**Network Desktop Manager**

**Project Report**

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-Our team

**ABSTRACT**

Network Desktop Manager is our proposed project which provides the complete control on the remote desktop. Whenever the administrator wants to operate the remote system this application provides the requested host desktop to the administrator so that he/she can operate the remote system directly with the system desktop. It also provides some of the features like chatting, desktop sharing, and port scanning.

**Introduction**

Network is to connect two or more computers together with the ability to communicate with each other. Networking is to link two or more computing devices together for the purpose of sharing data.

It provides design, programming, development and operational support for LANs, WANs and other networks. A local area network (LAN) is a group of computers and associated devices that share a common communications line or wireless link.

Desktop Manager can assess the configurations of desktops and determine if they have received the proper updates — a task that is helpful to ensure all desktops are operating properly and securely. Network Desktop Manager manages desktop icons, background image and media message on LAN.

It controls the Desktops within the network and keep desktops clean and tidy. It even allows to add own Media message (video, image or HTML) that can be displayed on the remote Desktops within the network.

Our proposed project is Network Desktop Manager which provides the complete control on the remote desktop. Whenever the administrator wants to operate the remote system this application provides the requested host desktop to the administrator so that he/she can operate the remote system directly with the system desktop. It also provides some of the features like chatting, desktop locking, desktop sharing, and port scanning.

**Basics of Computer Network**

Computer networking is an integral part of computer science education today. Creating practical and compelling student assignments in networking, however, is challenging. This is due to the fact that networking concepts and algorithms often involve many entities or are designed to work in environments that are not readily available for classroom use.

There are many practical considerations in computer networking, however, which may preclude a project’s successful creation and testing in a real environment. Even with a completely dedicated network laboratory in which students are given super-user access, many experiments may not be conducted due to the need for additional nodes at a distance to act as correspondents. Student comments reflect that the experiment’s goals and outcomes are clearer when simulation software is used. Routing algorithm convergence time is another lesson that students can explore through simulation or programming.

**Modules**

**1. Desktop Sharing**

Administrator can directly access the remote system by sharing the requested system desktop. Desktop Sharing is a server application that allows to share current session with a user on another machine, who can use a client to view or even control the desktop. Desktop Sharing lets users call a remote computer to access its shared desktop and applications.With the Desktop sharing we can operate our office computer from our home or viceversa.

**2. Messaging**

Administrator can communicate with the remote systems that are connected With in the local network administrator can communicate publicly or privately.

Messaging is nothing but passing data to and from applications over the network which makes the synchronisation of data simple. Messaging allows users across the network to exchange data in real time. Most commonly, these data consist of typed conversations, but the power of the system lies in its ability to pass other data as well. This could be in the form of audio or video or, as will be presented here, other text data that will allow the two chatting parties to retrieve the same data base record by sending a primary key or keys from one to the other.

**3. IP Port Scanning**

If administrator wants to know the information about how many ports are working on the specified system and what is the port number allotted for the service, how many ports are closed, and how many are open.IP Port Scanner allows for testing whether a remote computer is alive with UDP and testing whether a TCP port is being listened with two types CONNECTS and SYN. IP Port Scanner reverse lookup IP address into hostname and read responses from connected TCP Port.

**Software Requirements**:

Platform : Cisco Packet Tracer

**Configurations and Commands**

1. **REMOTE MACHINE CLI (PC1)**

Packet Tracer PC Command Line 1.0

C:\>ping 192.168.10.2

Pinging 192.168.10.2 with 32 bytes of data:

Request timed out.

Reply from 192.168.10.2: bytes=32 time=12ms TTL=126

Reply from 192.168.10.2: bytes=32 time=4ms TTL=126

Reply from 192.168.10.2: bytes=32 time=12ms TTL=126

Ping statistics for 192.168.10.2:

Packets: Sent = 4, Received = 3, Lost = 1 (25% loss),

Approximate round trip times in milli-seconds:

Minimum = 4ms, Maximum = 12ms, Average = 9ms

C:\>telnet 192.168.10.1

Trying 192.168.10.1 ...Open

User Access Verification

Password:

Router>en

Password:

Router#host

Translating "host"...domain server (255.255.255.255)

% Unknown command or computer name, or unable to find computer address

Router#

Router#hostn

Translating "hostn"...domain server (255.255.255.255)

% Unknown command or computer name, or unable to find computer address

Router#conf ter

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#host

% Incomplete command.

