Sample Input / Output 1
Welcome to table management system! Please initialize your tables first.
Please enter the total number of tables: 10
Decide the number of tables whose size is 10: 2
Seats remaining: 80
Decide the number of tables whose size is 8: 2
Seats remaining: 64
Decide the number of tables whose size is 6: 2
Seats remaining: 52
Decide the number of tables whose size is 4: 2
Seats remaining: 44
Decide the number of tables whose size is 2: 2
Seats remaining: 40
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
1
Table 1 --- Size: 10 Available
Table 2 --- Size: 10 Available
Table 3 --- Size: 8 Available
Table 4 --- Size: 8 Available
Table 5 --- Size: 6 Available
Table 6 --- Size: 6 Available
Table 7 --- Size: 4 Available
Table 8 --- Size: 4 Available
Table 9 --- Size: 2 Available
Table 10 --- Size: 2 Available
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership

5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
7
Please enter the total number of tables: 10
Decide the number of tables whose size is 10: 10
Seats remaining: 0
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
1
Table 1 --- Size: 10 Available
Table 2 --- Size: 10 Available
Table 3 --- Size: 10 Available
Table 4 --- Size: 10 Available
Table 5 --- Size: 10 Available
Table 6 --- Size: 10 Available
Table 7 --- Size: 10 Available
Table 8 --- Size: 10 Available
Table 9 --- Size: 10 Available
Table 10 --- Size: 10 Available
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
0
Program Ends.
Sample Input / Output 2

Welcome to table management system! Please initialize your
tables first.
Please enter the total number of tables: 10
Decide the number of tables whose size is 10: 2
Seats remaining: 80
Decide the number of tables whose size is 8: 2
Seats remaining: 64
Decide the number of tables whose size is 6: 2
Seats remaining: 52
Decide the number of tables whose size is 4: 2
Seats remaining: 44
Decide the number of tables whose size is 2: 2
Seats remaining: 40
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
2
Table 1 --- Size: 10 Available
Table 2 --- Size: 10 Available
Table 3 --- Size: 8 Available
Table 4 --- Size: 8 Available
Table 5 --- Size: 6 Available
Table 6 --- Size: 6 Available
Table 7 --- Size: 4 Available
Table 8 --- Size: 4 Available
Table 9 --- Size: 2 Available
Table 10 --- Size: 2 Available
Please select the table you want to manage: 1
Please select the number of your command:
  1.Occupy
  2.Reserve
1
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables

2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
1
Table 1 --- Size: 10 Occupied Bill Price: 0
Table 2 --- Size: 10 Available
Table 3 --- Size: 8 Available
Table 4 --- Size: 8 Available
Table 5 --- Size: 6 Available
Table 6 --- Size: 6 Available
Table 7 --- Size: 4 Available
Table 8 --- Size: 4 Available
Table 9 --- Size: 2 Available
Table 10 --- Size: 2 Available
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
8
Table 1 occupied for 5 seconds.
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
6
Table 1 --- Size: 10 Occupied Bill Price: 0

Please select the table you want to manage: 1
Please select your option:
  1.Manage Order
  2.Check
1
Current bill price: 0
Select your option:
  1.Add a order
  2.Delete an order
1
Total price added: 1200
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
6
Table 1 --- Size: 10 Occupied Bill Price: 1200
Please select the table you want to manage: 1
Please select your option:
  1.Manage Order
  2.Check
2
Are you a member? 0.Yes 1.No
0
Please enter member's name:
CM
You are a member. Your discounted price is: 960
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables

```
  8.Check Occupation Time
5
Please enter your desired size: 8
Table 3 is currently available.
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
0
Program Ends.
```

Sample Input / Output 3

```
Welcome to table management system! Please initialize your
tables first.
Please enter the total number of tables: 10
Decide the number of tables whose size is 10: 2
Seats remaining: 80
Decide the number of tables whose size is 8: 2
Seats remaining: 64
Decide the number of tables whose size is 6: 2
Seats remaining: 52
Decide the number of tables whose size is 4: 2
Seats remaining: 44
Decide the number of tables whose size is 2: 2
Seats remaining: 40
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
3
Please select your option:
```

```
  1.Add one customer to waiting line;
  2.Show the count of people waiting before certain customer;
  3.Delete one customer from waiting line.
1
Your index number is 1
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
Please select your option:
  1.Add one customer to waiting line;
  2.Show the count of people waiting before certain customer;
  3.Delete one customer from waiting line.
2
Please input the customer's index you want to look for: 2
1 people waiting before you.
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
0
Program Ends.
```

Sample Input / Output 4
```
Welcome to table management system! Please initialize your
tables first.
Please enter the total number of tables: 10
Decide the number of tables whose size is 10: 2
Seats remaining: 80
Decide the number of tables whose size is 8: 2
Seats remaining: 64
```

```
Decide the number of tables whose size is 6: 2
Seats remaining: 52
Decide the number of tables whose size is 4: 2
Seats remaining: 44
Decide the number of tables whose size is 2: 2
Seats remaining: 40
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
4
Please select your option:
  1.Register a member
  2.Show one's membership information
1
Please enter member's name:
Ollie
Please enter member's gender (M / F):
M
Please enter member's phone number:
51230845
***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
4
Please select your option:
  1.Register a member
  2.Show one's membership information
2
```

Please enter member's name:
Ollie
Ollie M 51230845

***************** Table Management System *****************
Please choose your option:
  0.Exit
  1.Display Tables
  2.Manage Tables
  3.Manage Queue
  4.Manage Membership
  5.Suggest Vacant Table
  6.Manage Orders
  7.Reset Tables
  8.Check Occupation Time
0
Program Ends.