3-3 Project One Stepping Stone: Network Troubleshooting Practice

Joshua Merren

Southern New Hampshire University

CYB-310-13414-M01 Network Defense
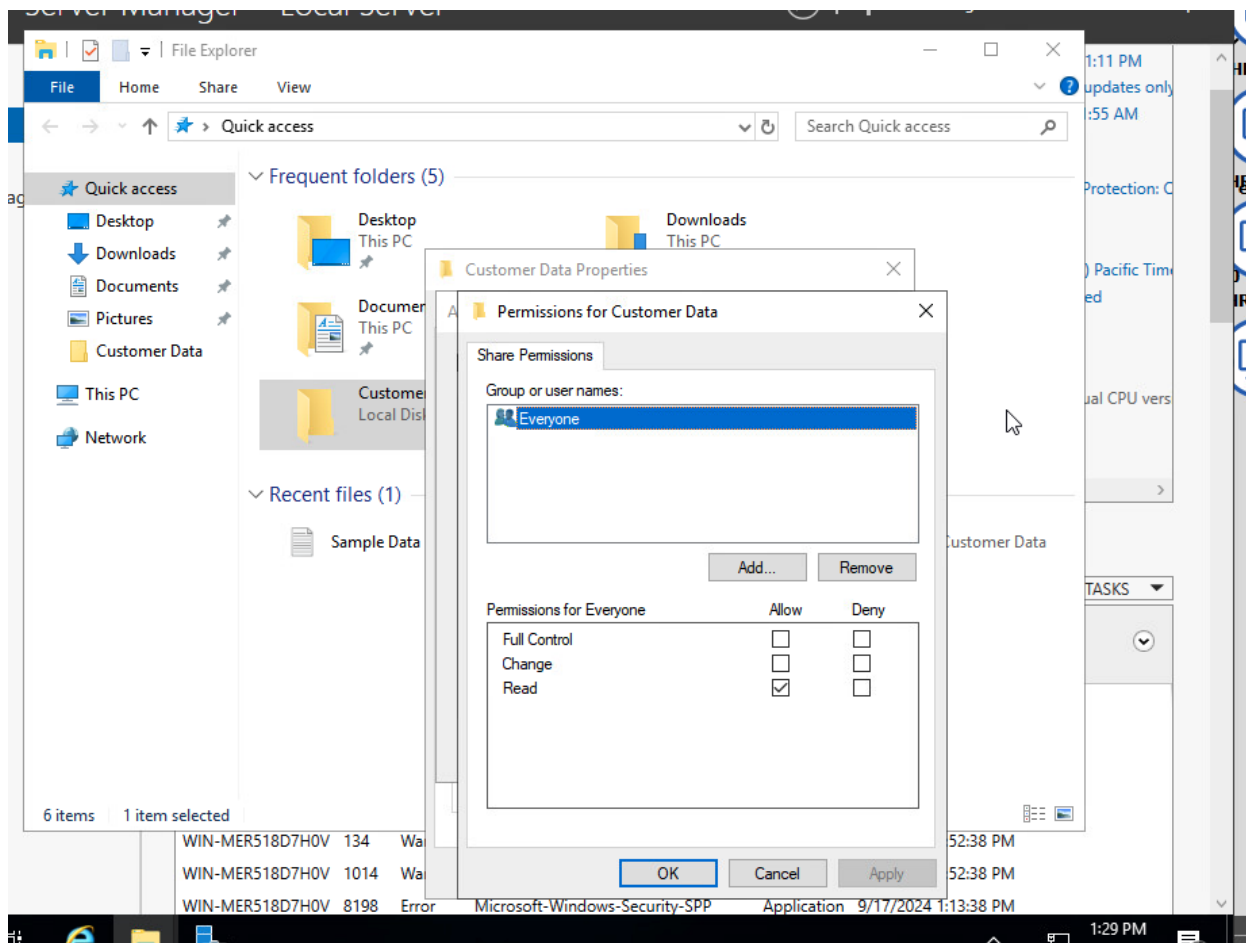
Professor Megan Buckner

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I.   **Network Deficiencies**

      I.   Issue One: Only users in the Sales and Customer Service departments need access

             to the Customer Data folder on the CS FTP server. The Human Resources

             department users should not have access.

