

Group 7

Step 3: Infection

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Memo: Infection Method Development

Step 1: Preparation of the executable file

AES encryption can be used to encrypt files in a designated directory by executing a prepared Python script called script.py. This script is going to be transformed into an executable file (your gift is inside this) in order to mimic a typical file type that people could anticipate receiving by email.

Step 2: Email Distribution

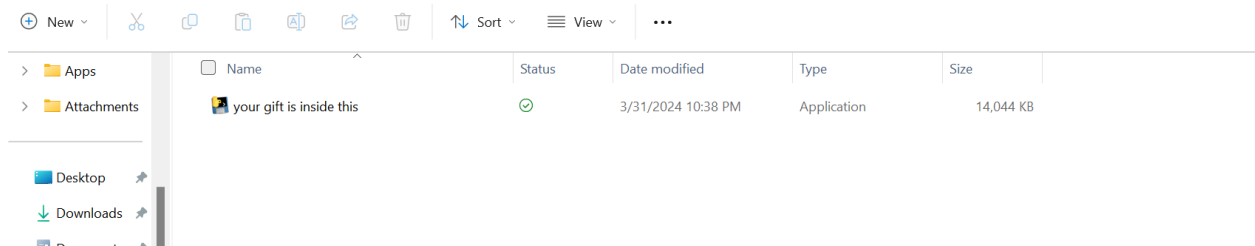
An email with the executable link will be sent, carefully designed to look real and tempt the recipient to open the attachment link.

Step 3: Execution and Encryption

The script simulates the impact of a ransomware infection by encrypting files in the preset directory after downloading and running the (your gift is inside this.exe) file.

Screenshots:-

Executable File Image: -



First, we converted the script file into an executable file in order to encrypt the file without giving commands.

After this, we will be sending an email to a targeted email which is called email phishing where we will lure the target user to click on the link and get infected. The target user will not know that this is malicious code.

<https://drive.google.com/file/d/1Ij0U4cxOeuhhHXe0A3hd4quoJYsyjXFc/view?usp=drivesdk>

This link contains the malicious code.

Free Gift!! Inbox x

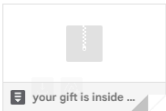


Hakuna Matata <dishaagarwal619@gmail.com>
to me

11:21 PM (3 minutes ago)



One attachment • Scanned by Gmail



Congratulations you won the lottery Inbox x



Hakuna Matata <dishaagarwal619@gmail.com>
to me

11:31 PM (0 minutes ago)

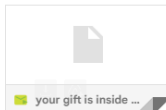
Hello,

Thank you for participating in our monthly lottery. We are delighted to share that you have won a lottery. Please find the attached gift to claim your gift. You will need to click on the link to access the gift.

<https://drive.google.com/file/d/1Ij0U4cxQeuhhHXe0A3hd4quoJYsyjXFc/view?usp=drivesdk>

