**PROGRAM 1)**

**Adder.java**

import java.rmi.\*;

import java.rmi.server.\*;

public class Adder extends UnicastRemoteObject implements AddServerInterface

{

Adder()throws RemoteException

{

super();

}

public int sum(int a,int b)

{

return a+b;

}

}

**AddServer.java**

import java.rmi.\*;

import java.rmi.registry.\*;

public class AddServer

{

public static void main(String args[])

{

try

{

AddServerInterface addService=new Adder();

Naming.rebind("AddService",addService);

//addService object is hosted with name AddService

}

catch(Exception e)

{

System.out.println(e);

}

}

}

**AddServerInterface.java**

import java.rmi.Remote;

import java.rmi.RemoteException;

import java.rmi.\*;

public interface AddServerInterface extends Remote

{

public int sum(int a,int b) throws RemoteException;

}

**Client.java**

import java.rmi.\*;

public class Client

{

public static void main(String args[])

{

try

{

AddServerInterface st = (AddServerInterface)Naming.lookup("rmi://"+args[0]+"/AddService");

System.out.println(st.sum(25,8));

}

catch(Exception e)

{

System.out.println(e);

}

}

}

**OUTPUT**

F:\>cd RMI

F:\RMI>javac \*.java

F:\RMI>start rmiregister

The system cannot find the file rmiregister.

F:\RMI>start rmiregister

The system cannot find the file rmiregister.

F:\RMI>start rmiregistry

F:\RMI>java Addserver

Error: Could not find or load main class Addserver

F:\RMI>java AddServer

==========================

F:\RMI>java Client 169.254.228.145

33

**PROGRAM 2)**

**Hello.java**

import java.rmi.Remote;

import java.rmi.RemoteException;

// Creating Remote interface for our application

public interface Hello extends Remote

{

void printMsg() throws RemoteException;

}

**ImplExample.java**

import java.rmi.\*;

import java.rmi.server.\*;

// Implementing the remote interface

public class ImplExample extends UnicastRemoteObject implements Hello

{

ImplExample() throws RemoteException

{

super();

}

public void printMsg()

{

System.out.println("This is an example RMI program");

}

}

**Server.java**

//import java.rmi.registry.Registry;

//import java.rmi.registry.LocateRegistry;

//import java.rmi.RemoteException;

//import java.rmi.server.UnicastRemoteObject;

import java.rmi.\*;

import java.rmi.registry.\*;

public class Server

{

public static void main(String args[]) {

try

{

Hello stub = (Hello) new ImplExample();

// Binding the remote object (stub) in the registry

Registry registry = LocateRegistry.createRegistry(5001);

registry.rebind("rmi://localhost/Hello", stub);

System.err.println("Server ready");

}

catch (Exception e)

{

System.err.println("Server exception: " + e.toString());

e.printStackTrace();

}

}

}

**Client.java**

//import java.rmi.registry.LocateRegistry;

//import java.rmi.registry.Registry;

import java.rmi.\*;

import java.rmi.registry.\*;

public class Client

{

public static void main(String[] args)

{

try

{

// Getting the registry

Registry registry = LocateRegistry.getRegistry(5001);

// Looking up the registry for the remote object

Hello stub = (Hello) registry.lookup("rmi://localhost/Hello");

// Calling the remote method using the obtained object

stub.printMsg();

// System.out.println("Remote method invoked");

}

catch (Exception e)

{

System.err.println("Client exception: " + e.toString());

e.printStackTrace();

}

}

}

**OUTPUT**

**F:\RMI-MESSAGE>javac \*.java**

**F:\RMI-MESSAGE>start rmiregistry**

**F:\RMI-MESSAGE>java Server**

**Server ready**

**This is an example RMI program**

**============================**

**F:\>cd RMI-MESSAGE**

**F:\RMI-MESSAGE>java Client 192.168.29.1**

**F:\RMI-MESSAGE>**