

# This presentation includes QR codes

- Each QR code provides a quick way to access a web page, a PDF document, a phone/tablet app you can install, an email you can send, or other valuable info.
- By scanning the QR code seen on your screen, you can access the info immediately, without typing a lengthy URL, ***and without typos***. The longer the URL, the greater the advantage of QR code scanning over typing.
- The camera app in Android 10/11/12 and iOS 11-15 can be configured to scan QR codes. The camera app will scan the QR code when it sees the QR code.

# Get out your phone or tablet

- Soon, you will have an opportunity to practice scanning a QR code.
- But first ...
- If you have no idea what version of the OS is used on your phone or tablet, I will show you how to find out
- You will see how to make sure your phone or tablet Camera app is configured to scan QR codes.

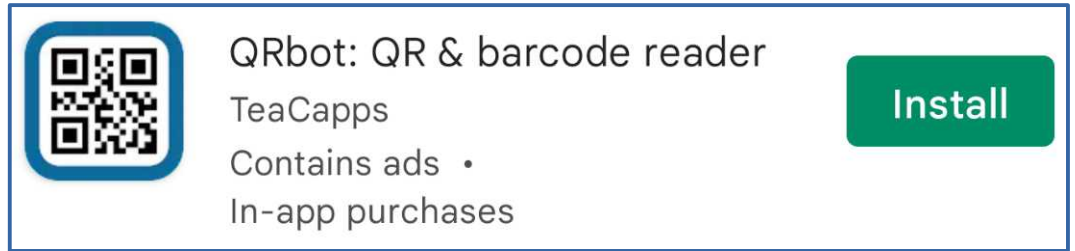
# Confirm your device OS version

- **Android:** Settings → About phone/tablet → Software Information
- Find the words “Android version”
- The magic version number is **10**
- **Apple:** Settings → Your name → Device name
- Find the word “Version”
- The magic version number is **11**

# Using an earlier OS on your phone?

- **ANDROID:** If your version number is less than 10, then open the Play Store on your phone/tablet.
- In the search field at the top, type **QRbot**. Tap the Search button on the keyboard.

- The search results show the **QRbot app**:



A screenshot of the Google Play Store listing for the QRbot app. On the left is a square icon with a QR code. To the right of the icon, the text reads: "QRbot: QR & barcode reader" in a large font, "TeaCapps" in a smaller font, and "Contains ads • In-app purchases" in an even smaller font. On the far right is a green button with the word "Install" in white text.

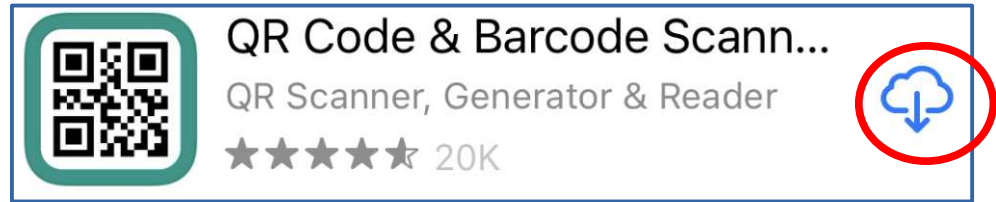
- Tap the **Install** button. Start the QRbot app. Advance through the Intro screens. Stop when you see this button:



# Using an earlier OS on your phone?

- **Apple:** Open the App Store.
- If the top of the screen does not display the Search field, then tap the Search icon in the lower right corner.
- In the Search field, type **QRbot**.

- Scroll through the search results to find this app:

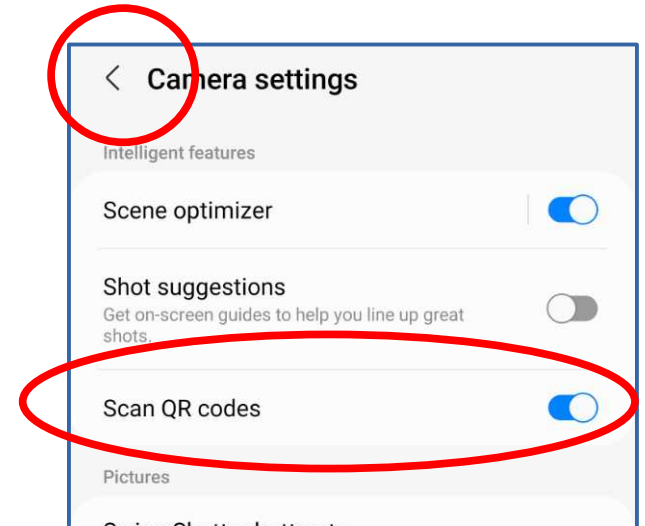
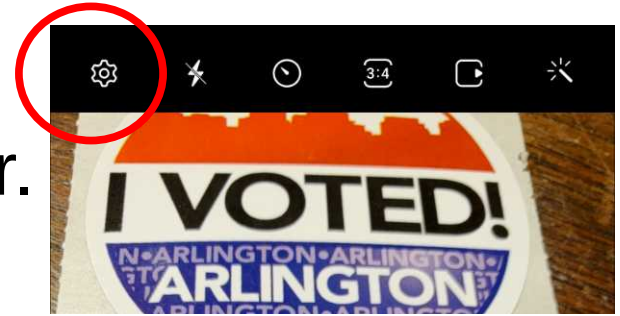


- Tap the **Install** button to install the app.
- On your iPhone/iPad, the app name is **QRbot**. Run the app. Advance through the intro screens. Stop at the request for permission to use the camera.

