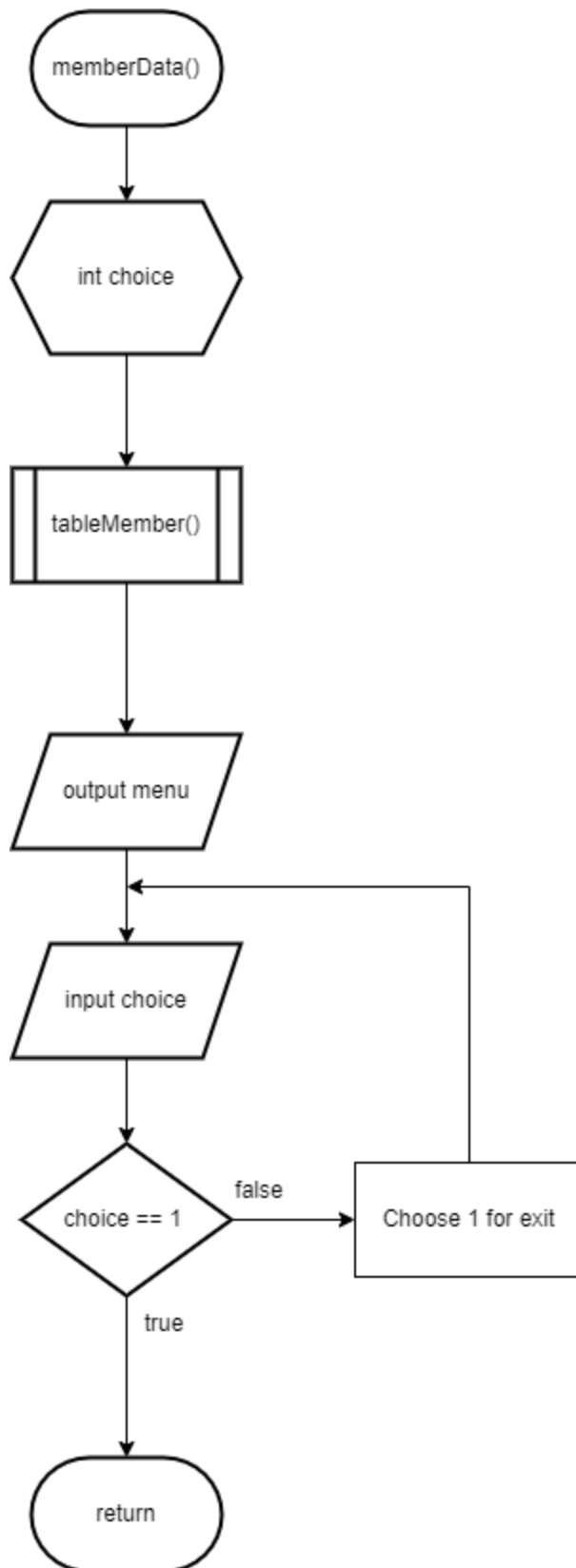
5. addStock Function



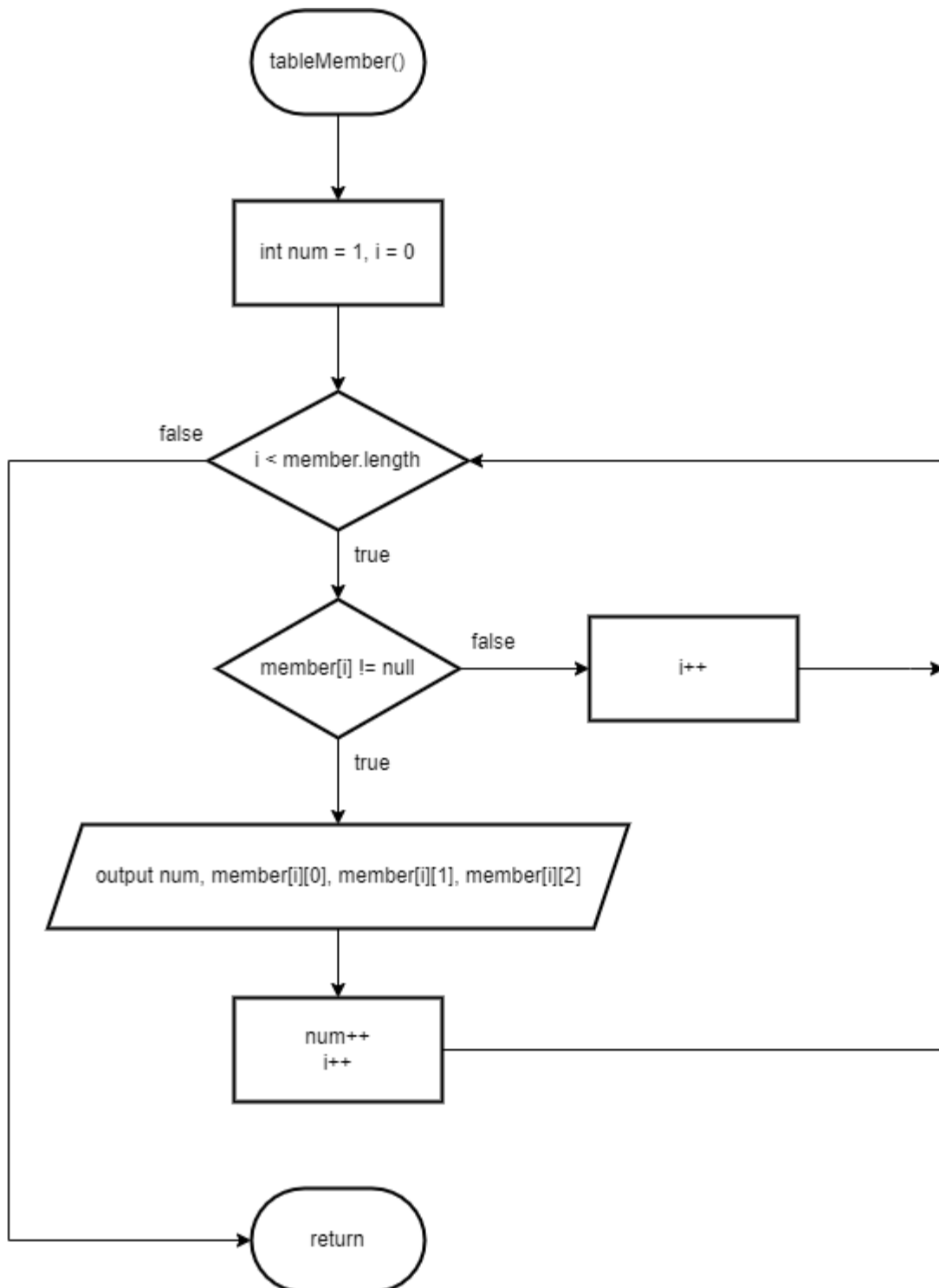
6. editPrice Function