Router(config)#hostname nitish

nitish(config)#^Z

nitish#

[Connection to 192.168.10.1 closed by foreign host]

C:\>

1. **ROUTER\_0\_CLI** :

--- System Configuration Dialog ---

Would you like to enter the initial configuration dialog? [yes/no]:

% Please answer 'yes' or 'no'.

Would you like to enter the initial configuration dialog? [yes/no]: n

Press RETURN to get started!

Router>

Router>en

Router#

Router#conf t

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#int f0/0

Router(config-if)#ip address 192.168.10.1 255.255.255.0

Router(config-if)#no shu

Router(config-if)#

%LINK-5-CHANGED: Interface FastEthernet0/0, changed state to up

%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up

Router(config-if)#

Router(config-if)#

Router(config-if)#

Router(config-if)#int s0/0

Router(config-if)#ip add 10.0.0.1 255.0.0.0

Router(config-if)#no shu

%LINK-5-CHANGED: Interface Serial0/0, changed state to down

Router(config-if)#^Z

Router#

%SYS-5-CONFIG\_I: Configured from console by console

Router#

Router#sh ip int br

Interface IP-Address OK? Method Status Protocol

FastEthernet0/0 192.168.10.1 YES manual up up

Serial0/0 10.0.0.1 YES manual down down

Router#conf t

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#int s0/0

Router(config-if)#clo

% Incomplete command.

Router(config-if)#clock r

% Incomplete command.

Router(config-if)#int s0/0

Router(config-if)#

Router(config-if)#

Router(config-if)#

Router(config-if)#clo

% Incomplete command.

Router(config-if)#clock rate 64000

Router(config-if)#^Z

Router#

%SYS-5-CONFIG\_I: Configured from console by console

Router#

Router#

Router#

Router#sh ip int br

Interface IP-Address OK? Method Status Protocol

FastEthernet0/0 192.168.10.1 YES manual up up

Serial0/0 10.0.0.1 YES manual down down

Router#

%LINK-5-CHANGED: Interface Serial0/0, changed state to up

%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial0/0, changed state to up

Router#

Router#

Router#

Router#conf ter

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#router rip

Router(config-router)#net

% Incomplete command.

Router(config-router)# network 192.168.10.0

Router(config-router)# network 10.0.0.0

Router(config-router)# ^Z

Router#

%SYS-5-CONFIG\_I: Configured from console by console

Router#

Router#

Router#ping 192.168.20.2

Type escape sequence to abort.

Sending 5, 100-byte ICMP Echos to 192.168.20.2, timeout is 2 seconds:

!!!!!

Success rate is 100 percent (5/5), round-trip min/avg/max = 1/2/5 ms

Router#conf ter

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#

Router(config)#line vty 0

Router(config-line)#password 123456

Router(config-line)#^Z

Router#

%SYS-5-CONFIG\_I: Configured from console by console

Router#conf t

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#enable password 123456

Router(config)# ^Z

Router#

%SYS-5-CONFIG\_I: Configured from console by console

Router#

%SYS-5-CONFIG\_I: Configured from console by console

nitish#

1. **ROUTER\_1\_CLI :**

Router>

Router>en

Router#conf t

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#int f0/0

Router(config-if)#ip ad

% Incomplete command.

Router(config-if)#ip address 192.168.20.1 255.255.255.0

Router(config-if)#no shu

Router(config-if)#

%LINK-5-CHANGED: Interface FastEthernet0/0, changed state to up

%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up

Router(config-if)#

Router(config-if)#

Router(config-if)#int s0/0

Router(config-if)#ip add

% Incomplete command.