# Check Android 10/11/12

## Camera app configuration

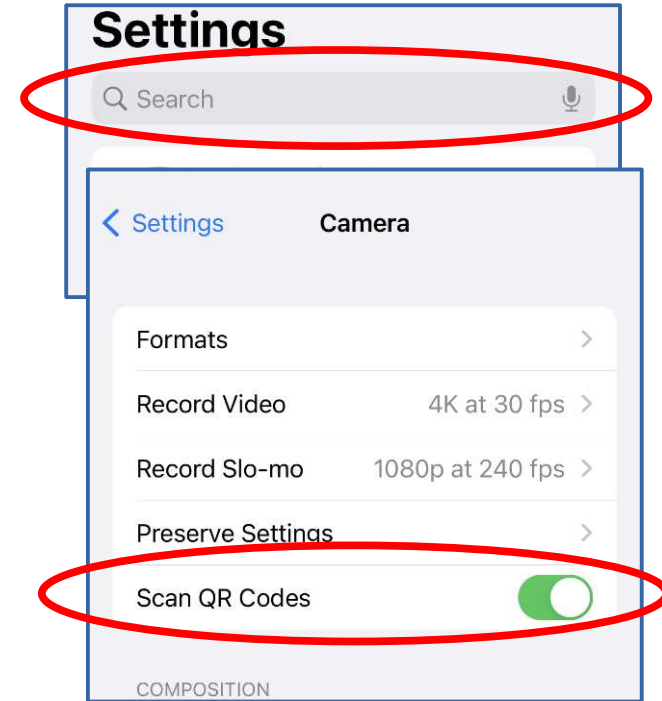
- Open the **Camera app**.
- Tap the **Gear button** in the left corner.
- The Camera Settings screen opens.
- On the Camera Settings screen, make sure the **Scan QR code switch is turned ON**.
- Tap the upper left corner to return to the Camera app main screen.



# Check iOS 15

## Camera app configuration

- Open the **Settings app**. If the Search field is not visible, then scroll down and up the Settings app screen slightly.
- In the Search field, type **Camera**.
- In the search results, tap the **Camera app icon** (not the Privacy icon). The Camera app settings screen opens.
- In the Camera app settings screen, make sure the **Scan QR codes switch is ON**.



# Prepare to scan a QR code

- Android 10/11/12 users: Camera app should be ready to take a photo.
- Android QRbot users: tap the **Scan Using the Camera** button
- Apple iOS 11-5 users: open the **Camera** app
- Apple QRbot users: tap OK to grant permission to access the camera.



# Scan this QR code for practice

- This QR code contains the URL of my user group, the Potomac Area Technology and Computer Society (PATACS): [www.patacs.org](http://www.patacs.org).
- Point your camera at this QR code.
- The app should recognize and scan the QR code.



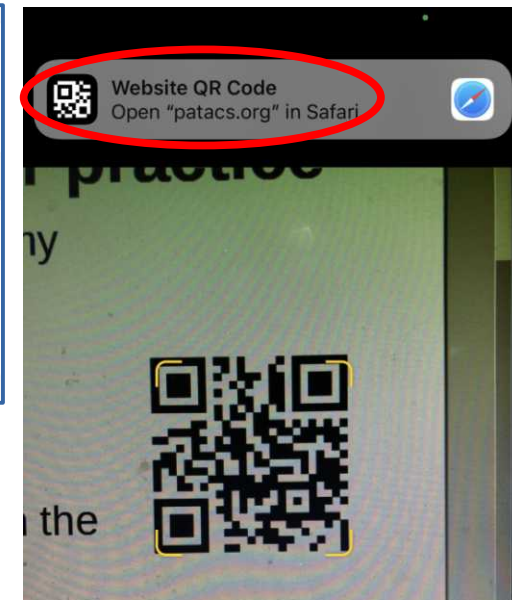
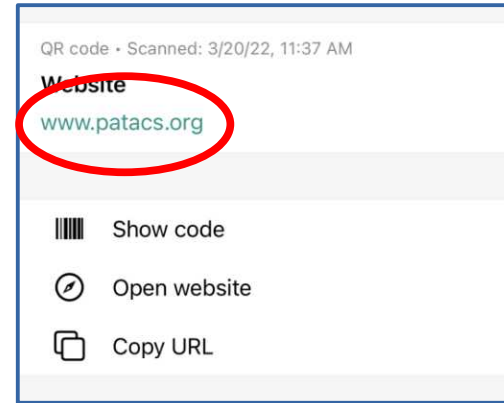
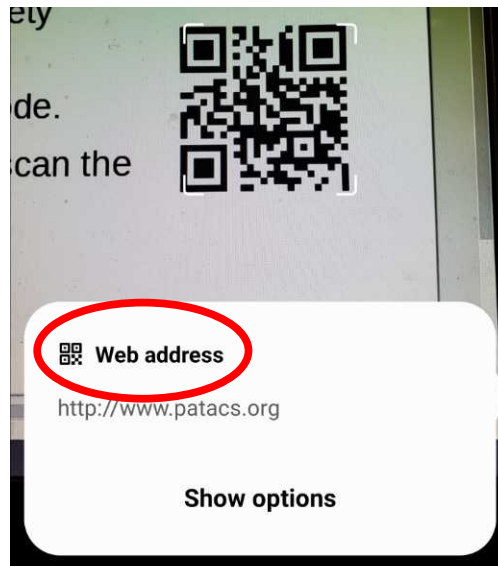
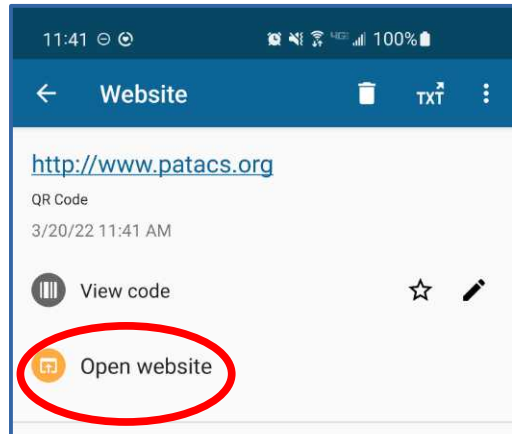
# Next step: access the web page

- **Android QRbot**

**Android Camera**

**Apple QRbot**

**Apple Camera**



# Other QR code types

Aside from web page URLs, QR codes can contain:

- A **vCard** (a Contacts record) which inserts the contact info as a new record in your Contacts app.
- An **email** (addressee, subject line, and text body) which opens your email app so you can send the email.
- A **WiFi login** (including WiFi name and password) which connects your device to that WiFi.
- There are many other types also.