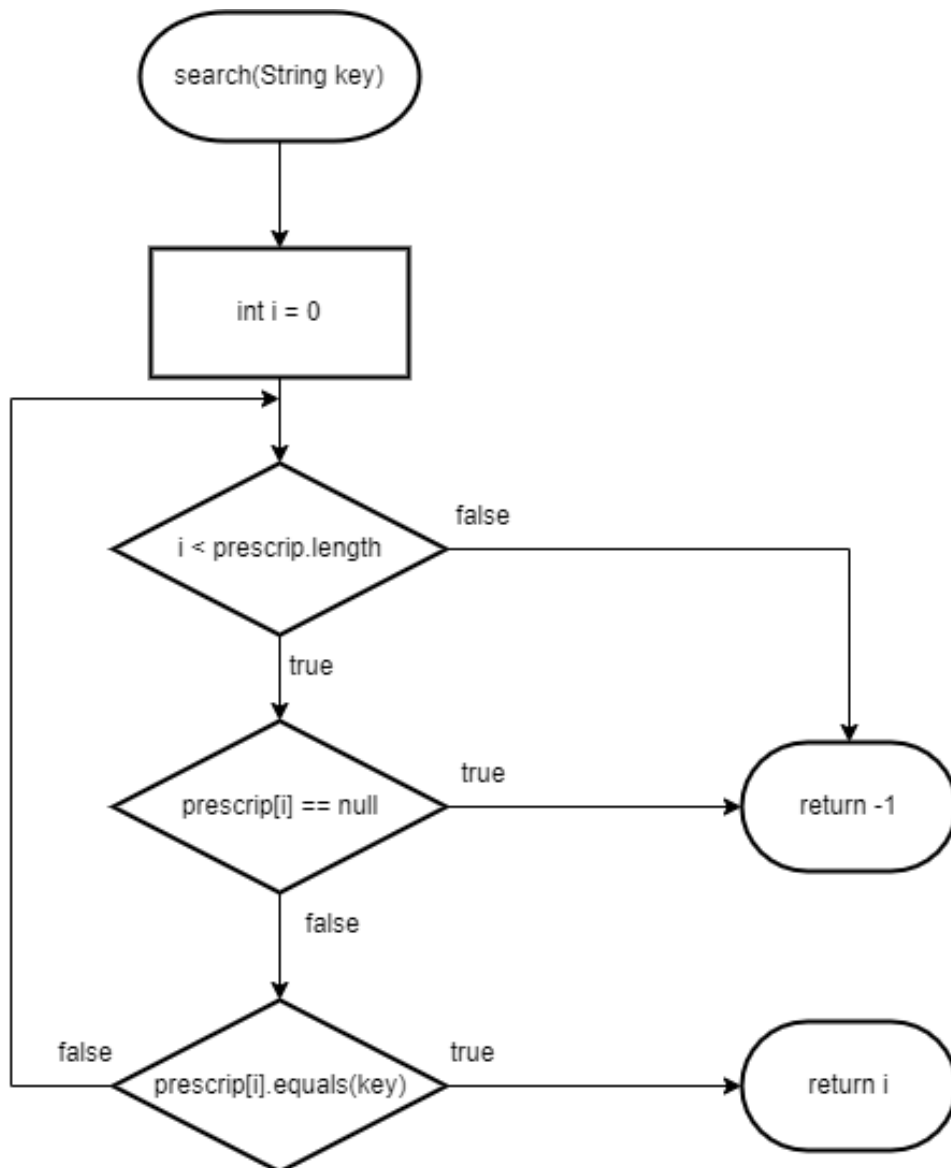
7. memberData Function



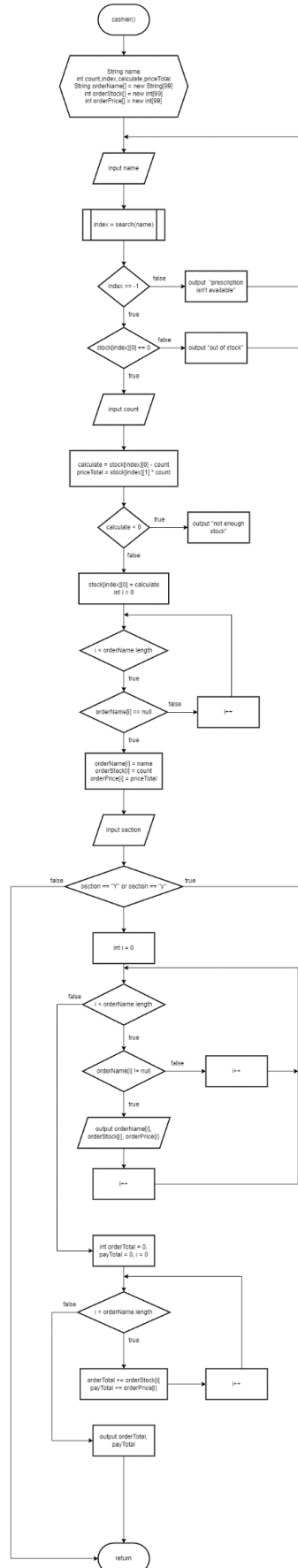
8. tableMember Function



9. search Function



10. cashier Function



1.2 Steps to Run the Program

//contains the steps for running the application starting from the first run until all menus are tried to run