Regards,
Lottery Team

One attachment • Scanned by Gmail

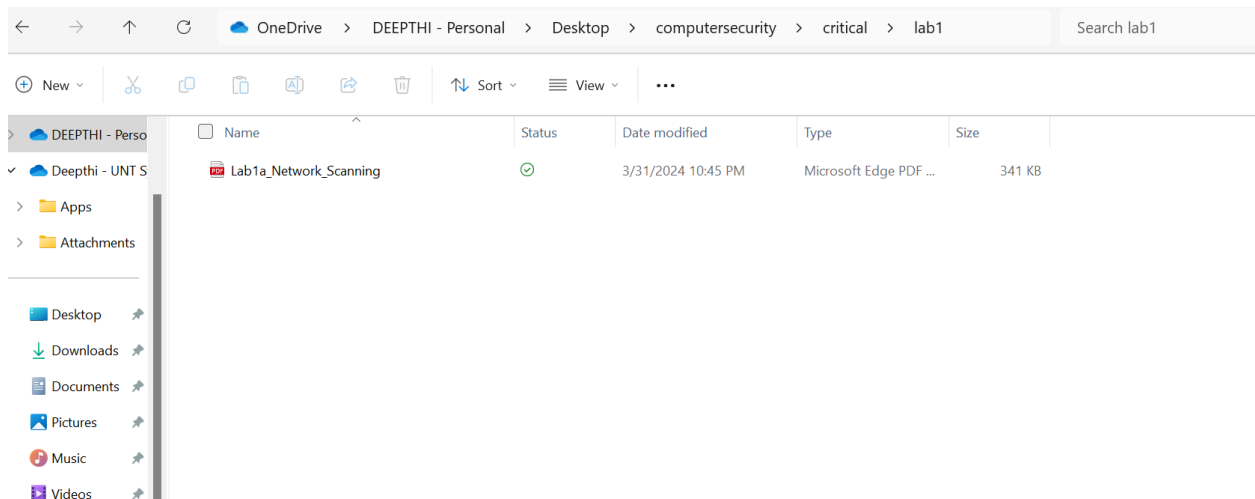
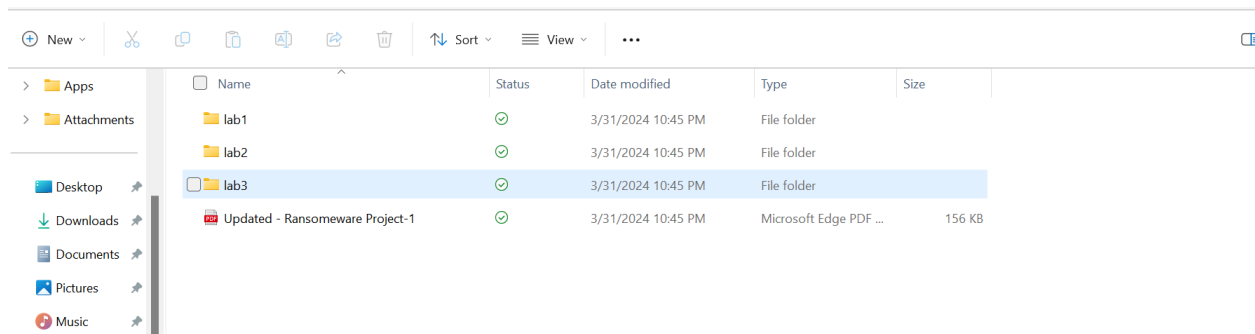


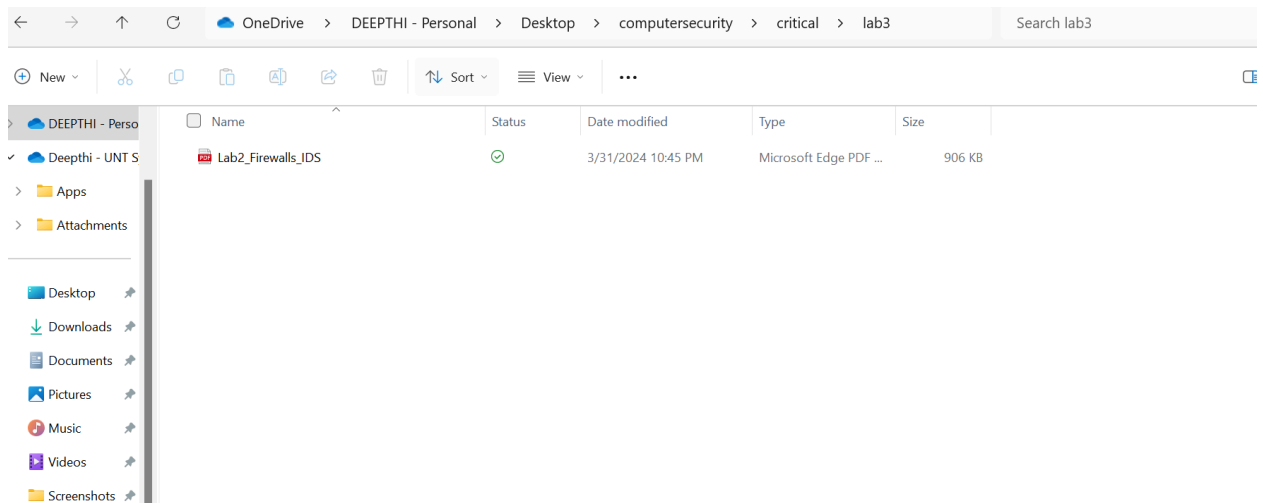
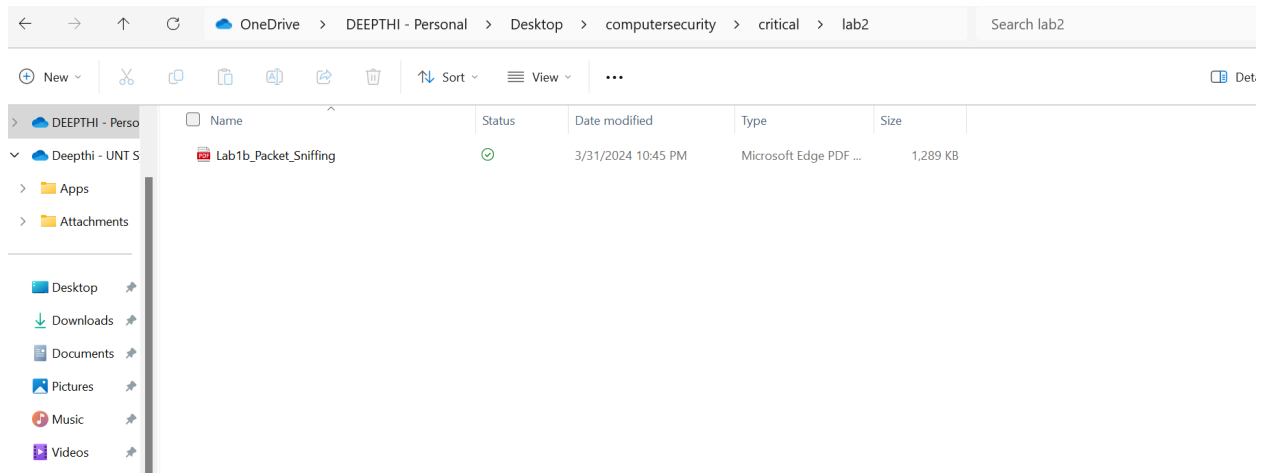
Reply Forward More options