# **Add NAS to your Router**

A presentation

by John Krout

For PATACS + OPCUG

March 19, 2022

# What is NAS?

- **NAS = Network Attached Storage**
- Any USB drive will work: SSD, HD, or flash drive.
- Just like a 1990s era Novell Server, used in offices all over the US, NAS is a storage that anyone logged onto the network can use to create folders and store and retrieve files.
- Pre-Novell, most offices shared files by sneakernet, meaning diskettes or, later, by email.
- NAS in the 2020s can be accessed via WiFi on portable devices as well as via Ethernet on the LAN

# Advantages of NAS

- **Share** files that are too big to send via email, such as videos.
- **Share** big *groups* of files, such as photos of a vacation, in a NAS folder.
- **Share** with all other devices connected to the same Local Area Network (i.e., the same router).
- Make **backups** from your computer or phone or tablet to NAS.

# Agenda

- How to attach NAS to your router
- Storage devices that can become NAS
- How to configure Windows File Explorer to see NAS as a storage device like a local SSD or HD
- How to configure iOS Files app to see NAS
- How to configure Android My Files app to see NAS
- Try out NAS during this meeting
- Learn the jargon and sound like an expert!

# Jargon: RAID

- **RAID = Redundant Array of Inexpensive Disks**
- RAID offers two advantages: fast file and folder retrieval speed, and very reliable backups.
- Products sold by Microcenter as NAS are all RAID. Many cost as much as a computer.
- But NAS refers to how the storage is connected to computers, not how storage is organized internally.
- **Any** USB storage device can be NAS.



# Jargon: Mesh

- Mesh is a technology that allows multiple routers to work together and act as a single router with multiple **nodes** around the house.
- The basic advantage is to improve WiFi reception anywhere it is weak when using a single router.
- Some are sold as Mesh sets.
- Other stand-alone routers are Mesh-capable.
- So far, Mesh does NOT work with two different router brands.

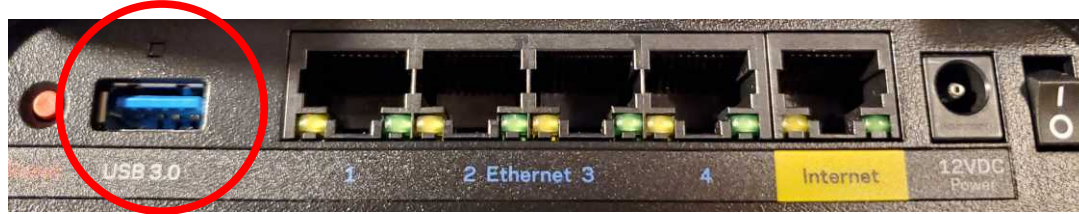
# How to attach NAS to your router

- My router is a Linksys MR8300.
- I have been using Linksys brand routers for about 20 years.
- I prefer Linksys over the routers provided by FIOS and cable companies.
- I know how to administer Linksys routers, and I do not want a company to lock me out of router administration.

# How to attach NAS to your Router

- Many router brands and models have a USB port in addition to several Ethernet ports.

- Linksys  
MR8300:



- Router USB ports originally were for a printer, so the printer could be used by all devices on the Local Area Network (LAN).
- Now the USB port can power any USB storage device, and make it available as NAS: **Flash drive, portable SSD or portable HD.**

# GETTING STARTED

# Check your router compatibility

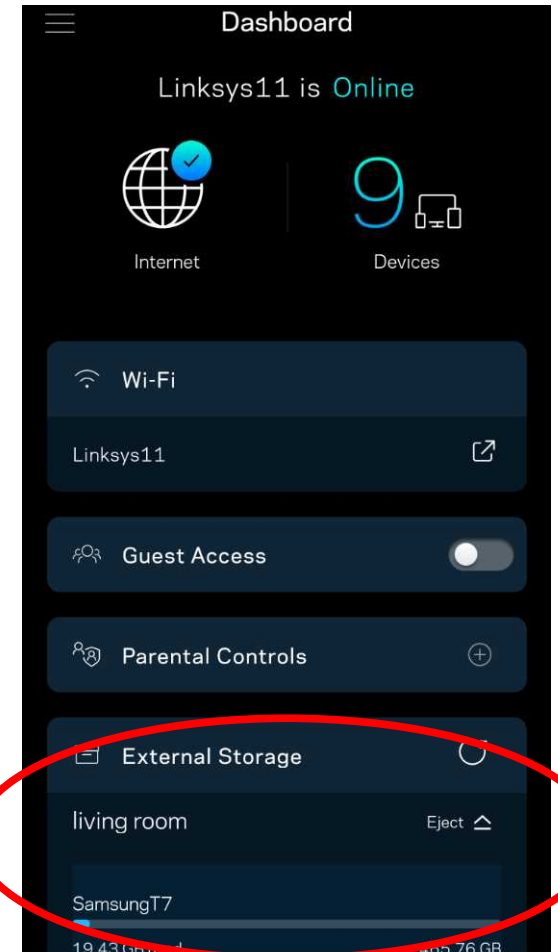
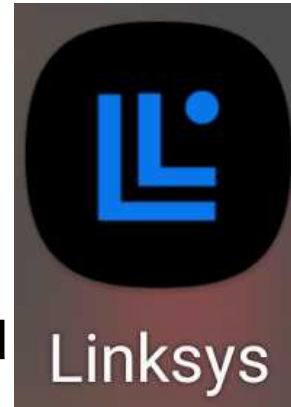
- If there is USB port on your router, you are out of luck unless you buy a NAS RAID (\$\$\$) or a new router (\$).
- Check your router doc to see if your router USB port will support a NAS storage device.
- Check router doc for USB NAS storage device **format requirements** (NTFS, FAT32, etc)
- Make sure your NAS storage is formatted that way ***before*** attaching it to your router.

# Attach a USB flash drive to the router, as a test

- MicroCenter currently sells a MicroCenter brand USB 3.1 **256 GB** flash drive for \$20.
- Save money and buy a smaller one if you prefer.
- Format the USB drive as required by your router doc.
- Attach the USB drive to your router USB port.
- Check to see if your router recognizes your USB flash drive.

# Linksys router admin app

- Free app, available for Android and iOS
- After you tell the app about your Linksys router, when you open the app, its Dashboard shows the router external storage
- If the USB drive is not connected, or the router does not detect it, then the **External Storage** heading will be absent



# If you own or buy a Linksys router, then download the Linksys app

- Free for Android on the Play Store

Scan the QR code!



- Free for Apple on the App Store

Scan the QR code!



