

|* 学习目标

- * 理解茶城的业务逻辑
 - * xmind
- * 掌握茶城项目的分包规则
 - * bean(entity),ui(view),utils,db,client,manager
- * 掌握茶城项目的实体类编写
- * 掌握茶城项目的数据初始化
 - * 构造器：构造方法
 - * 与类同名
 - * 没有返回值
- * 掌握茶城项目的Menu的编写
 - * 登陆界面
 - * 茶友管理界面
 - * 茶友信息管理
 - * 显示所有茶友信息
 - * 添加茶友信息
 - * 修改茶友信息
 - * 查询茶友信息
 - * 茶叶结算
 - * 购物结算
 - * 消费清单
 - * 回馈
 - * 幸运大回馈
 - * 抽奖
 - * 生日问候
 - * 注销

- * 掌握茶友管理者编写

- * 显示所有茶友信息

- * 添加茶友信息

- * 修改茶友信息

- * 查询茶友信息

- * 返回上一级菜单

- * 掌握反馈管理者编写

- * 幸运大回馈

- * 抽奖

- * 生日问候

- * 返回上一级菜单

- * 掌握结算管理者编写

- * 购物结算并打印消费清单

- * 返回上一级菜单

- * 掌握茶城客户端编写

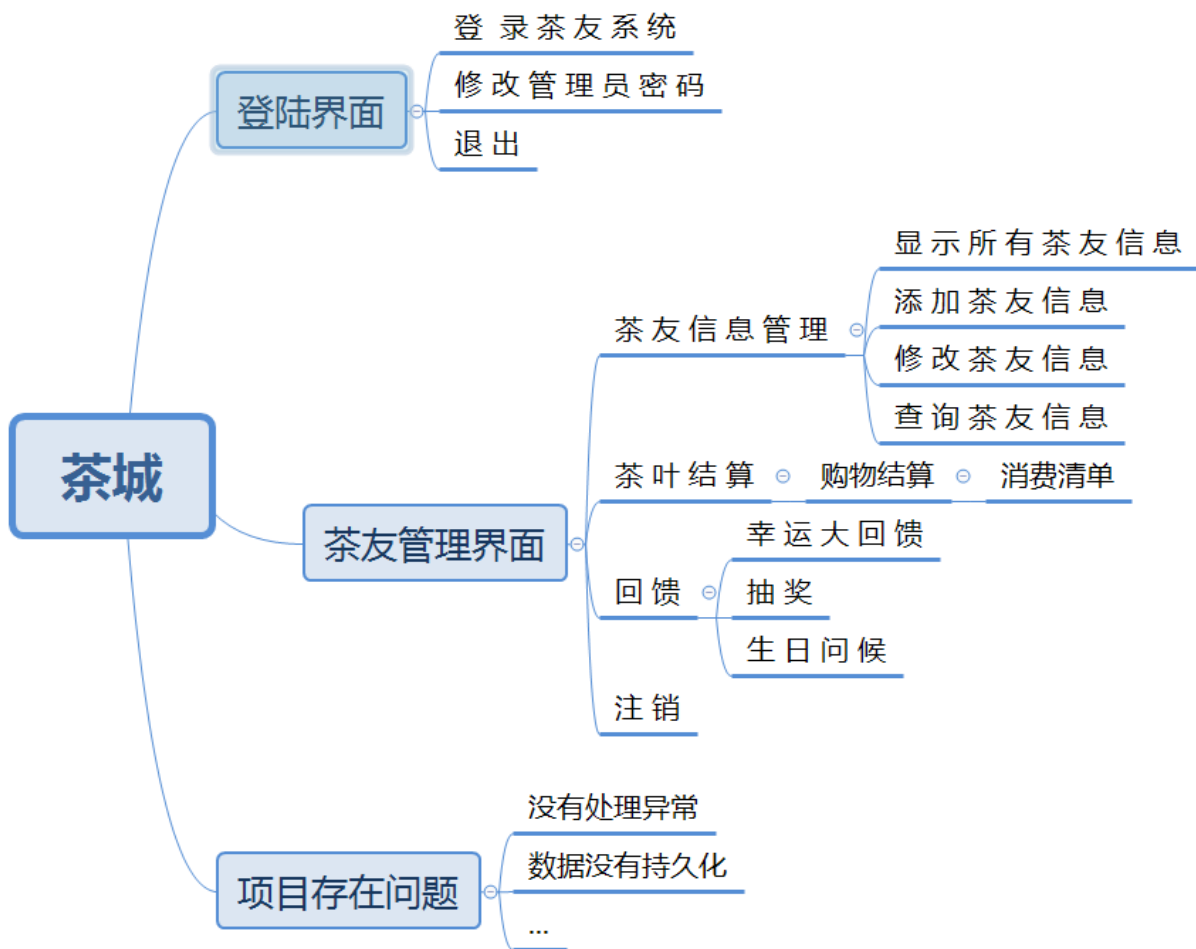
- * 学习目标

- * 理解茶城的业务逻辑

- * 茶城演示










- * 用户名：xiaohei，密码：123

- * 业务逻辑



* 掌握茶城项目的分包规则

- * com.shopping.lg.bean(entity):实体 (茶友 , 礼物 , 商品 , 管理员)
- * com.shopping.lg.db:存放数据(做了一些数据初始化)
- * com.shopping.lg.ui(view):视图层
- * com.shopping.lg.manager:业务层 (业务的管理者)
- * com.shopping.lg.utils:工具类
- * com.shopping.lg.client:客户端启动

- ▼  lgshopping
 - >  JRE System Library [JavaSE-1.8]
 - ▼  src
 - >  com.shopping.lg.bean
 - >  com.shopping.lg.cleint
 - >  com.shopping.lg.db
 - >  com.shopping.lg.manager
 - >  com.shopping.lg.ui
 - >  com.shopping.lg.util

* 掌握茶城项目的实体类编写

```
1 package com.shopping.lg.bean;
2
3 /**
4  * @author xiaozhao
5  * 用户类
6  */
7 public class Customer {
8     public long id;//用户的id
9     public String birthday;//用户生日
10    public int score;//用户积分
11 }
12
13 package com.shopping.lg.bean;
14
15 /**
16  * @author xiaozhao
17  * 礼物类
18  */
19 public class Gift {
20     public String name;//礼物的名字
21     public double price;//礼物的价格
22     // 礼物输出信息
23     @Override
24     public String toString() {
25         return "一个价值¥" + price + "的" + name;
```

```

26     }
27 }
28
29 package com.shopping.lg.bean;
30
31 /**
32  * @author xiaozhao
33  * 商品类
34  */
35 public class Goods {
36     public String name;//商品的名字
37     public double price;//商品的价格
38     // 商品输出信息
39     @Override
40     public String toString() {
41         return "一个价值¥" + price + "的" + name;
42     }
43 }
44
45 package com.shopping.lg.bean;
46
47 /**
48  * @author xiaozhao