Router(config-if)#ip address 10.0.0.2 255.0.0.0

Router(config-if)#no shu

Router(config-if)#

%LINK-5-CHANGED: Interface Serial0/0, changed state to up

Router(config-if)#

%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial0/0, changed state to up

^Z

Router#

%SYS-5-CONFIG\_I: Configured from console by console

Router#sh ip int

FastEthernet0/0 is up, line protocol is up (connected)

Internet address is 192.168.20.1/24

Broadcast address is 255.255.255.255

Address determined by setup command

MTU is 1500 bytes

Helper address is not set

Directed broadcast forwarding is disabled

Outgoing access list is not set

Inbound access list is not set

Proxy ARP is enabled

Security level is default

Split horizon is enabled

ICMP redirects are always sent

ICMP unreachables are always sent

ICMP mask replies are never sent

IP fast switching is disabled

IP fast switching on the same interface is disabled

IP Flow switching is disabled

IP Fast switching turbo vector

IP multicast fast switching is disabled

IP multicast distributed fast switching is disabled

Router Discovery is disabled

IP output packet accounting is disabled

IP access violation accounting is disabled

TCP/IP header compression is disabled

RTP/IP header compression is disabled

Probe proxy name replies are disabled

Policy routing is disabled

Network address translation is disabled

BGP Policy Mapping is disabled

Input features: MCI Check

WCCP Redirect outbound is disabled

WCCP Redirect inbound is disabled

WCCP Redirect exclude is disabled

Serial0/0 is up, line protocol is up (connected)

Internet address is 10.0.0.2/8

Broadcast address is 255.255.255.255

Address determined by setup command

MTU is 1500

Helper address is not set

Directed broadcast forwarding is disabled

Outgoing access list is not set

Inbound access list is not set

Proxy ARP is enabled

Security level is default

Split horizon is enabled

ICMP redirects are always sent

ICMP unreachables are always sent

ICMP mask replies are never sent

IP fast switching is disabled

IP fast switching on the same interface is disabled

IP Flow switching is disabled

IP Fast switching turbo vector

IP multicast fast switching is disabled

IP multicast distributed fast switching is disabled

Router Discovery is disabled

IP output packet accounting is disabled

IP access violation accounting is disabled

TCP/IP header compression is disabled

RTP/IP header compression is disabled

Probe proxy name replies are disabled

Policy routing is disabled

Network address translation is disabled

WCCP Redirect outbound is disabled

WCCP Redirect exclude is disabled

BGP Policy Mapping is disabled

Router#

Router#sh ip int bri

Interface IP-Address OK? Method Status Protocol

FastEthernet0/0 192.168.20.1 YES manual up up

Serial0/0 10.0.0.2 YES manual up up

Router# conf t

Enter configuration commands, one per line. End with CNTL/Z.