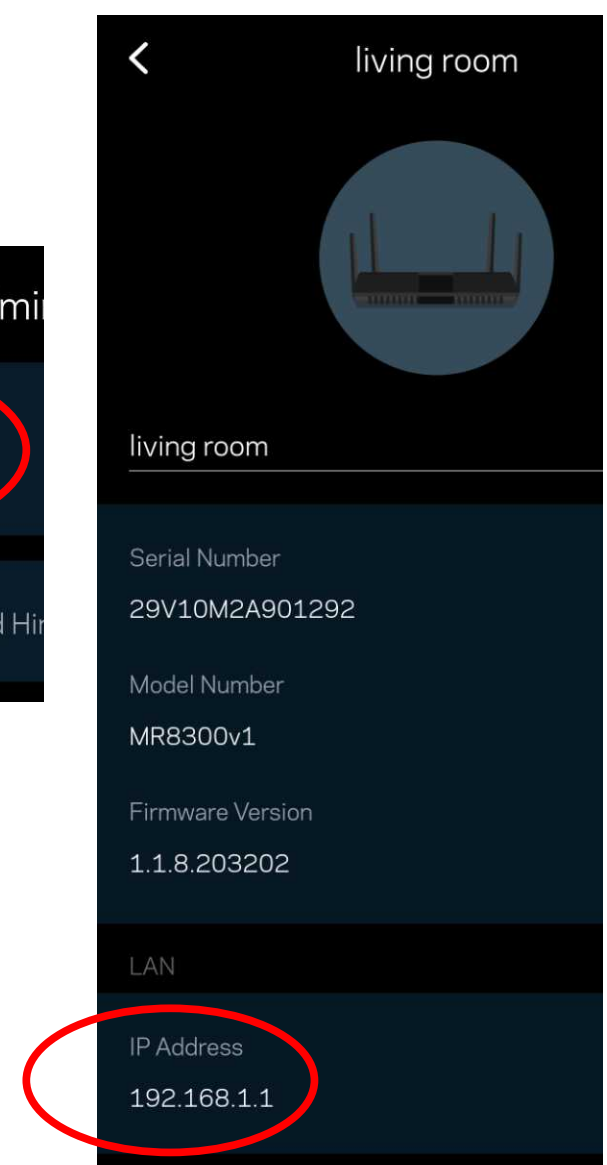
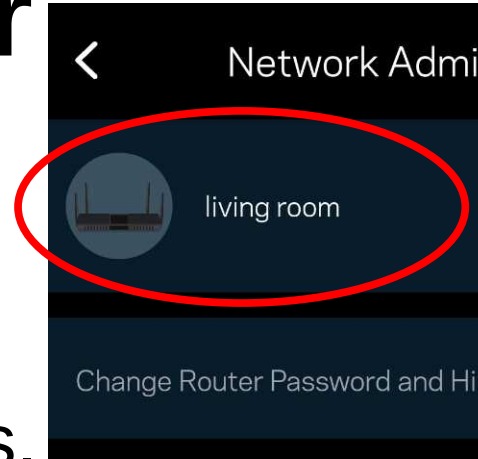


# Find the IP address of your router

- For configuring Windows, Android and iOS to access your router NAS, you need to know the router IP address.
- The router IP address is normally found in the router doc.
- For many Linksys routers, the router IP address is **192.168.1.1**
- I bought a second MR8300; its address is **10.157.1.1**
- You can reconfigure that default IP address if you wish.

# Find the IP address of your router

- In the **Network Administration** screen, tap the **top heading**.
- The Router screen opens.
- The router IP address appears near the bottom of the screen.



# Confirm the router IP address

- Another way to check is to open a **CMD process** and ping the IP address
- **>ping 10.157.1.1**
- Here is a successful ping

```
Command Prompt
Microsoft Windows [Version 10.0.19042.1526]
(c) Microsoft Corporation. All rights reserved.

C:\Users\jkrou>ping 10.157.1.1

Pinging 10.157.1.1 with 32 bytes of data:
Reply from 10.157.1.1: bytes=32 time<1ms TTL=64
Reply from 10.157.1.1: bytes=32 time<1ms TTL=64
Reply from 10.157.1.1: bytes=32 time<1ms TTL=64
Reply from 10.157.1.1: bytes=32 time<1ms TTL=64

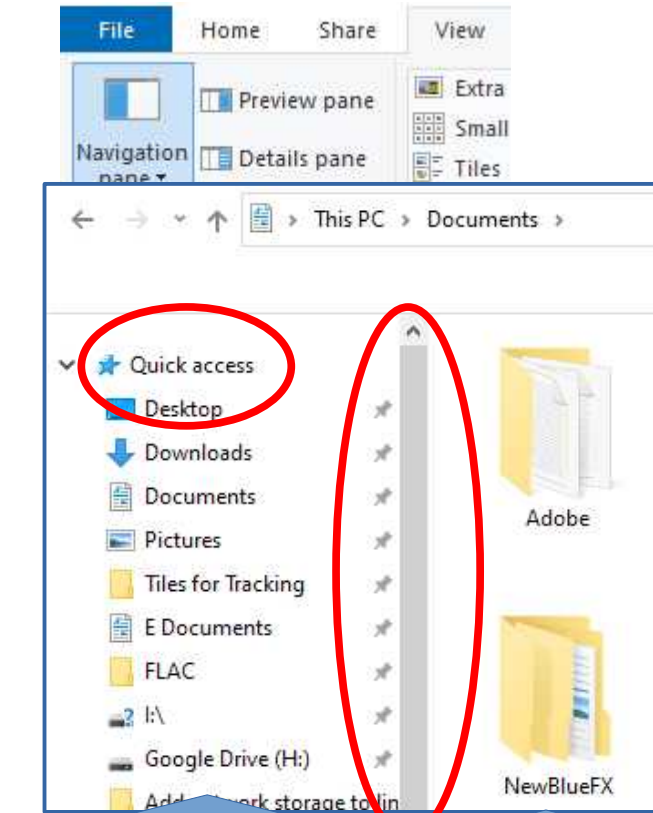
Ping statistics for 10.157.1.1:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 0ms, Maximum = 0ms, Average = 0ms

C:\Users\jkrou>
```

# **Connect Windows File Explorer to router NAS**

# Open Windows File Explorer

- The **Navigation Pane** is on the left
- If the Navigation Pane does *not* appear, then click on View in the menu ribbon, tap Navigation Pane, and select it in the drop-down menu.
- Note the permanent **Quick Access** section at the top of the pane.
- Slide the Navigation Pane **vertical scroll bar** all the way down.