This is the image the recipient will get.

Before Encryption: -

These are before encryption





After Encryption: -

This is after encryption.

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OneDrive

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DEEPTHI - Personal

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> Deepthi - UNT S

> Apps

> Attachments

Desktop

Downloads

| Name | Status | Date modified | Type | Size |
|--|--------|--------------------|-------------|--------|
| lab1 | ✓ | 3/31/2024 10:47 PM | File folder | |
| lab2 | ✓ | 3/31/2024 10:47 PM | File folder | |
| lab3 | ✓ | 3/31/2024 10:47 PM | File folder | |
| Updated - Ransomware Project-1.pdf.enc | ✓ | 3/31/2024 10:47 PM | ENC File | 156 KB |

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DEEPTHI - Personal

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Downloads

| Name | Status | Date modified | Type | Size |
|--------------------------------|--------|--------------------|----------|--------|
| Lab1a_Network_Scanning.pdf.enc | ✓ | 3/31/2024 10:47 PM | ENC File | 341 KB |

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OneDrive

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DEEPTHI - Personal

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lab2

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> Apps

> Attachments

Desktop

Downloads

Documents

Pictures

| Name | Status | Date modified | Type | Size |
|-------------------------------|--------|--------------------|----------|----------|
| Lab1b_Packet_Sniffing.pdf.enc | ✓ | 3/31/2024 10:47 PM | ENC File | 1,289 KB |

OneDrive

DEEPTHI - Personal

Desktop

computersecurity

critical

lab3

Search lab3

New

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View

DEEPTHI - Personal

Deepthi - UNT S

Apps

Attachments

Desktop

Downloads

Documents

Pictures

Music

Videos

| Name | Status | Date modified | Type | Size |
|----------------------------|--------|--------------------|----------|--------|
| Lab2_Firewalls_IDS.pdf.enc | | 3/31/2024 10:47 PM | ENC File | 906 KB |

A screenshot of a OneDrive file explorer window. The address bar shows the path: OneDrive > DEEPTHI - Personal > Desktop > computersecurity > critical > lab3. A search bar on the right contains the text 'Search lab3'. The left sidebar shows a navigation pane with 'DEEPTHI - Personal' expanded, revealing 'Deepthi - UNT S' (expanded), 'Apps', and 'Attachments'. Below these are standard Windows OneDrive folders: Desktop, Downloads, Documents, Pictures, Music, and Videos. The main pane displays a table with one file: 'Lab2_Firewalls_IDS.pdf.enc'. The table has columns for Name, Status (a green checkmark icon), Date modified (3/31/2024 10:47 PM), Type (ENC File), and Size (906 KB).