      II.

             i.   Identify the **configuration error** causing the issue by providing

                 appropriate screenshot(s).

             ii.   Troubleshoot the issue and provide screenshots of a **resolution**.
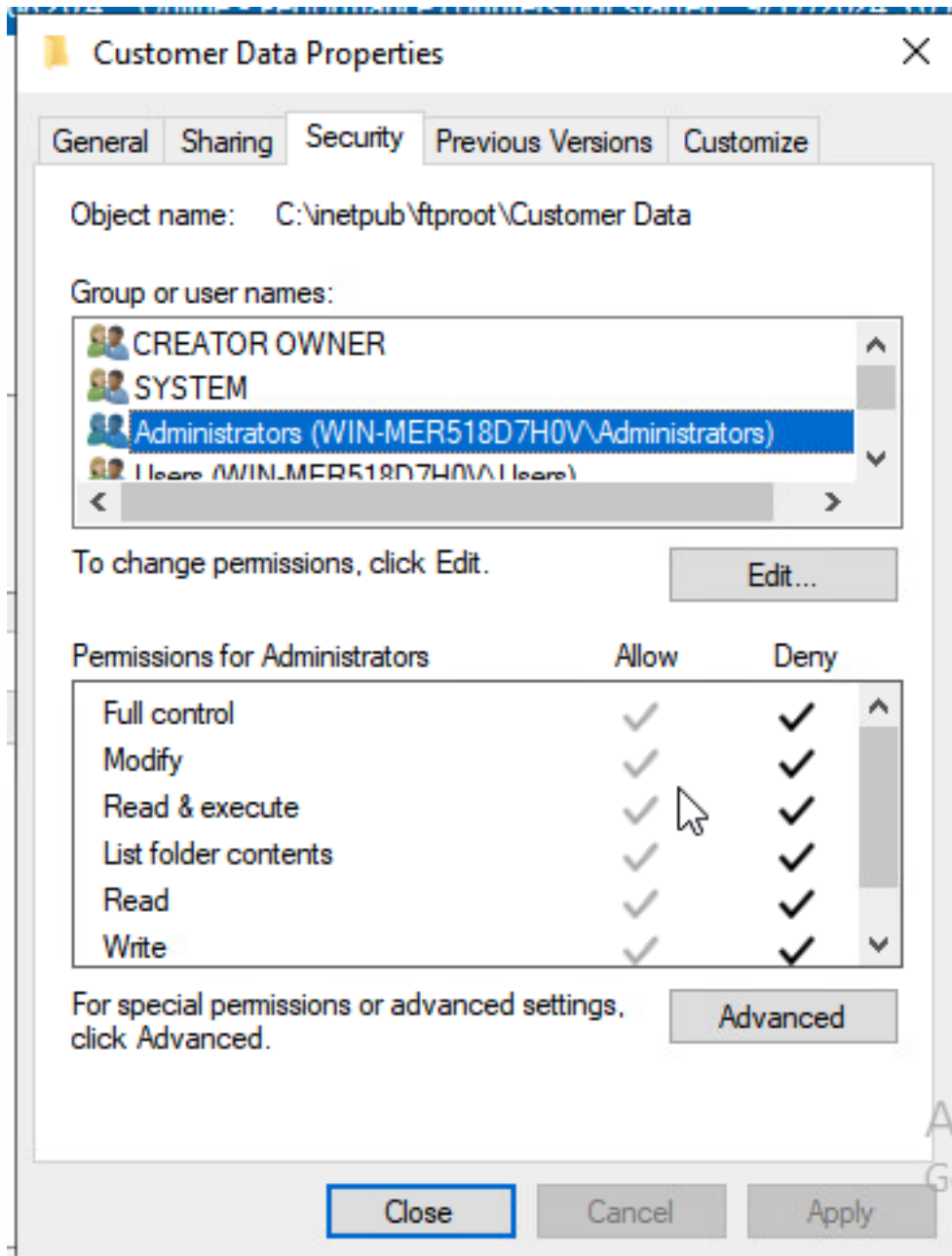
      iii.   Explain your **approach to troubleshooting** the issue and justify your
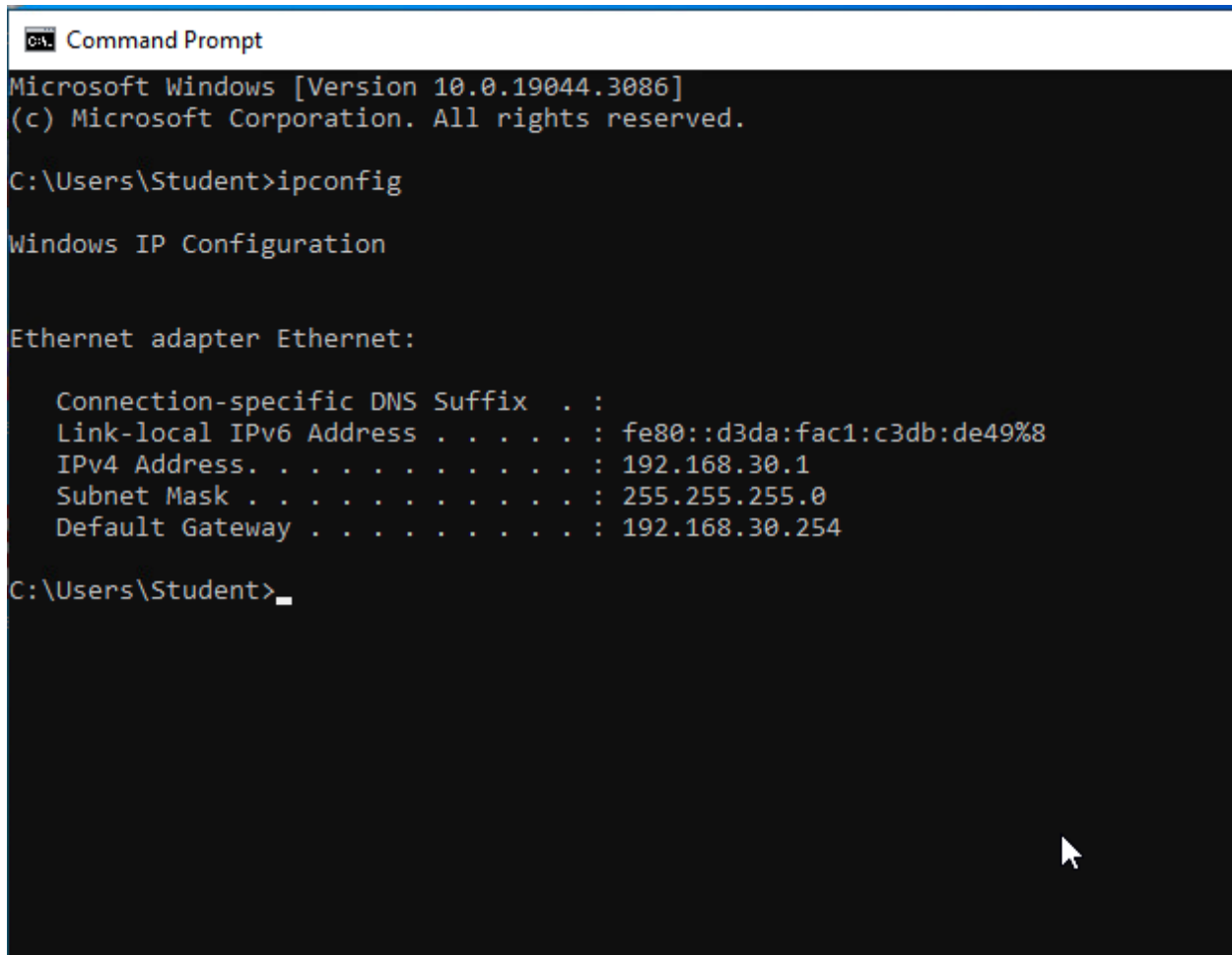
          resolution.