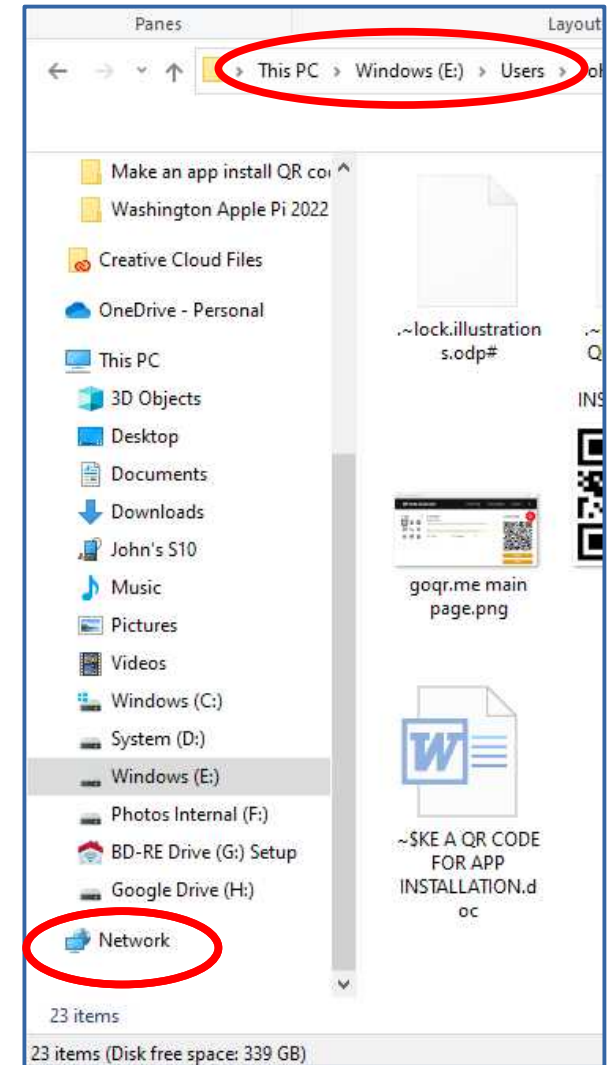


Nav  
Pane

Content  
Pane

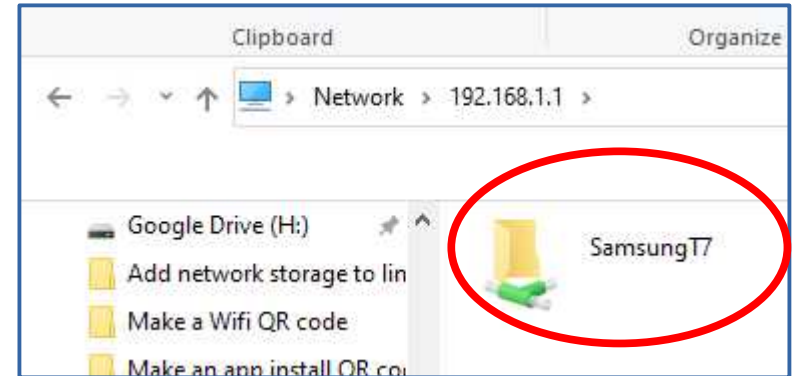
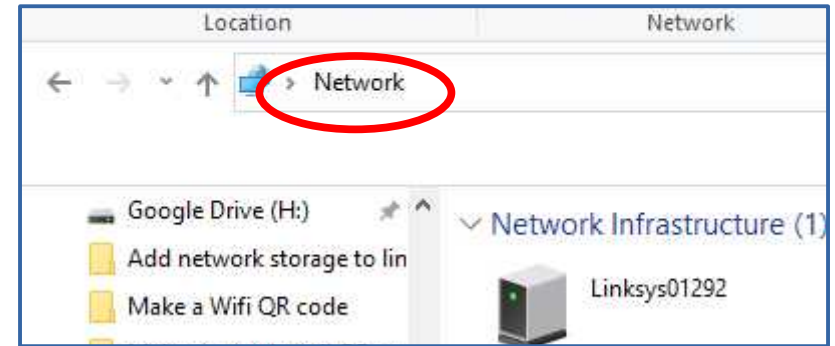
# Find and select Network

- On my Windows 10 PC, **Network** is at the bottom of the Navigation Pane.
- Click **Network**.
- Network then appears in the **Path field** at the top of File Explorer
- You may see your router and other network devices in the Content pane.



