

8. Write a program to generate a menu for a takeout restaurant. The menu contains food items with the corresponding prices. The following declarations may help you get started. The user is allowed to enter any food items and the order with the total cost is displayed.

```
String food[] = { "beef", "chicken", "fish", "rice", "potato", "fries" };  
float price[] = { 2.50f, 2.30f, 3.00f, 0.50f, 0.60f, 1.00f };
```

9. Write a program to allow the user to enter a list of letters from A to E. Save the input in an array. Output the number of times each letter occurs on the list.

Sample output:

```
A -> 5  
B -> 2  
C -> 0  
D -> 1  
E -> 3
```

10. Write a program to allow the user to enter a list of even integers from 1 through 10. Save the input in an array. Output the number of times each number occurs on the list.
11. Write a program to generate 5 random integers in an array. Output the random number and its corresponding number with all zero digits removed.
12. Write a program to generate 6 random integers and save them in an array. For each number, if the units digit is a 0, 1 or 2, output group ONE; if it is a 3, 4, 5 output group TWO; if it is a 6, 7, 8 or 9 output group THREE.
- 13.(a) State the output. Choose your input value so that both the if part and the else part are tested.  
(b) This program illustrates the use of the linear search algorithm. Search the Net to find out how the search works. Briefly explain the algorithm in your own words. What are the advantages and disadvantages of using such a search?

```
String homeforms[] = { "12A02", "11B05", "09F12", "10D13", "09E04"};  
int len = homeforms.length;  
int i;  
System.out.print("Input-> " + str[0] + "\t");  
for ( i = 0; i < len; i++)  
    if (str[0].equals(homeforms[i]))  
        break;  
if (i == len)  
    System.out.println("not found on list!");  
else  
    System.out.println("found on list!");
```