49  * 管理员
50  */
51 public class Manager {
52     public String name;//管理员的名字
53     public String password;//管理员的密码
54 }
55
56

```

* 掌握茶城项目的数据库初始化

```

1 package com.shopping.lg.db;
2
3 import com.shopping.lg.bean.Customer;
4 import com.shopping.lg.bean.Goods;
5 import com.shopping.lg.bean.Manager;

```

```
6
7 /**
8  * @author xiaozhao
9  * 初始化数据
10 */
11 public class DB {
12     public Customer customers[]=new Customer[100];//用户集合
13     public Goods goods[]=new Goods[100];//商品集合
14     public Manager manager=new Manager();
15     // 初始化信息
16     public DB() {// 构造方法（与类同名，没有返回值）
17         //1 初始化用户信息
18         initCustomers();
19         //2 初始化商品信息
20         initGoods();
21         //3 初始化管理员
22         initManager();
23     }
24     /**
25     * 初始化用户信息
26     */
27     private void initCustomers() {
28         for (int i = 0; i < customers.length; i++) {
29             customers[i]=new Customer();
30         }
31         customers[0].id=10001;
32         customers[0].birthday="08/05";
33         customers[0].score=1000;
34
35         customers[1].id=10002;
36         customers[1].birthday="09/06";
37         customers[1].score=2000;
38
39         customers[2].id=10003;
40         customers[2].birthday="10/08";
41         customers[2].score=3000;
42     }
43
44     //初始化商品信息
45     private void initGoods() {
```

```

46         for (int i = 0; i < goods.length; i++) {
47             goods[i]=new Goods();
48         }
49
50         goods[0].name="铁观音";
51         goods[0].price=100;
52
53         goods[1].name="普洱";
54         goods[1].price=199.9;
55
56         goods[2].name="红茶";
57         goods[2].price=99.9;
58
59     }
60
61     //初始化管理员
62     private void initManager() {
63         manager.name="xiaohei";
64         manager.password="123";
65     }
66 }
67

```

* 掌握茶城项目的Menu的编写

* Menu数据声明

```

1  /**
2     * 商品的数据
3     */
4     public Goods[] goods = new Goods[100];
5     /**
6     * 茶友的数据
7     */
8     public Customer[] customers = new Customer[100];
9
10    /**
11    * 提供设置数据的方法
12    *