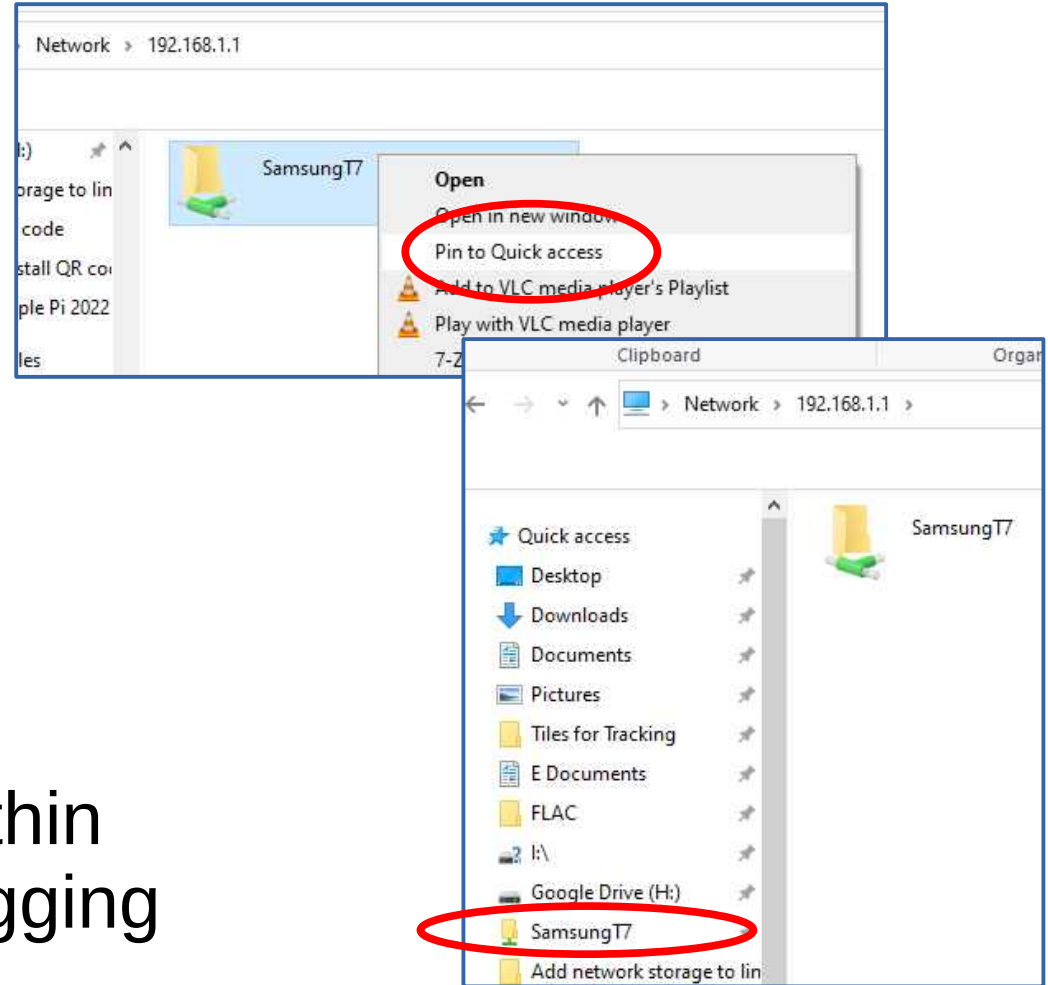
# Type in the Path field

- In the Path field, select the word **Network**, so that word is highlighted.
- Type: **\\192.168.1.1** (or the IP address of your router) and tap the Enter key.
- The Path field then changes to **Network > 192.168.1.1**, and the Contents pane changes to show your new NAS.



# Add NAS to Quick Access

- In the Content pane, right-click your new NAS. A menu appears.
- In the menu, select **Pin to Quick Access**.
- The new NAS appears in Quick Access, at the top of the Navigation Pane.
- You can reposition NAS within Quick Access by click&dragging NAS up and down.

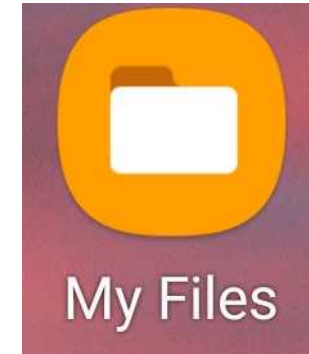




# **Install the My Files app for Android**

# The Samsung My Files app

- This app is published by Samsung and is available for all Android devices for free on the Play Store.
- **Install this app now** by scanning the QR code to open the Play Store app to the Samsung My Files app screen.
- In the Play Store, the app title is **Samsung My Files**.
- On your Android device, the app name is **My Files**.



Scan the QR code to  
open the My Files page  
in the Play Store!



# **Connect iOS 15 Files app to router NAS**

# The iOS 15 Files app is built in

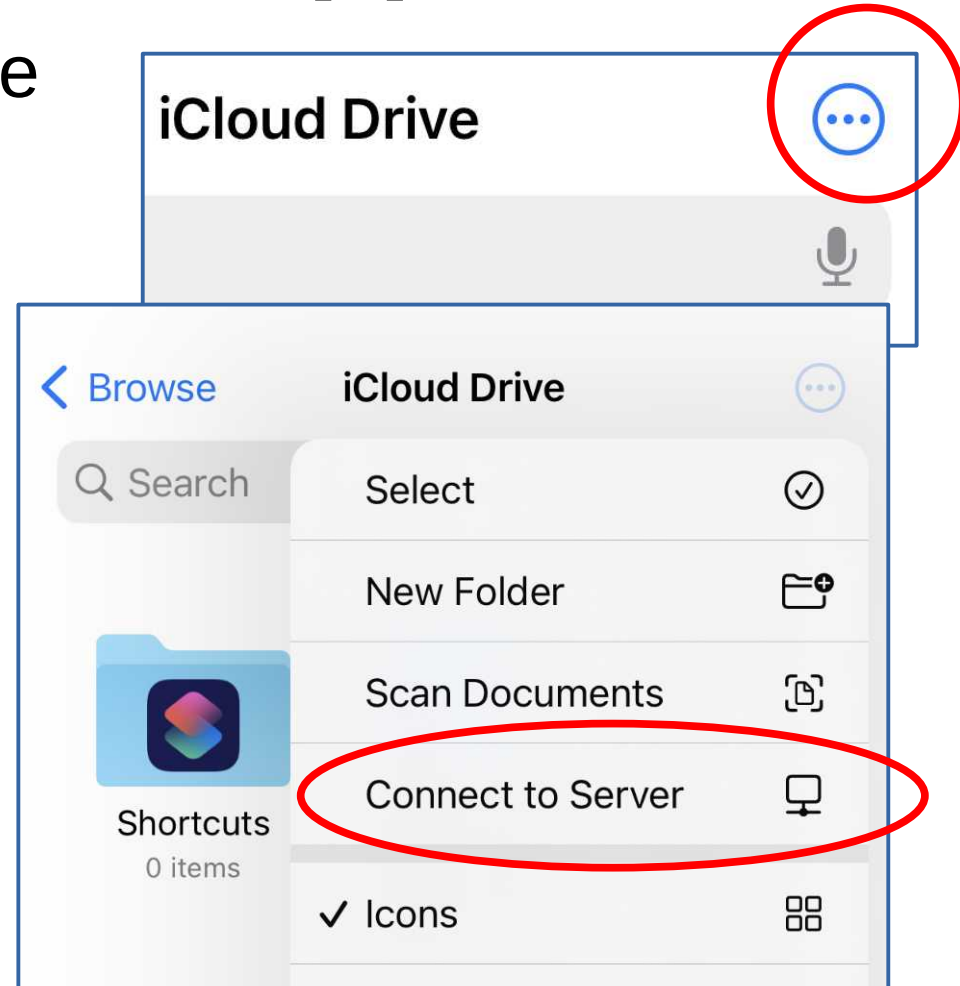
- The app is pre-configured to access **iCloud drive**.
- The app can be configured to access **Google Drive** and **OneDrive**
- You will learn how to connect the app to your NAS.
- For my iPhone 5 running iOS 10, I downloaded an app named **Remote Files Basic**.
- If your Apple device runs an older iOS, and no Files app is available, then install the **Remote Files Basic app**.