Router(config)#router rip

Router(config-router)#network 192.168.20.0

Router(config-router)#network 192.168.20.0

Router(config-router)#network 10.0.0.0

Router(config-router)#^Z

Router#

%SYS-5-CONFIG\_I: Configured from console by console

Router#

Router#sh ip route

Codes: C - connected, S - static, I - IGRP, R - RIP, M - mobile, B - BGP

D - EIGRP, EX - EIGRP external, O - OSPF, IA - OSPF inter area

N1 - OSPF NSSA external type 1, N2 - OSPF NSSA external type 2

E1 - OSPF external type 1, E2 - OSPF external type 2, E - EGP

i - IS-IS, L1 - IS-IS level-1, L2 - IS-IS level-2, ia - IS-IS inter area

\* - candidate default, U - per-user static route, o - ODR

P - periodic downloaded static route

Gateway of last resort is not set

C 10.0.0.0/8 is directly connected, Serial0/0

R 192.168.10.0/24 [120/1] via 10.0.0.1, 00:00:09, Serial0/0

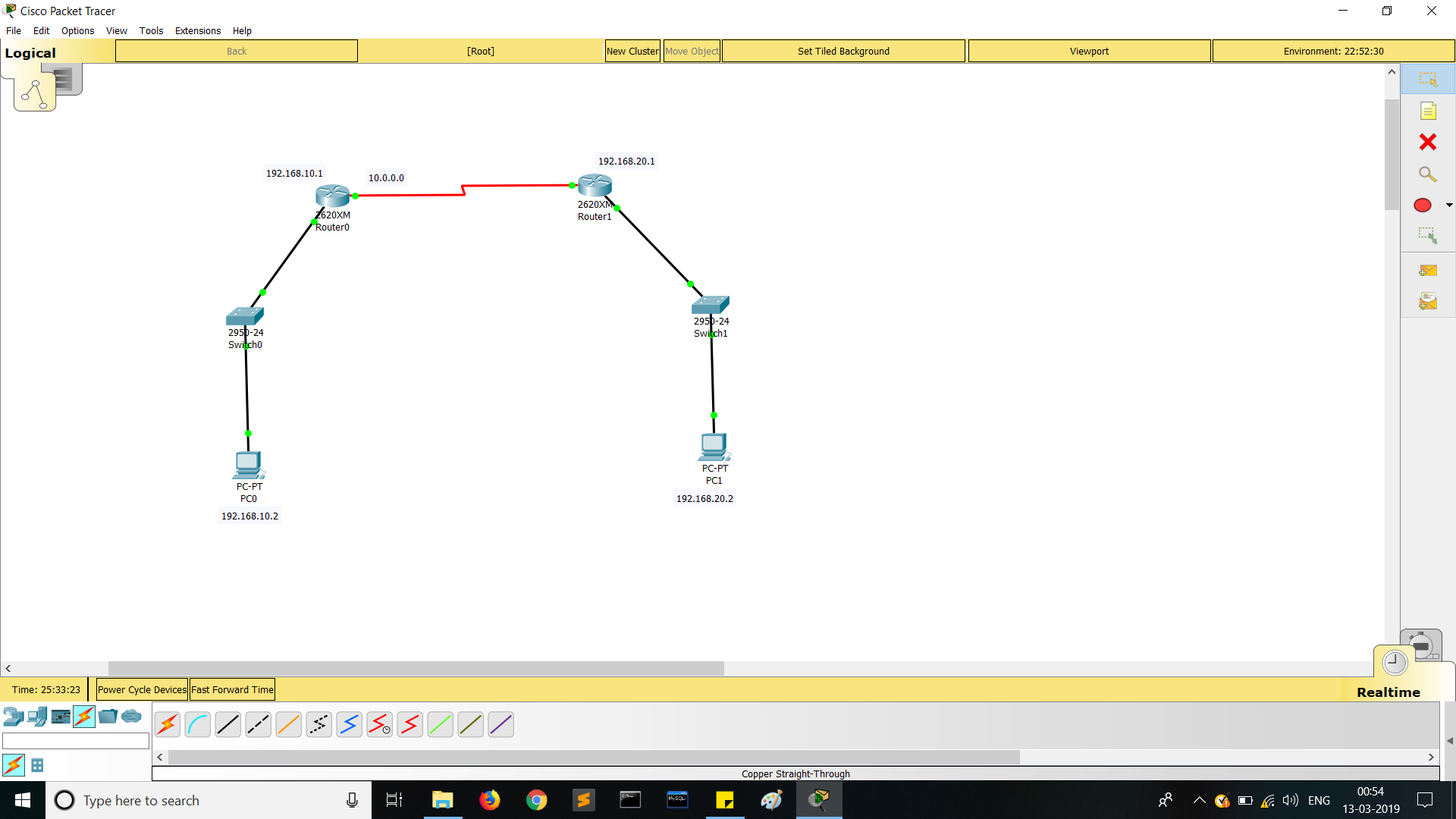
C 192.168.20.0/24 is directly connected, FastEthernet0/0