```

```

13     * @param goods
14     * @param customers
15     */
16     public void setData(Goods[] goods, Customer[] customers) {
17         this.goods = goods;
18         this.customers = customers;
19     }

```

* 登陆界面

```

1  /**
2     * 1 显示亮哥茶城购物管理系统的登录菜单
3     */
4     public void showLoginMenu() {
5         System.out.println("\n\n\t\t\t\t\t 欢迎使用亮哥茶城购物管理系统2.0版\n\n");
6         System.out.println("* * * * *");
7         System.out.println("\t\t\t\t\t 1. 登 录 茶 友 系 统\n\n");
8         System.out.println("\t\t\t\t\t 2. 修 改 管 理 员 密 码\n\n");
9         System.out.println("\t\t\t\t\t 3. 退 出\n\n");
10        System.out.println("* * * * *");
11        System.out.print("请选择,输入数字:");
12    }
13

```

* 茶友管理界面

```

1  /**
2     * 2 显示亮哥茶城购物管理系统的主菜单
3     */
4     public void showMainMenu() {
5         System.out.println("\n\n\t\t\t\t\t 欢迎使用亮哥茶城购物管理系统\n\n");
6         System.out.println("* * * * *");
7         System.out.println("\t\t\t\t\t 1. 茶 友 信 息 管 理\n\n");
8         System.out.println("\t\t\t\t\t 2. 茶 叶 结 算\n\n");
9         System.out.println("\t\t\t\t\t 3. 回 馈\n\n");
10        System.out.println("\t\t\t\t\t 4. 注 销\n\n");
11        System.out.println("* * * * *");

```



```

12      System.out.print("请选择,输入数字:");
13      boolean con=false;
14      do {
15          Scanner scanner= new Scanner(System.in);
16          int command = scanner.nextInt();
17          switch (command) {
18              case 1:
19              // 1茶友 信 息 管 理
20                  showCustMenu();
21                  break;
22              case 2:
23              // 2 购 物 结 算
24                  showSettlementMenu();
25                  break;
26              case 3:
27              // 3 真 情 回 馈
28                  showTrueFeedBackMenu();
29                  break;
30              case 4:
31              // 4 注 销
32                  showLoginMenu();
33                  con=true;
34                  break;
35              default:
36                  System.out.print("输入错误,请重新输入数字: ");
37                  con=false;
38                  break;
39          }
40      }while(!con);
41  }

```

* 茶友信息管理

- * 显示所有茶友信息
- * 添加茶友信息
- * 修改茶友信息
- * 查询茶友信息

```
1  /**
2   * 3 显示亮哥茶城购物管理系统的茶友信息管理菜单
3   */
4   public void showCustMenu() {
5       System.out.println("亮哥茶城购物管理系统> 茶 友信息管理\n");
6       System.out.println("*****");
7       System.out.println("\t\t\t\t 1. 显示所有茶友信息\n");
8       System.out.println("\t\t\t\t 2. 添加茶友信息\n");
9       System.out.println("\t\t\t\t 3. 修改茶友信息\n");
10      System.out.println("\t\t\t\t 4. 查询茶友信息\n");
11      System.out.println("*****");
12      System.out.print("请选择,输入数字或按'n'返回上一级菜单:");
13      Scanner scanner=new Scanner(System.in);
14      boolean con=true;
15      do {
16          String command = scanner.next();
17          // 创建用户管理者
18          CustomerManager cm=new CustomerManager();
19          // 设置用户数据
20          cm.setData(goods,customers);
21          switch (command) {
22              case "1":
23                  cm.showAllCustomers();
24                  break;
25              case "2":
26                  cm.addCustomer();
27                  break;
28              case "3":
29                  cm.modifyCustomer();
30                  break;
31              case "4":
32                  cm.queryCustomer();
33                  break;
34              case "n":
35                  showMainMenu();
36                  break;
37              default:
38                  System.out.println("输入错误, 请重新输入数字: ");
39                  con = false;
40                  break;
```

```
41         }
42     }while(!con);
43 }
44
45
46
47
48 package com.shopping.lg.manager;
49
50 import com.shopping.lg.bean.Customer;
51 import com.shopping.lg.bean.Goods;
52
53 public class CustomerManager {
54
55     public void setData(Goods[] goods, Customer[] customers) {
56
57     }
58
59     public void showAllCustomers() {
60
61     }
62
63     public void addCustomer() {
64
65     }
66
67     public void modifyCustomer() {
68
69     }
70
71     public void queryCustomer() {
72
73     }
74
75 }
76
```