Scan the QR code



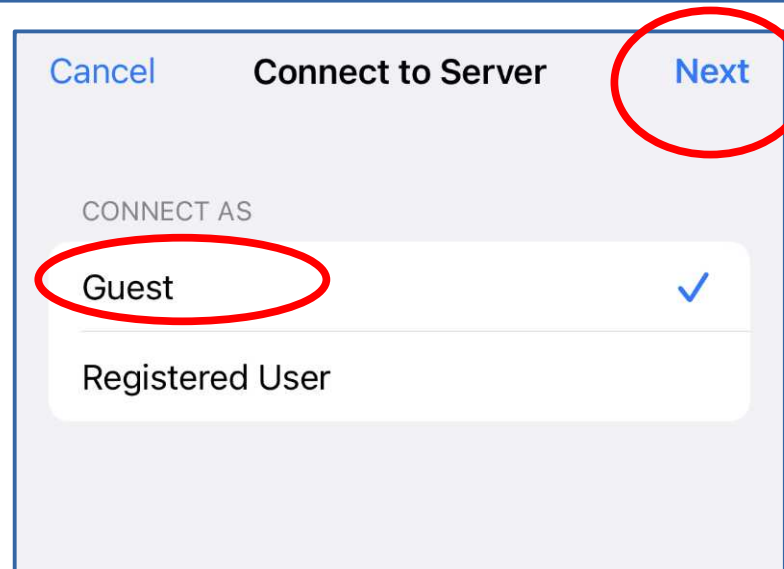
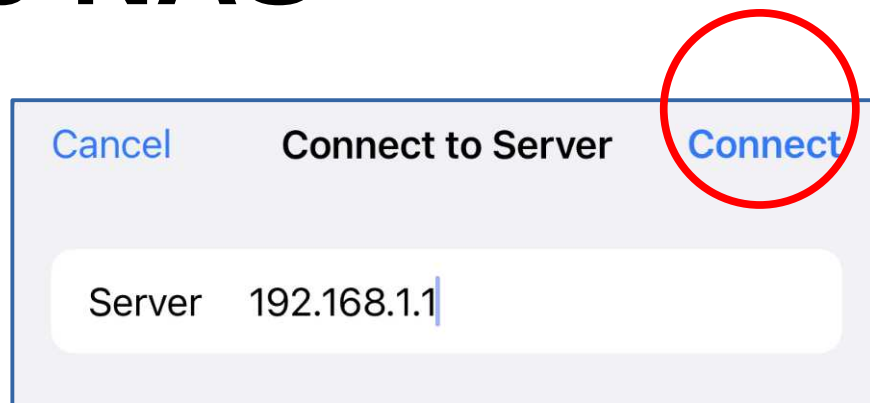
# Open the Files app

- In the upper right corner of the Files app screen, tap the **three-dot icon**.
- A menu pops in.
- In the menu, select **Connect to Server**. The **Connect to Server** screen appears.



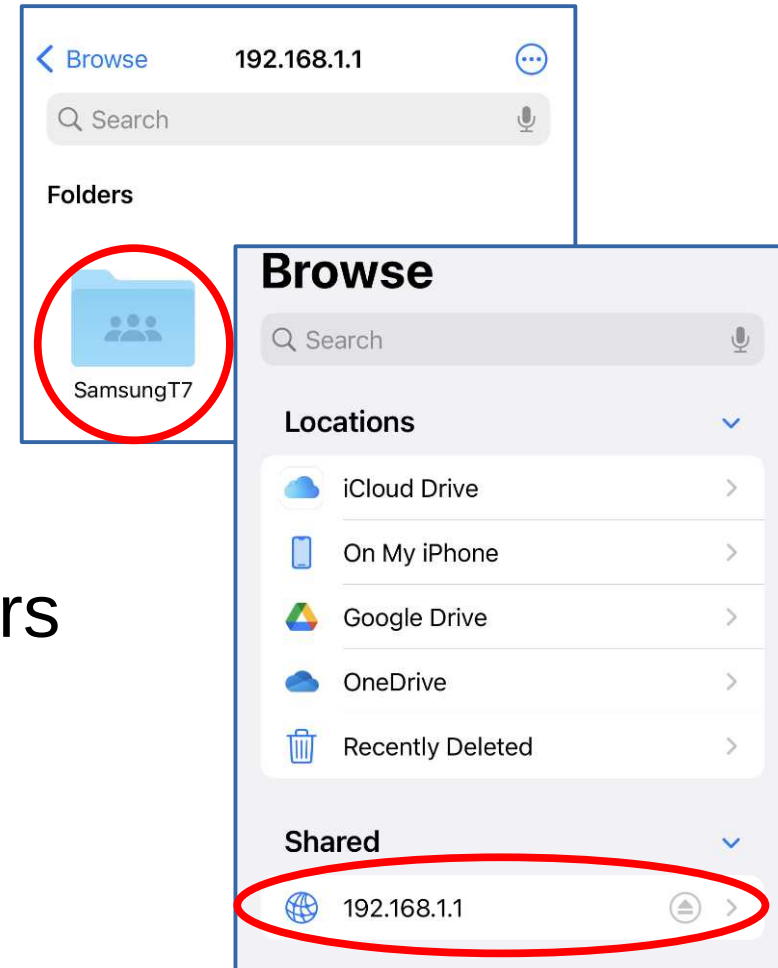
# Connect to NAS

- The screen contains a single field labeled **Server**.
- In that field, type the IP address of your router, and tap the **Connect** button.
- The screen changes to display **Connect As**. Tap the **Guest** choice.
- Tap the **Next** button in the upper right corner.



