

IMPLEMENTATION OF REMOTE COMMAND EXECUTION (RCE)

AIM:-

To implement Remote Command Execution(RCE).

ALGORITHM:-

CLIENT SIDE

1. Establish a connection between the Client and Server.

```
Socket client=new Socket("127.0.0.1",6555);
```

2. Create instances for input and output streams.

```
Print Stream ps=new Print Stream(client.getOutputStream());
```

3. `BufferedReaderbr=newBufferedReader(newInputStreamReader(System.in));`

4. Enter the command in Client Window.

Send the message to its output

```
str=br.readLine();
```

```
ps.println(str);
```

SERVER SIDE

1. Accept the connection request by the client.

```
ServerSocket server=new ServerSocket(6555);
```

```
Sockets=server.accept();
```

2. Get the IP address from its input stream.

```
BufferedReaderbr1=newBufferedReader(newInputStreamReader(s.getInputStream()));
```

```
ip=br1.readLine();
```

3. During runtime execute the process

```
Runtime r=Runtime.getRuntime();
```

```
Process p=r.exec(str);
```

Program:-

CLIENT

```
import java.io.*;
```

```
import java.net.*;
```

```

class clientRCE
{
public static void main(String args[]) throws IOException
{
try
{
String str;
Socket client=new Socket("127.0.0.1",6555);
PrintStream ps=new PrintStream(client.getOutputStream());
BufferedReaderbr=new BufferedReader(new InputStreamReader(System.in));
System.out.println("\t\t\tCLIENT WINDOW\n\n\t\tEnterTheCommand:");
str=br.readLine();
ps.println(str);
}
catch(IOException e)
{
System.out.println("Error"+e); }
}
}

```

SERVER PROGRAM

```

import java.io.*;
import java.net.*;

class serverRCE
{
public static void main(String args[]) throws IOException
{
try
{
String str;
ServerSocket server=new ServerSocket(6555);

```

```

Socket s=server.accept();

BufferedReader br=new BufferedReader(new InputStreamReader(s.getInputStream()));

str=br.readLine();

Runtime r=Runtime.getRuntime();

Process p=r.exec(str);

}

catch(IOException e)

{

System.out.println("Error"+e);

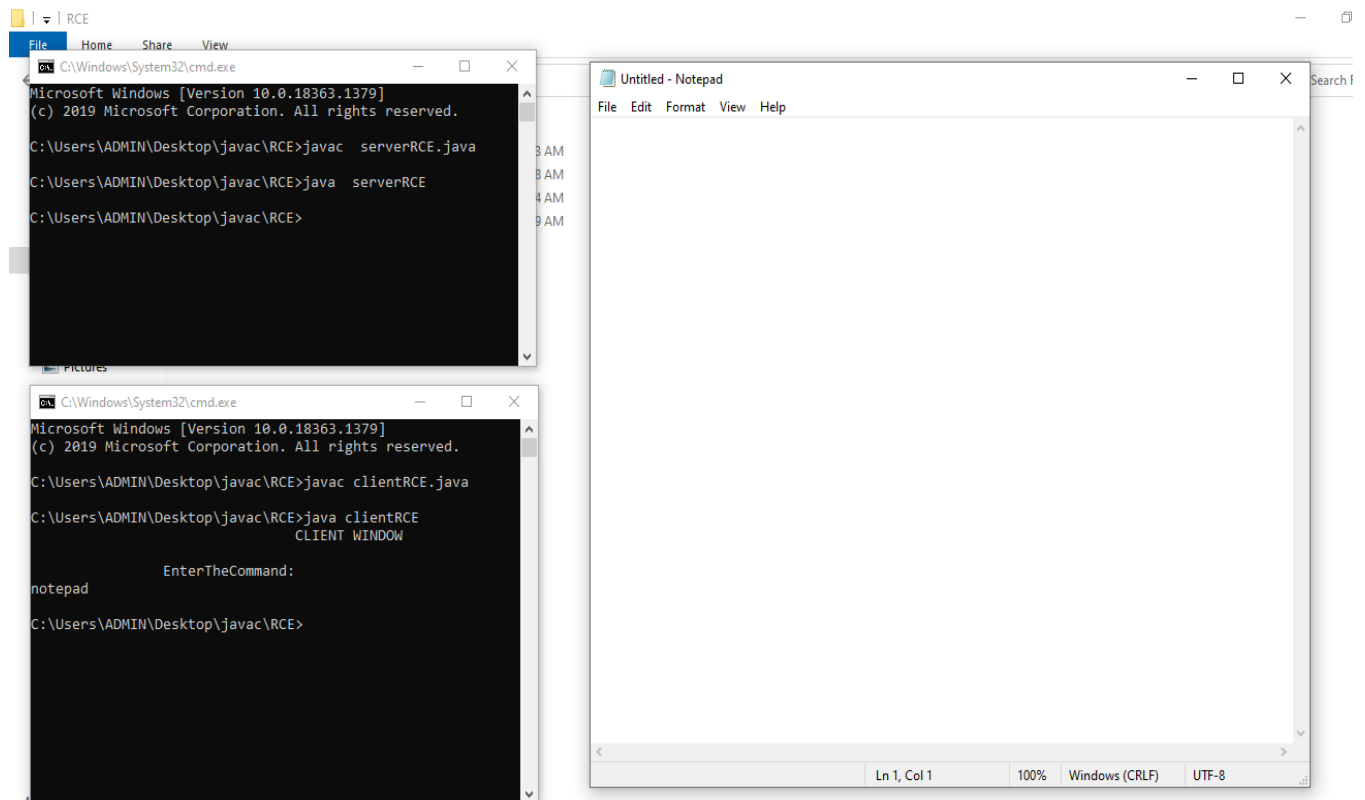
}

}

}

```

OUTPUT:-



RESULT:-

Thus the implementation RCE is done & executed successfully.