* 茶叶 结 算

* 购物结算

* 消费清单

```
1  **
2      * 5 显示亮哥茶城购物管理系统的结账菜单
3      */
4      public void showSettlementMenu() {
5          PayManager payManager=new PayManager();
6          // 设置数据
7          payManager.setData(goods,customers);
8          // 实现购物结算以及输出购物小票
9          payManager.settlement();
10     }
11
12
13     package com.shopping.lg.manager;
14
15     import com.shopping.lg.bean.Customer;
16     import com.shopping.lg.bean.Goods;
17
18     public class PayManager {
19
20         public void setData(Goods[] goods, Customer[] customers) {
21
22         }
23
24         public void settlement() {
25
26         }
27
28     }
29
```

* 回馈

* 幸运大回馈

* 抽奖

* 生日问候

```
1  /**
2   * 4 显示亮哥茶城购物管理系统的回馈菜单
3   */
4  public void showTrueFeedBackMenu() {
5      System.out.println("亮哥茶城购物管理系统 > 真情回馈\n");
6      System.out.println("* * * * *");
7      System.out.println("\t\t\t\t\t 1. 幸 运 大 回 馈\n");
8      System.out.println("\t\t\t\t\t 2. 抽 奖\n");
9      System.out.println("\t\t\t\t\t 3. 生 日 问 候\n");
10     System.out.println("* * * * *");
11     System.out.print("请选择,输入数字或按'n'返回上一级菜单:");
12     Scanner scanner=new Scanner(System.in);
13     boolean con=true;
14     do {
15         String command = scanner.next();
16         // 创建礼品管理者
17         FeedBackManager gm=new FeedBackManager();
18         // 设置礼品数据
19         gm.setData(goods,customers);
20         switch (command) {
21             case "1":
22                 gm.sendBigLuckToCust();
23                 break;
24             case "2":
25                 gm.sendLuckyToCust();
26                 break;
27             case "3":
28                 gm.sendBirthToCust();
29                 break;
30             case "n":
31                 showMainMenu();
32                 break;
33             default:
34                 System.out.println("输入错误, 请重新输入数字: ");
35                 con = false;
36                 break;
37     }
```

```

38         }while(!con);
39         scanner.close();
40     }
41
42     package com.shopping.lg.manager;
43
44     import com.shopping.lg.bean.Customer;
45     import com.shopping.lg.bean.Goods;
46
47     public class FeedBackManager {
48
49         public void setData(Goods[] goods, Customer[] customers) {
50
51         }
52
53         public void sendBigLuckToCust() {
54
55         }
56
57         public void sendLuckyToCust() {
58
59         }
60
61         public void sendBirthToCust() {
62
63         }
64
65     }
66

```

* 注 销

* 掌握茶友管理者编写

* 茶友管理者数据声明

```

1  // 商品数据
2     public Goods[] goods = new Goods[100];
3     // 用户数据
4     public Customer[] customers = new Customer[100];

```

```

5
6     public void setData(Goods[] goods, Customer[] customers) {
7         this.customers = customers;
8         this.goods = goods;
9     }

```

* 返回上一级菜单

```

1 // 返回上级菜单
2     public void returnLastMenu() {
3         System.out.print("\n\n请按'n'返回上一级菜单:");
4         boolean con = true;
5         Scanner scanner = new Scanner(System.in);
6         do {
7             String command = scanner.next();
8             if ("n".equals(command)) {
9                 Menu menu = new Menu();
10                menu.setData(goods, customers);
11                // 用户菜单
12                menu.showCustMenu();
13            } else {
14                System.out.print("输入错误, 请重新'n'返回上一级菜单: ");
15                con = false;
16            }
17        } while (!con);
18    }

```

* 显示所有茶友信息

```

1 public void showAllCustomers() {
2     System.out.println("亮哥茶城购物管理系统 > 茶友信息管理 > 显示茶友信息\n\n");
3     System.out.println("    茶友号                生日                积分                ");
4     System.out.println("-----|-----|-----");
5     for (int i = 0; i < customers.length; i++) {
6         if (customers[i].id == 0) {
7             break; // 茶友信息已经显示完毕
8         }

```

```
9          // 打印客户信息
10         System.out.println(customers[i].id + "\t\t" + customers[i].birthday
11     }
12
13     // 返回上一级菜单
14     returnLastMenu();
15 }
```