The following are the steps for running the application

1. This application consists of 4 menus, namely adding data, borrowing, returning, and fines.
 - a. Admin menu

```
-----  
Welcome Kamidi (Admin)  
-----  
Menu  
1. Prescription Data  
2. Member Data  
3. Logout  
4. Exit  
Choose (1/2/3/4) : |
```

- b. User menu

```
-----  
Welcome Sucipto  
-----  
Menu  
1. Prescription Data  
2. Cashier  
3. Logout  
4. Exit  
Choose (1/2/3/4) :
```

2. When you first start the application, you must login first. If you input a username called “Kamidi” and the password is “ngopilur”, after that you will enter the admin page. If you input the usernames like “Sucipto,Ahmad,Siti,Chiizu”, after that you will enter the user page.

a. Admin login

```
-----  
                        WELCOME TO PHARMACY APK  
-----  
--- Login ---  
Username : Kamidi  
Password : ngopilur  
-----  
Welcome Kamidi (Admin)  
-----  
Menu  
1. Prescription Data  
2. Member Data  
3. Logout  
4. Exit  
Choose (1/2/3/4) :
```

b. User login

```
-----  
                        WELCOME TO PHARMACY APK  
-----  
--- Login ---  
Username : Sucipto  
Password : bersyukur  
-----  
Welcome Sucipto  
-----  
Menu  
1. Prescription Data  
2. Cashier  
3. Logout  
4. Exit  
Choose (1/2/3/4) : |
```

- c. if you input a username that is not in the member list then...

```
--- Login ---
Username : Slamet
Password : maszeh
| Username not found! |
```

- d. if you input a username that is in the member list but you are false when you input the wrong password.

```
--- Login ---
Username : Sucipto
Password : Alhamdulillah
```

3. On the admin page, if you choose number 1 on the menu, you will enter the prescriptions data page

```
Welcome Kamidi (Admin)
-----
Menu
1. Prescription Data
2. Member Data
3. Logout
4. Exit
Choose (1/2/3/4) : 1
-----
Stock data
-----
|No| Name           | Stock | Price  |
|1| acarbose       | 10    | 50000  |
|2| acetazolamide  | 10    | 30000  |
|3| acetylcysteine | 20    | 25000  |
|4| albumin        | 20    | 56000  |
|5| allopurinol    | 10    | 70000  |
|6| bacitracin     | 10    | 100000 |
|7| biotin         | 40    | 80000  |
|8| boron          | 20    | 40000  |
|9| calcitriol     | 20    | 150000 |
|10| calcium acatate| 10    | 50000  |
|11| captoprill     | 24    | 90000  |
|12| dabigatran     | 23    | 200000 |
|13| desloratadine  | 41    | 250000 |
|14| dextrose       | 22    | 100000 |
-----
Menu
1. Add Stock
2. Edit Price
3. Back to Menu
Press (1-3) :
```