Router#

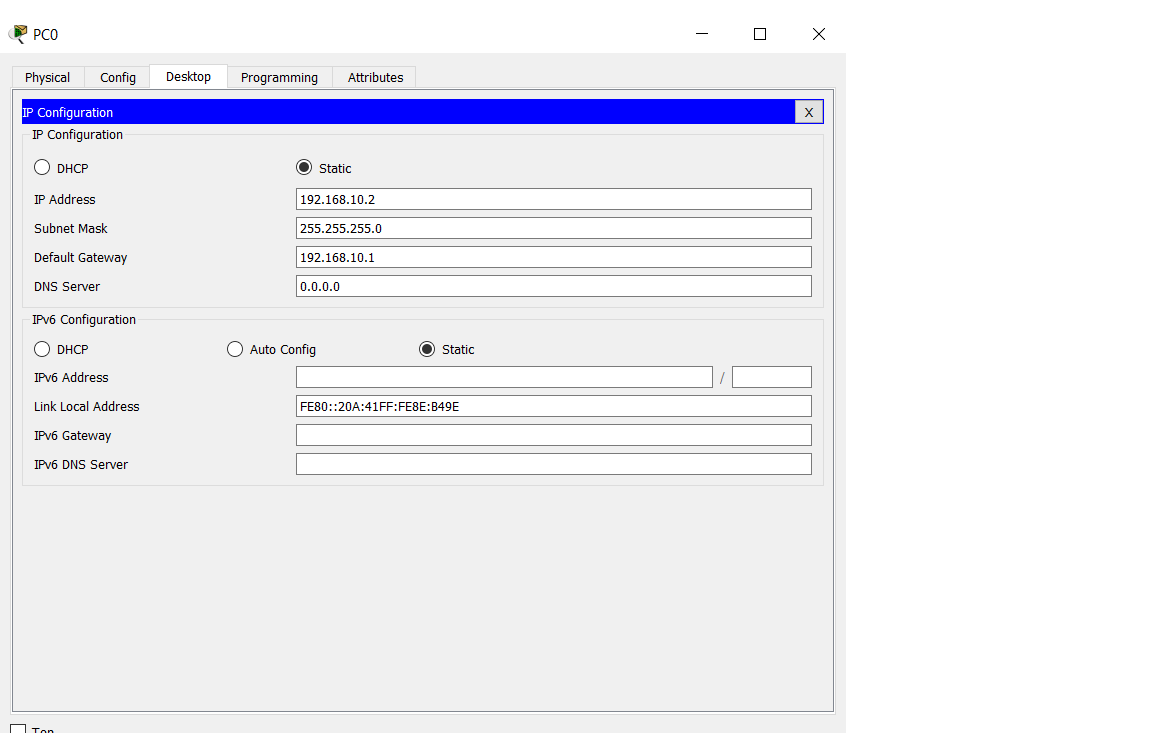
# **Bibliography**

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* [www.researchgate.net](http://www.researchgate.net)
* https://www.netacad.com/courses/packet-tracer

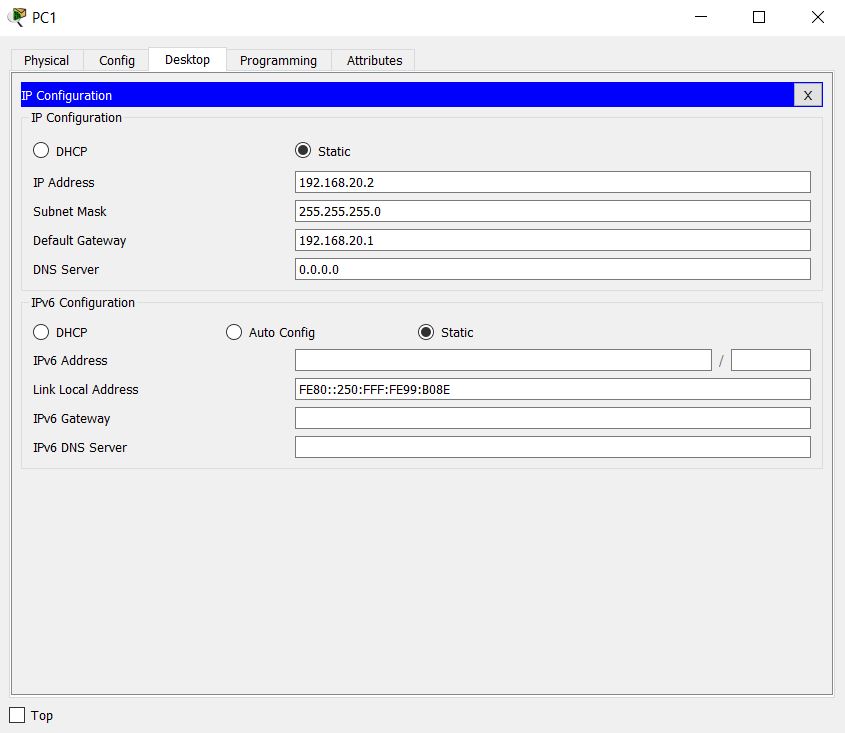
**Network Architecture :**

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**Host Computer IP Configuration :**

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**Remote Computer IP Configuration :**

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