*添加茶友信息

```
1 public void addCustomer() {
2     System.out.println("亮哥茶城购物管理系统> 茶友信息管理 > 添加茶友信息");
3     String con = "n";
4     // 确定插入茶友位置
5     int index = -1;
6     for (int i = 0; i < customers.length; i++) {
7         if (customers[i].id == 0) {
8             index = i;
9             break;
10        }
11    }
12    // 循环录入茶友信息
13    do {
14        Scanner scanner = new Scanner(System.in);
15        System.out.print("请输入茶友号(<5位整数>): ");
16        int id = scanner.nextInt();
17        System.out.print("请输入茶友生日 (月/日<用两位数表示>): ");
18        String birthday = scanner.next();
19        System.out.print("请输入积分: ");
20        int score = scanner.nextInt();
21
22        // 茶友号无效则跳出
23        if (id < 10000) {
24            System.out.println("茶友号" + id + "是无效茶友号!");
25            System.out.println("录入信息失败\n");
26            System.out.println("继续添加茶友吗? (y/n) ");
27            con = scanner.next();
28            continue;
29        }
```



```

30         // 添加茶友
31
32         customers[index].id = id;
33         customers[index].birthday = birthday;
34         customers[index].score = score;
35         index++; // 注意index要加一
36         System.out.println("新茶友添加成功!");
37         System.out.println("继续添加茶友吗? (y/n)");
38         con = scanner.next();
39     } while ("y".equalsIgnoreCase(con));
40     // 返回上一级菜单
41     returnLastMenu();
42 }

```

* 修改茶友信息

```

1 public void modifyCustomer() {
2     System.out.println("亮哥茶城购物管理系统 > 茶友信息管理 > 修改茶友信息");
3     System.out.print("请输入茶友号: ");
4     Scanner scanner = new Scanner(System.in);
5     int id = scanner.nextInt();
6     System.out.println("   茶友号           生日           积分           ");
7     System.out.println("-----|-----|-----");
8     int index = -1;
9     for (int i = 0; i < customers.length; i++) {
10         if (customers[i].id == id) {
11             System.out.println(customers[i].id + "\t\t" + customers[i].birt
12             index = i;
13             break;
14         }
15     }
16
17     if (index != -1) {
18         while (true) {
19             System.out.println("* * * * *");
20             System.out.println("\t\t\t\t1.修改茶友生日.\n");
21             System.out.println("\t\t\t\t2.修改茶友积分.\n");
22             System.out.println("* * * * *");
23             System.out.print("请选择, 输入数字: ");

```

```

24         switch (scanner.nextInt()) {
25             case 1:
26                 System.out.print("请输入修改后的生日: ");
27                 customers[index].birthday = scanner.next();
28                 System.out.println("生日信息已更改!");
29                 break;
30             case 2:
31                 System.out.print("请输入修改后的茶友积分: ");
32                 customers[index].score = scanner.nextInt();
33                 System.out.println("茶友积分已更改!");
34                 break;
35         }
36
37         System.out.println("是否修改其他属性(y/n):");
38         String flag = scanner.next();
39         if ("n".equalsIgnoreCase(flag))
40             break;
41     }
42 } else {
43     System.out.println("抱歉, 没有你查询的茶友。");
44 }
45 // 返回上一级菜单
46 returnLastMenu();
47 }

```

* 查询茶友信息

```

1 public void queryCustomer() {
2     System.out.println("亮哥茶城购物管理系统 > 茶友信息管理 > 查询茶友信息\\n");
3     String con = "y";
4     Scanner scanner = new Scanner(System.in);
5     while ("y".equals(con)) {
6         System.out.print("请输入茶友号: ");
7         int id = scanner.nextInt();
8         // 查询id是否存在, 假如存在打印用户信息, 否则提示没有此用户信息
9         boolean isExitUser = false;
10        for (int i = 0; i < customers.length; i++) {
11            if (customers[i].id == id) {
12                // 表示存在此用户, 打印用户资料

```

```

13         System.out.println(customers[i].id + "\t\t" + customers[i].
14             isExitUser = true;
15             break;
16         }
17     }
18     if (!isExitUser) {
19         System.out.println("抱歉，没有你查询的茶友信息。");
20     }
21     // 提示是否要继续查询
22     System.out.print("\n要继续查询吗 (y/n) :");
23     con = scanner.next();
24 }
25 // 返回上一级菜单
26 returnLastMenu();
27 }

```

* 掌握反馈管理者编写

* 反馈管理者数据的声明

```

1     // 商品数据
2     public Goods[] goods = new Goods[100];
3     // 用户数据
4     public Customer[] customers = new Customer[100];
5
6     // 设置数据
7     public void setData(Goods[] goods, Customer[] customers) {
8         this.goods = goods;
9         this.customers = customers;
10    }