4. On the prescriptions data page menu, there are 3 selection. if you choose number 1, you will enter the add stock prescription page. In the that page, you can add prescription stock data that contains in this table.

```
-----
Stock data
-----
|No| Name           | Stock | Price  |
|1| acarbose       | 10    | 50000  |
|2| acetazolamide  | 10    | 30000  |
|3| acetylcysteine | 20    | 25000  |
|4| albumin        | 20    | 56000  |
|5| allopurinol    | 10    | 70000  |
|6| bacitracin     | 10    | 100000 |
|7| biotin         | 40    | 80000  |
|8| boron          | 20    | 40000  |
|9| calcitriol     | 20    | 150000 |
|10| calcium acatate| 10    | 50000  |
|11| captoprill     | 24    | 90000  |
|12| dabigatran     | 23    | 200000 |
|13| desloratadine  | 41    | 250000 |
|14| dextrose       | 22    | 100000 |
-----
Menu
1. Add Stock
2. Edit Price
3. Back to Menu
Choose (1-3) : 1
Choose the number of prescription (1-14) : 1
Enter stock : 10
```

```
-----
Stock data
-----
|No| Name           | Stock | Price  |
|1| acarbose       | 20    | 50000  |
|2| acetazolamide  | 10    | 30000  |
|3| acetylcysteine | 20    | 25000  |
|4| albumin        | 20    | 56000  |
|5| allopurinol    | 10    | 70000  |
|6| bacitracin     | 10    | 100000 |
|7| biotin         | 40    | 80000  |
|8| boron          | 20    | 40000  |
|9| calcitriol     | 20    | 150000 |
|10| calcium acatate| 10    | 50000  |
|11| captoprill     | 24    | 90000  |
|12| dabigatran     | 23    | 200000 |
|13| desloratadine  | 41    | 250000 |
|14| dextrose       | 22    | 100000 |
-----
Menu
1. Add Stock
2. Edit Price
3. Back to Menu
Choose (1-3) :
```


5. On the prescriptions data page menu, if you choose number 2, you will enter the prescription price edit page. In the that page, you can edit the prescription price data that contains in this table.

Stock data			
No	Name	Stock	Price
1	acarbose	20	50000
2	acetazolamide	10	30000
3	acetylcysteine	20	25000
4	albumin	20	56000
5	allopurinol	10	70000
6	bacitracin	10	100000
7	biotin	40	80000
8	boron	20	40000
9	calcitriol	20	150000
10	calcium acetate	10	50000
11	captopril	24	90000
12	dabigatran	23	200000
13	desloratadine	41	250000
14	dextrose	22	100000

Menu

1. Add Stock
2. Edit Price
3. Back to Menu

Choose (1-3) : 2

Choose the number of prescription (1-14) : 4

Enter Price : 50000

Stock data			
No	Name	Stock	Price
1	acarbose	20	50000
2	acetazolamide	10	30000
3	acetylcysteine	20	25000
4	albumin	20	50000
5	allopurinol	10	70000
6	bacitracin	10	100000
7	biotin	40	80000
8	boron	20	40000
9	calcitriol	20	150000
10	calcium acetate	10	50000
11	captopril	24	90000
12	dabigatran	23	200000
13	desloratadine	41	250000
14	dextrose	22	100000

Menu

1. Add Stock
2. Edit Price
3. Back to Menu

Choose (1-3) :

6. On the user page, if you choose number 1 on the menu, you will enter the prescriptions data page

```
--- Login ---
Username : Sucipto
Password : bersyukur
-----
Welcome Sucipto
-----
Menu
1. Prescription Data
2. Cashier
3. Logout
4. Exit
Choose (1/2/3/4) : 1
```

```
-----
Stock data
-----
|No| Name           | Stock | Price  |
|1| acarbose       | 20    | 50000  |
|2| acetazolamide  | 10    | 30000  |
|3| acetylcysteine | 20    | 25000  |
|4| albumin        | 20    | 50000  |
|5| allopurinol    | 10    | 70000  |
|6| bacitracin     | 10    | 100000 |
|7| biotin         | 40    | 80000  |
|8| boron          | 20    | 40000  |
|9| calcitriol     | 20    | 150000 |
|10| calcium acatate| 10    | 50000  |
|11| captoprill     | 24    | 90000  |
|12| dabigatran     | 23    | 200000 |
|13| desloratadine  | 41    | 250000 |
|14| dextrose       | 22    | 100000 |
-----
Menu
1. Back to Menu
Choose (1) :
```

