PhoneBook Manipulation

Airone mobile services needs to store their customer details in the company portal. The details are customer's first and last name, phone number, and email address. Help the company develop an application to maintain the details of their customer systematically.   
  
You are provided with a class Contact with the following attributes as private.

String firstName

String lastName

long  phoneNumber

String emailId

A 4 argument constructor and appropriate setters and getters to store and retrieve the details are also provided.

Create a class PhoneBook with a private attribute

List<Contact> phoneBook = new ArrayList<Contact>();

Write the getters and setters.

Write the following methods in the PhoneBook class.

public void addContact(Contact contactObj) – This method should add the contact object to the phoneBook list.

public List<Contact> viewAllContacts() – This method should return the list of all contacts available.

public Contact viewContactGivenPhone(long phoneNumber) -  This method should return the contact details which has the phoneNumber given as parameter.

public boolean removeContact(long phoneNumber) -  This method should remove the contact details which has the phoneNumber given as parameter.  If removed return true.  Else if the phone number is not available return false.

Write a class Main with the main method.  Create the menu as shown in the Sample Input and Output and invoke the corresponding methods as per the choice provided.

**Sample Input and Output 1:**

Menu

1.Add Contact

2.Display all contacts

3.Search contact by phone

4.Remove contact

5.Exit

Enter your choice: 1

Add a Contact:

Enter the First Name: John

Enter the Last Name: Michael

Enter the Phone No.: 9787878900

Enter the Email: [John@gmail.com](mailto:John@gmail.com)

Menu

1.Add Contact

2.Display all contacts

3.Search contact by phone

4.Remove contact

5.Exit

Enter your choice: 1

Add a Contact:

First Name: Jhonty

Last Name: Rhodes

Phone No.: 9787888900

Email: [Jhonty@gmail.com](mailto:Jhonty@gmail.com)

Menu

1.Add Contact

2.Display all contacts

3.Search contact by phone

4.Remove contact

5.Exit

Enter your choice: 2

The contacts in the List are:

First Name: John

Last Name: Michael

Phone No.: 9787878900

Email: [John@gmail.com](mailto:John@gmail.com)

First Name: Jhonty

Last Name: Rhodes

Phone No.: 9787888900

Email: [Jhonty@gmail.com](mailto:Jhonty@gmail.com)

Menu

1.Add Contact

2.Display all contacts

3.Search contact by phone

4.Remove contact

5.Exit

Enter your choice: 3

Enter the Phone number to search contact:9787888900

The contact is:

First Name: Jhonty

Last Name: Rhodes

Phone No.: 9787888900

Email: [Jhonty@gmail.com](mailto:Jhonty@gmail.com)

Menu

1.Add Contact

2.Display all contacts

3.Search contact by phone

4.Remove contact

5.Exit

Enter your choice: 4

Enter the Phone number to remove :9787888900

Do you want to remove the contact (Y/N): Y

The contact is successfully deleted.

Menu

1.Add Contact

2.Display all contacts

3.Search contact by phone

4.Remove contact

5.Exit

Enter your choice: 5