```

* 返回上一级菜单

```

1  /**
2      * 返回上一级菜单
3      */
4  public void returnLastMenu() {
5      System.out.print("\n\n请按'n'返回上一级菜单:");
6      Scanner scanner = new Scanner(System.in);
7      boolean con = true;
8      do {
9          if (scanner.next().equals("n")) {
10             Menu menu = new Menu();
11             menu.setData(goods, customers);
12             menu.showTrueFeedBackMenu();
13         } else {
14             System.out.print("输入错误, 请重新'n'返回上一级菜单: ");
15             con = false;
16         }
17     } while (!con);
18 }

```

* 幸运大回馈

```

1  public void sendBigLuckToCust() {
2      System.out.println("亮哥茶城购物管理系统 > 幸运大回馈\n\n");
3      int index = 0;
4      int max = customers[0].score;
5      // 假定积分各不相同
6      for (int i = 0; i < customers.length; i++) {
7          if (customers[i].score == 0) {
8              break; // 数组后面为空用户
9          }
10         // 求最大积分的客户
11         if (customers[i].score > max) {
12             max = customers[i].score;
13             index = i;
14         }
15     }
16     System.out.println("具有最高积分的茶友是: " + customers[index].id + "\t"
17         + customers[index].score);

```

```

18 // 创建笔记本电脑对象
19 Gift iphone = new Gift();
20 iphone.name = "Iphone9";
21 iphone.price = 9999;
22 System.out.print("恭喜! 获赠礼品: ");
23 System.out.println(iphone);
24 // 返回上一级菜单
25 returnLastMenu();
26 }

```

* 抽奖

```

1 public void sendLuckyToCust() {
2     System.out.println("亮哥茶城购物管理系统 > 幸运抽奖\n\n");
3     System.out.print("是否开始 (y/n): ");
4     Scanner scanner = new Scanner(System.in);
5     if(scanner.next().equals("y")){
6         int random = (int)(Math.random()* 10);
7         int baiwei; //百位
8         boolean isAvailable = false;
9         String list = "";
10        for(int i = 0; i< customers.length; i++){
11            if(customers[i].id==0){
12                break;
13            }
14            // 10001/100---->100%10
15            // 88866 ----> 88866/100 ---->888%10---->8
16            baiwei = customers[i].score / 100 % 10;
17            if(baiwei == random){
18                list = list + customers[i].id+ "\t";
19                isAvailable = true;
20            }
21        }
22        if(isAvailable){
23            System.out.println("幸运客户获赠华为荣耀10: " + list);
24        }else{
25            System.out.println("无幸运客户。");
26        }
27    }

```

```

28         //返回上一级菜单
29         returnLastMenu();
30     }

```

* 生日问候

```

1  public void sendBirthToCust() {
2      System.out.println("亮哥茶城购物管理系统 > 生日问候\n\n");
3      System.out.print("请输入今天的日期(月/日<用两位表示>): ");
4      Scanner scanner = new Scanner(System.in);
5      String date = scanner.next();
6      System.out.println(date);
7      String no = "";
8      boolean isAvailable = false;
9      for(int i = 0; i < customers.length; i++){
10         if(customers[i].birthday!=null && customers[i].birthday.equals(date)
11             no = no + customers[i].id + "\n";
12             isAvailable = true;
13         }
14     }
15     if(isAvailable){
16         System.out.println("过生日的茶友是: ");
17         System.out.println(no);
18         System.out.println("恭喜! 获赠小米音响一个! ");
19     }else{
20         System.out.println("今天没有过生日的茶友!");
21     }
22
23     //返回上一级菜单
24     returnLastMenu();
25 }

```

* 掌握结算管理者编写

* 结算管理者数据声明

```

1 // 商品数据
2     public Goods[] goods = new Goods[100];
3     // 用户数据
4     public Customer[] customers = new Customer[100];
5
6     // 设置数据
7     public void setData(Goods[] goods, Customer[] customers) {
8         this.goods = goods;
9         this.customers = customers;
10    }

```

* 购物结算并打印消费清单

```

1 // 实现购物结算以及输出购物小票
2     public void settlement() {
3         int curCustNo; // 客户号
4         int goodsNo = 0; // 商品编号
5         double price; // 商品价格
6         String name;
7         int count; // 购入数量
8         String choice;
9         String goodsList = ""; // 购物清单
10        double total = 0; // 购物总金额
11        double finalPay = 0; // 打折后需付款
12        double payment; // 实际交费金额
13        System.out.println("亮哥茶城购物管理系统 > 购物结算\n\n");
14        // 打印产品清单
15        System.out.println("*****");
16        System.out.println("请选择购买的商品编号: ");
17        for (int i = 0, p = 0; i < goods.length && null != goods[i].name; i++)
18            p++;
19        System.out.println(p + ": " + goods[i].name + "\t");
20    }
21    System.out.println("*****\n");
22    /* 进行购入结算系统 */
23    Scanner input = new Scanner(System.in);
24    System.out.print("\t请输入茶友号: ");