7. On the user page, if you choose number 2 on the menu, you will enter the cashier page. In the cashier page, you can make transactions like this, and then the all of transactions data will be displayed below like this.

```
--- Login ---
Username : Sucipto
Password : bersyukur
-----
Welcome Sucipto
-----
Menu
1. Prescription Data
2. Cashier
3. Logout
4. Exit
Choose (1/2/3/4) : 2
```

```
-----
Casier
-----
Enter the name of prescription : acarbose
Enter the number of prescription : 4
Do you want input again? (y/n) : y
Enter the name of prescription : albumin
Enter the number of prescription : 2
Do you want input again? (y/n) : y
Enter the name of prescription : captorill
| The prescription isn't available |
Enter the name of prescription : captoprill
Enter the number of prescription : 3
Do you want input again? (y/n) : n
-----
Order Data
-----
By Sucipto
|Name          | Count | Price  |
|acarbose      | 4     | 200000 |
|albumin       | 2     | 112000 |
|captoprill    | 3     | 270000 |
|-----|
|Total        | 9     | 582000 |
|-----|
```

8. On the user page and admin page menu. If you choose number 3, you will return to the login page.

```
-----  
Welcome Sucipto  
-----  
Menu  
1. Prescription Data  
2. Cashier  
3. Logout  
4. Exit  
Choose (1/2/3/4) : 3  
--- Login ---  
Username :
```

9. On the user page and admin page menu. if you choose number 4, the program will be stopped automatically.

```
-----  
Welcome Sucipto  
-----  
Menu  
1. Prescription Data  
2. Cashier  
3. Logout  
4. Exit  
Choose (1/2/3/4) : 4  
  
Process finished with exit code 0
```

1.3 Program Code

```
2  import java.util.Scanner;

public class Main {
    static Scanner sc = new Scanner(System.in);
    static boolean mainSection = false, loginSection = false;
    static String user = null, password = null, level = null;
    static int stock[][] = {
        {10,50000},{10,30000},{20,25000},{20,56000},{10,70000},
        {10,100000},{40,80000},{20,40000},
        {20,150000},{10,50000},{24,90000},
        {23,200000},{41,250000},{22,100000}
    };
    static String prescrip[] = {
        "acarbose","acetazolamide","acetylcysteine","albumin","allopurinol",
        "bacitracin","biotin","boron",
        "calcitriol", "calcium acatate", "captoprill",
        "dabigatran", "desloratadine", "dextrose"
    };
    static String member[][] = {
        {"Kamidi","ngopilur", "admin"},
        {"Sucipto","bersyukur", "user"},
        {"Ahmad","alhamdulillah", "user"},
        {"Siti","bersyukur", "user"},
        {"Chiizu","kanojodesu", "user"},
    };
    static void line(){
        System.out.println("-----
    ----");
    }

    static void cashier(){
        String name;
        int count,index,calculate,priceTotal;
        String orderName[] = new String[99];
        int orderStock[] = new int[99];
        int orderPrice[] = new int[99];
        boolean repeatSec = false;

        line();
        System.out.println("Casier");
        line();

        do {
            System.out.print("Enter the name of prescription : ");
            name = sc.nextLine();
            index = search(name);
            if (index == -1){
                System.out.println("| The prescription isn't available
|");
                repeatSec = true;
            }else if(stock[index][0] == 0){
```



```

    }
    System.out.println("-----");
    -----");
    int orderTotal = 0, payTotal = 0;
    for (int i = 0 ; i < orderName.length ; i++){
        orderTotal += orderStock[i];
        payTotal += orderPrice[i];
    }
    System.out.printf("|");
    System.out.printf("%-20s", "Total");
    System.out.printf("%-2s", "|");
    System.out.printf("%-7s", orderTotal);
    System.out.printf("%-2s", "|");
    System.out.printf("%-10s", payTotal);
    System.out.println("|");
    System.out.println("-----");
    -----");

    System.out.println();
    repeatSec = false;
    mainSection = true;
    }
    }
    } while (repeatSec == true);
}

static void login(){
    String username,pass;

    user = null;
    password = null;

    System.out.print("Username : ");
    username = sc.nextLine();
    System.out.print("Password : ");
    pass = sc.nextLine();

    for(int i = 0 ; i < member.length ; i++){
        if (member[i][0].equals(username)){
            user = member[i][0];
            if (member[i][1].equals(pass)){
                password = member[i][1];
                if (member[i][2] == "admin") {
                    level = "admin";
                }else {
                    level = "user";
                }
            }else {
                password = null;
            }
        }
    }
}

static void tableData(){
    System.out.printf("|");