First I looked at the permissions on the file and noticed that everyone had access to it. On the

administrators, HR had access so I changed the permission to not allow the access by changing

the ACLs to the group to not allow anyone from the 192.168.30.0/24 network.

III.   Issue Two: Three of the four workstations in the Human Resources department

cannot ping the Cloud IP address due to an IP address or switch misconfiguration.

Find and correct the misconfigurations.

IV.

i.   Identify the configuration error causing the issue by providing appropriate

screenshot(s).

```
Command Prompt
Microsoft Windows [Version 10.0.19044.3086]
(c) Microsoft Corporation. All rights reserved.

C:\Users\Student>ipconfig

Windows IP Configuration


Ethernet adapter Ethernet:

   Connection-specific DNS Suffix  . :
   Link-local IPv6 Address . . . . . : fe80::d3da:fac1:c3db:de49%8
   IPv4 Address. . . . . . . . . . . : 192.168.30.1
   Subnet Mask . . . . . . . . . . . : 255.255.255.0
   Default Gateway . . . . . . . . . : 192.168.30.254

C:\Users\Student>
```

```
Microsoft Windows [Version 10.0.19044.3086]
(c) Microsoft Corporation. All rights reserved.

C:\Users\Student>ipconfig

Windows IP Configuration


Ethernet adapter Ethernet:

   Connection-specific DNS Suffix  . :
   Link-local IPv6 Address . . . . . : fe80::2d85:3212:54b9:6f95%8
   IPv4 Address. . . . . . . . . . . : 192.168.30.2
   Subnet Mask . . . . . . . . . . . : 255.255.255.0
   Default Gateway . . . . . . . . . : 192.168.30.252

C:\Users\Student>
```

```
Microsoft Windows [Version 10.0.19044.3086]
(c) Microsoft Corporation. All rights reserved.

C:\Users\Student>ipconfig

Windows IP Configuration


Ethernet adapter Ethernet:

   Connection-specific DNS Suffix  . :
   Link-local IPv6 Address . . . . . : fe80::9b17:9daf:125b:ab56%8
   IPv4 Address. . . . . . . . . . . : 192.168.30.3
   Subnet Mask . . . . . . . . . . . : 255.255.255.0
   Default Gateway . . . . . . . . . : 192.168.30.250

C:\Users\Student>
```

```
Ethernet adapter Ethernet:

   Connection-specific DNS Suffix   . :
   Link-local IPv6 Address . . . . . : fe80::54d:c231:1dab:5f57%8
   IPv4 Address. . . . . . . . . . . : 192.168.30.4
   Subnet Mask . . . . . . . . . . . : 255.255.255.0
   Default Gateway . . . . . . . . . : 192.168.30.254

C:\Users\Student>en
'en' is not recognized as an internal or external command,
operable program or batch file.

C:\Users\Student>icacls "C:\path\to\CustomerDataFolder
C:\path\to\CustomerDataFolder: The system cannot find the path specified.
Successfully processed 0 files; Failed processing 1 files

C:\Users\Student>ipconfig

Windows IP Configuration


Ethernet adapter Ethernet:

   Connection-specific DNS Suffix   . :
   Link-local IPv6 Address . . . . . : fe80::54d:c231:1dab:5f57%8
   IPv4 Address. . . . . . . . . . . : 192.168.30.4
   Subnet Mask . . . . . . . . . . . : 255.255.255.0
   Default Gateway . . . . . . . . . : 192.168.30.254

C:\Users\Student>
```
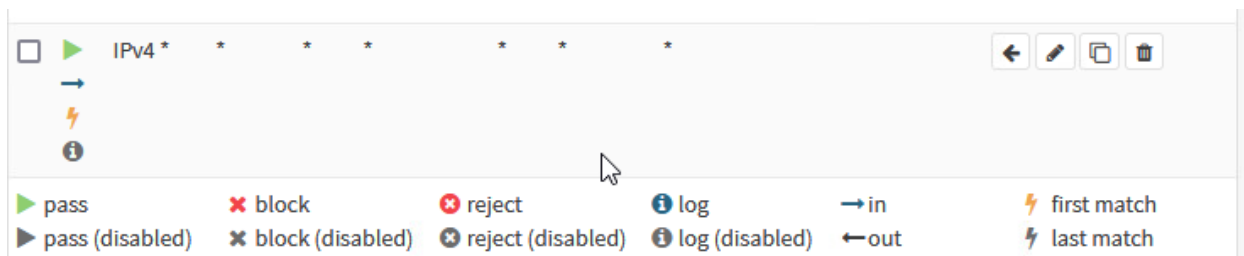
      ii.   Troubleshoot the issue and provide screenshots of a resolution.

☐ ▶	IPv4 *	*	*	*	*	*	*	← ✎ ⬚ 🗑
→							
⚡							
ⓘ							

▶ pass	✖ block	⊗ reject	ⓘ log	→in	⚡ first match
▶ pass (disabled)	✖ block (disabled)	⊗ reject (disabled)	ⓘ log (disabled)	←out	⚡ last match

      iii.   Explain your approach to troubleshooting the issue and justify your

              resolution.

I had to change some default gateways to the correct gateway, from there I pinged but still could

not access the cloud. I had to fix the firewall rules to allow WAN connections and let everything

through.