```

```

25     curCustNo = input.nextInt();
26     double discount = getDiscount(curCustNo, customers);
27     if (discount == -1) {
28         System.out.println("茶友号输入错误。");
29     } else {
30
31         do {
32             System.out.print("\t请输入商品编号: "); // 数组下标+1即产品编号
33             goodsNo = input.nextInt();
34             System.out.print("\t请输入数目: ");
35             count = input.nextInt();
36             // 查询单价
37             price = goods[goodsNo - 1].price;
38             name = goods[goodsNo - 1].name;
39             total = total + price * count;
40             // 连接购物清单
41             goodsList = goodsList + "\n" + name + "\t" + "¥" + price + "\t"
42                 + (price * count) + "\t";
43             System.out.print("\t是否继续 (y/n) ");
44             choice = input.next();
45         } while (choice.equals("y"));
46         // 计算消费总金额
47         finalPay = total * discount;
48         // 打印消费清单
49         System.out.println("\n");
50         System.out.println("*****消费清单*****");
51         System.out.println("物品\t\t" + "单价\t\t" + "个数\t\t" + "金额\t");
52         System.out.print(goodsList);
53         System.out.println("\n折扣: \t" + discount);
54         System.out.println("金额总计:\t" + "¥" + finalPay);
55         System.out.print("实际交费:\t¥");
56         payment = input.nextDouble();
57         System.out.println("找钱:\t" + "¥" + (payment - finalPay));
58         // 计算获得的积分:
59         int score = (int) finalPay / 100 * 3;
60         // 更改茶友积分
61         for (int i = 0; i < customers.length; i++) {
62             if (customers[i].id == curCustNo) {
63                 customers[i].score = customers[i].score + score;
64                 System.out.println("本次购物所获的积分是: " + score);

```



```
65         break;
66     }
67 }
68 }
69 // 返回上一级菜单
70 System.out.print("\n请'n'返回上一级菜单:");
71 if (input.next().equals("n")) {
72     Menu menu = new Menu();
73     menu.setData(goods, customers);
74     menu.showMainMenu();
75 }
76 }
77
78 /**
79  * 计算客户的折扣数目
80  */
81 public double getDiscount(int curCustNo, Customer[] customers) {
82     double discount;
83     int index = -1;
84     for (int i = 0; i < customers.length; i++) {
85         if (curCustNo == customers[i].id) {
86             index = i;
87             break;
88         }
89     }
90
91     if (index == -1) { // 如果茶友号不存在
92         discount = -1;
93
94     } else {
95         // 判断折扣
96         int curscore = customers[index].score;
97         if (curscore < 1000) {
98             discount = 0.95;
99         } else if (1000 <= curscore && curscore < 2000) {
100             discount = 0.9;
101         } else if (2000 <= curscore && curscore < 3000) {
102             discount = 0.85;
103         } else if (3000 <= curscore && curscore < 4000) {
104             discount = 0.8;
```

```

105         } else if (4000 <= curscore && curscore < 6000) {
106             discount = 0.75;
107         } else if (6000 <= curscore && curscore < 8000) {
108             discount = 0.7;
109         } else {
110             discount = 0.6;
111         }
112     }
113     return discount;
114
115 }