```

```

System.out.printf("%-2s", "No");
System.out.printf("%-2s", "|");
System.out.printf("%-20s", "Name");
System.out.printf("%-2s", "|");
System.out.printf("%-7s", "Stock");
System.out.printf("%-2s", "|");
System.out.printf("%-10s", "Price");
System.out.println("|");

if (prescrip[0] == null){
    System.out.printf("|");
    System.out.printf("%-2s", "-");
    System.out.printf("%-2s", "|");
    System.out.printf("%-20s", "null");
    System.out.printf("%-2s", "|");
    System.out.printf("%-7s", "null");
    System.out.printf("%-2s", "|");
    System.out.printf("%-10s", "null");
    System.out.println("|");
}else {
    int num = 1;
    for (int i = 0; i < prescrip.length; i++){
        if (prescrip[i] != null){
            System.out.printf("|");
            System.out.printf("%-2s", num);
            System.out.printf("%-2s", "|");
            System.out.printf("%-20s", prescrip[i]);
            System.out.printf("%-2s", "|");
            System.out.printf("%-7s", stock[i][0]);
            System.out.printf("%-2s", "|");
            System.out.printf("%-10s", stock[i][1]);
            System.out.println("|");
            num++;
        }
    }
}

static void prescripData(){
    int choice;
    boolean sectionDataPres = false;

    line();
    System.out.println("Stock data");
    line();
    tableData();

    do {
        line();
        if (level == "admin"){
            System.out.println("Menu");
            System.out.println("1. Add Stock");
            System.out.println("2. Edit Price");
            System.out.println("3. Back to Menu");
            System.out.print("Choose (1-3) : ");
            choice = sc.nextInt();
            switch (choice){

```



```

        case 1:
            addStock();
            prescripData();
            break;
        case 2:
            editPrice();
            prescripData();
            break;
        case 3:
            sectionDataPres = false;
            mainSection = true;
            break;

        default:
            System.out.println("Please choose between 1-3");
            sectionDataPres = true;
    }
} else {
    System.out.println("Menu");
    System.out.println("1. Back to Menu");
    System.out.print("Choose (1) : ");
    choice = sc.nextInt();
    switch (choice) {
        case 1:
            sectionDataPres = false;
            mainSection = true;
            break;

        default:
            System.out.println("Please choose 1 for exit");
            sectionDataPres = true;
    }
}

} while (sectionDataPres == true);
}

static void tableMember() {
    System.out.printf("|");
    System.out.printf("%-2s", "No");
    System.out.printf("%-2s", "|");
    System.out.printf("%-15s", "Username");
    System.out.printf("%-2s", "|");
    System.out.printf("%-15s", "Password");
    System.out.printf("%-2s", "|");
    System.out.printf("%-7s", "level");
    System.out.println("|");

    if (member[0] == null) {
        System.out.printf("|");
        System.out.printf("%-2s", "-");
        System.out.printf("%-2s", "|");
        System.out.printf("%-15s", "null");
        System.out.printf("%-2s", "|");
        System.out.printf("%-15s", "null");
        System.out.printf("%-2s", "|");
        System.out.printf("%-7s", "null");
    }
}

```

```

        System.out.println("|");
    }else {
        int num = 1;
        for (int i = 0;i< member.length;i++){
            if (member[i] != null){
                System.out.printf("|");
                System.out.printf("%-2s", num);
                System.out.printf("%-2s", "|");
                System.out.printf("%-15s",member[i][0]);
                System.out.printf("%-2s", "|");
                System.out.printf("%-15s",member[i][1]);
                System.out.printf("%-2s", "|");
                System.out.printf("%-7s",member[i][2]);
                System.out.println("|");
                num++;
            }
        }
    }
}

static void memberData(){
    int choice;
    boolean sectionMember = false;

    line();
    System.out.println("Member Data");
    line();

    tableMember();

    do {
        System.out.println("Menu");
        System.out.println("1. Back to Menu");
        System.out.print("Choose (1) : ");
        choice = sc.nextInt();
        switch (choice){
            case 1:
                sectionMember = false;
                mainSection = true;
                break;
            default:
                System.out.println("Choose 1 for exit ");
                sectionMember = true;
        }
    }while (sectionMember == true);
}

static void addStock(){
    int a,addStock,arrLeng;
    arrLeng = prescrip.length;
    System.out.print("Choose the number of prescription (1-"+ arrLeng
+ ") : ");
    a = sc.nextInt();

    int num = 1;
    if(a > arrLeng){

```

```

        System.out.println("Please choose between (1 - " + arrLeng +
") : ");
    } else {
        for (int i = 0; i < prescrip.length; i++) {
            if (a == num) {
                System.out.print("Enter stock : ");
                addStock = sc.nextInt();
                stock[i][0] += addStock;
            }
            num++;
        }
    }
}

static void editPrice() {
    int a, price, arrLeng;
    arrLeng = prescrip.length;
    System.out.print("Choose the number of prescription (1-" + arrLeng
+ ") : ");
    a = sc.nextInt();

    int num = 1;
    if (a > arrLeng) {
        System.out.println("Please choose between (1-" + arrLeng +
")");
    } else {
        for (int i = 0; i < prescrip.length; i++) {
            if (a == num) {
                System.out.print("Enter Price : ");
                price = sc.nextInt();
                stock[i][1] = price;
            }
            num++;
        }
    }
}

static int search(String key) {
    for (int i = 0; i < prescrip.length; i++) {
        if (prescrip[i] == null) {
            return -1;
        } else {
            if (prescrip[i].equals(key)) {
                return i;
            }
        }
    }
    return -1;
}

public static void main(String[] args) {
    int choice;

    line();
    System.out.println("                WELCOME TO PHARMACY APK");
    line();
}

```

```

do {
    System.out.println("--- Login ---");
    login();

    if (user != null && password != null && level == "user"){
        do {
            line();
            System.out.println("Welcome " + user);
            line();
            System.out.println("Menu");
            System.out.println("1. Prescription Data");
            System.out.println("2. Cashier");
            System.out.println("3. Logout");
            System.out.println("4. Exit");
            System.out.print("Choose (1/2/3/4) : ");
            choice = sc.nextInt();
            sc.nextLine();

            switch (choice){
                case 1:
                    prescripData();
                    break;
                case 2:
                    cashier();
                    break;
                case 3:
                    loginSection = true;
                    mainSection = false;
                    break;
                case 4:
                    mainSection = false;
                    loginSection = false;
                    break;
                default:
                    System.out.println("Please choose between 1-
4");
                    mainSection = true;
            }

        }while (mainSection == true);

    }else if(user != null && password != null && level ==
"admin"){
        do {
            line();
            System.out.println("Welcome " + user + " (Admin)");
            line();
            System.out.println("Menu");
            System.out.println("1. Prescription Data");
            System.out.println("2. Member Data");
            System.out.println("3. Logout");
            System.out.println("4. Exit");
            System.out.print("Choose (1/2/3/4) : ");
            choice = sc.nextInt();
            sc.nextLine();

```

```

        switch (choice){
            case 1:
                prescripData();
                break;
            case 2:
                memberData();
                break;
            case 3:
                loginSection = true;
                mainSection = false;
                break;
            case 4:
                mainSection = false;
                loginSection = false;
                break;
            default:
                System.out.println("Please choose between 1-
4");
                mainSection = true;
        }
    }while (mainSection == true);

} else if (user == null) {
    System.out.println("| Username not found! |");
    loginSection = true;
} else if (password == null && user != null) {
    System.out.println("| Password wrong! |");
    loginSection = true;
} else {
    System.out.println("| Login error! |");
    loginSection = true;
}
}while (loginSection == true);

}
}

```