```

* 掌握茶城客户端编写

```

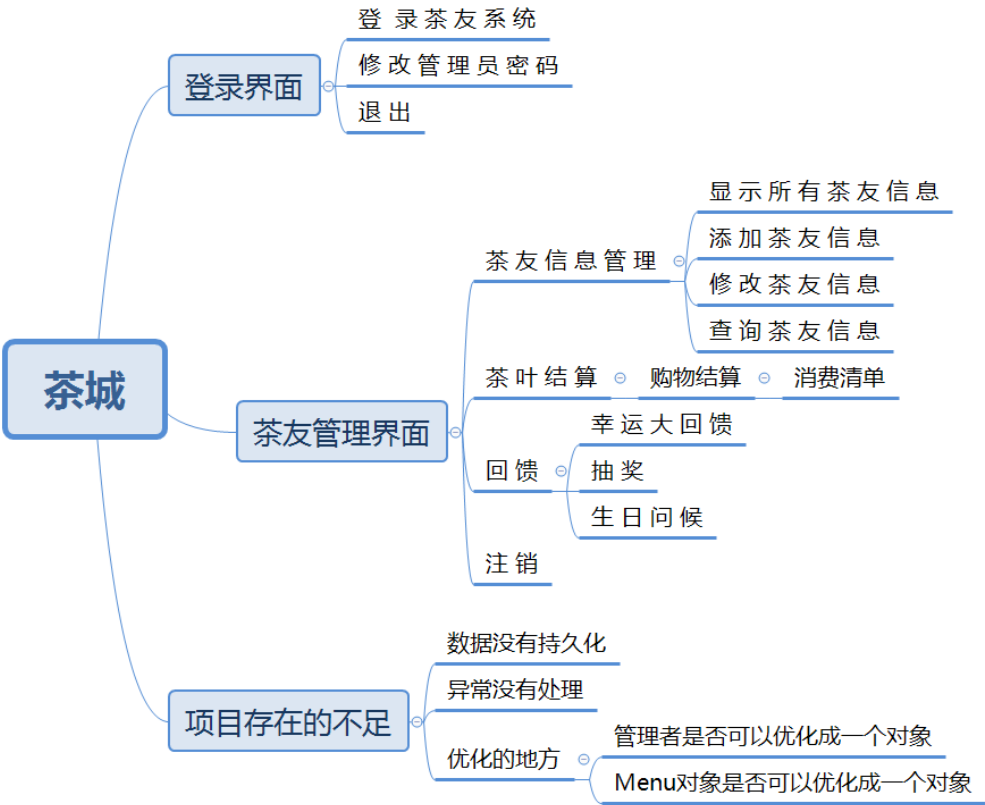
1 package com.shopping.lg.util;
2 import java.util.*;
3 public class LoginUtils {
4     /**
5      * 验证管理员的用户名和密码是否相等
6      */
7     public boolean verify(String username, String password){
8         System.out.print("请输入用户名: ");
9         Scanner input = new Scanner(System.in);
10        String name = input.next();
11        System.out.print("请输入密码: ");
12        input = new Scanner(System.in);
13        String psw = input.next();
14        if(name.equals(username) && password.equals(psw)){
15            return true;
16        }else{
17            return false;
18        }
19    }
20 }
21
22
23

```

```
24 package com.shopping.lg.cleint;
25 import java.util.Scanner;
26
27 import com.shopping.lg.db.DB;
28 import com.shopping.lg.ui.Menu;
29 import com.shopping.lg.util.LoginUtils;
30
31 public class ShoppingClient {
32     /**
33      * 亮哥茶城购物管理系统入口
34      *
35      */
36     public static void main(String[] args) {
37         /*出始化商场的商品和客户信息*/
38         DB db = new DB();
39         /*进入系统*/
40         Menu menu = new Menu();
41         menu.setData(db.goods, db.customers);
42         menu.showLoginMenu();
43         /*菜单选择*/
44         boolean con = true;
45         while(con){
46             Scanner input = new Scanner(System.in);
47             int choice = input.nextInt();
48             LoginUtils pv = new LoginUtils();
49             switch(choice){
50                 case 1:
51                     /*密码验证:超过3次输入,退出*/
52                     for(int i = 3; i>=1; i--){
53                         if(pv.verify(db.manager.name, db.manager.password)){
54                             menu.showMainMenu();
55                             break;
56                         }else if(i!=1){
57                             System.out.println("\n用户名和密码不匹配,请重新输入: ");
58                         }else{
59                             System.out.println("\n您输入密码错误超过三次,请联系管理员!");
60                             con = false;
61                         }
62                     }
63                     break;
```

```
64         case 2:
65             if(pv.verify(db.manager.name, db.manager.password)){
66                 System.out.print("请输入新的用户名: ");
67                 String name = input.next();
68                 System.out.print("请输入新的密码: ");
69                 String pwd = input.next();
70
71                 System.out.print("请再次输入新的密码: ");
72                 String repwd = input.next();
73                 if(pwd.equals(repwd)){
74                     db.manager.name = name;
75                     db.manager.password = pwd;
76                     System.out.println("用户名和密码已更改! ");
77                 }
78                 else{
79                     System.out.println("两次密码不一致。");
80                 }
81
82                 System.out.println("\n请选择, 输入数字: ");
83             }else{
84                 System.out.println("抱歉, 用户名和密码不正确! ");
85                 con = false;
86             }
87             break;
88         case 3:
89             System.out.println("感谢您的使用! ");
90             con=false;
91             break;
92         default:
93             System.out.print("\n输入有误! 请重新选择, 输入数字: ");
94     }
95     if(!con){
96         break;
97     }
98 }
99 }
100 }
101
```

* 项目存在的不足



* 瀑布开发

* 敏捷开发（里程碑）