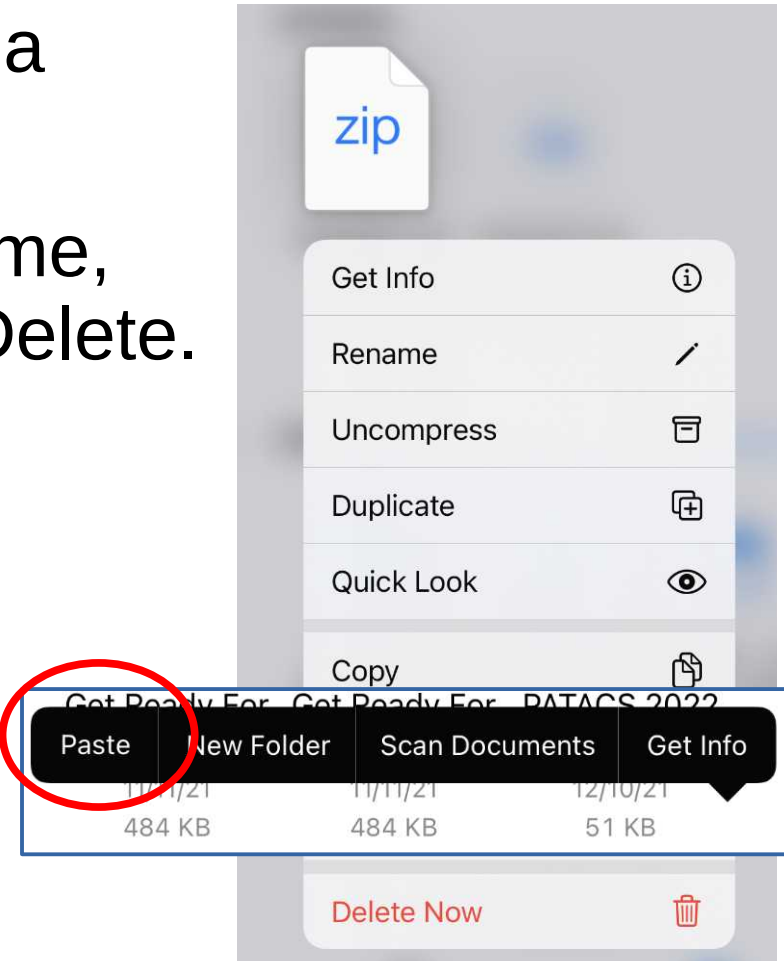
# The Files app Browse window

- The **Browse window** appears and shows your NAS. Tap the NAS icon to see files on the NAS.
- Tap the **Browse button** in the upper left corner to return to the **top-level Browse** screen.
- Your Router IP address now appears below cloud drives in the top-level Browse screen, so you can access NAS later by tapping that line.



# What the Files app can do

- Long-tap on any file or folder to see a menu of Files app actions.
- The available actions include: Rename, Duplicate locally, Copy, Move, and Delete.
- If you chose Copy or Move, then use the Files app to open another folder or drive in which to Paste
- Long-tap a blank area in the folder; **Paste** appears in a pop-up menu. Select **Paste**.

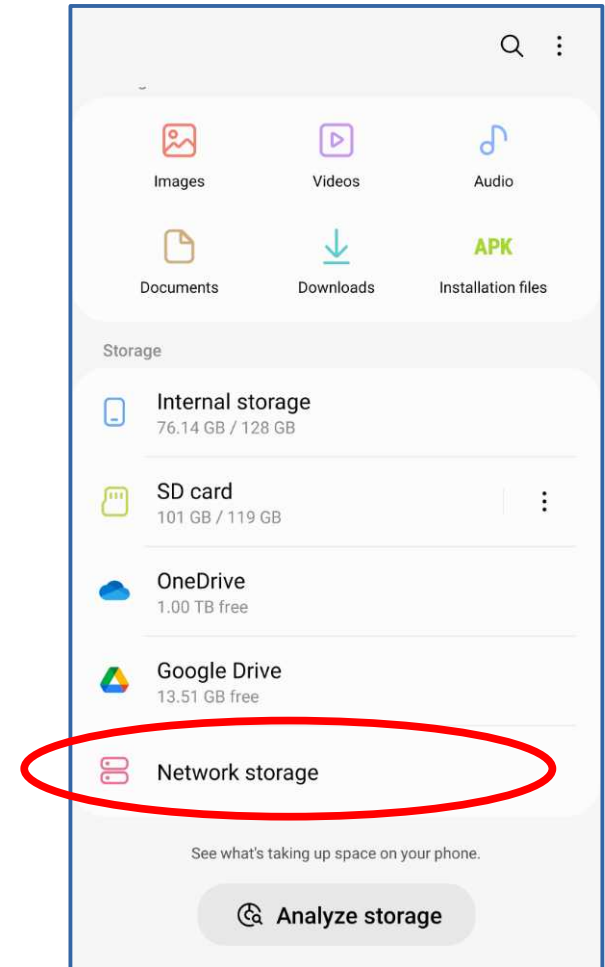




# **Connect Android My Files app to NAS**

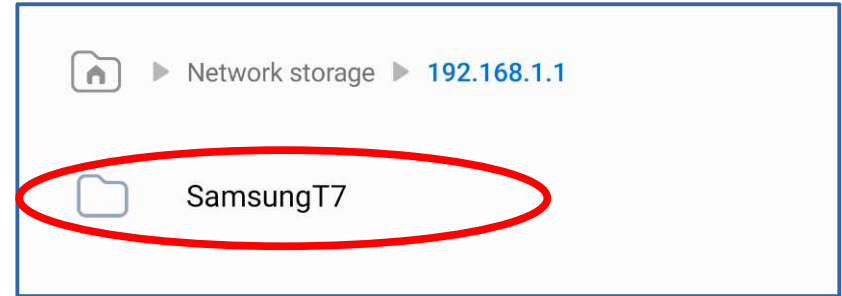
# Open the My Files app

- The My Files app screen lists local storage (internal and SD card) and types of files.
- It also lists any cloud storage you have configured My Files to use.
- Scroll to the bottom of screen, and find and tap the heading **Network Storage**.



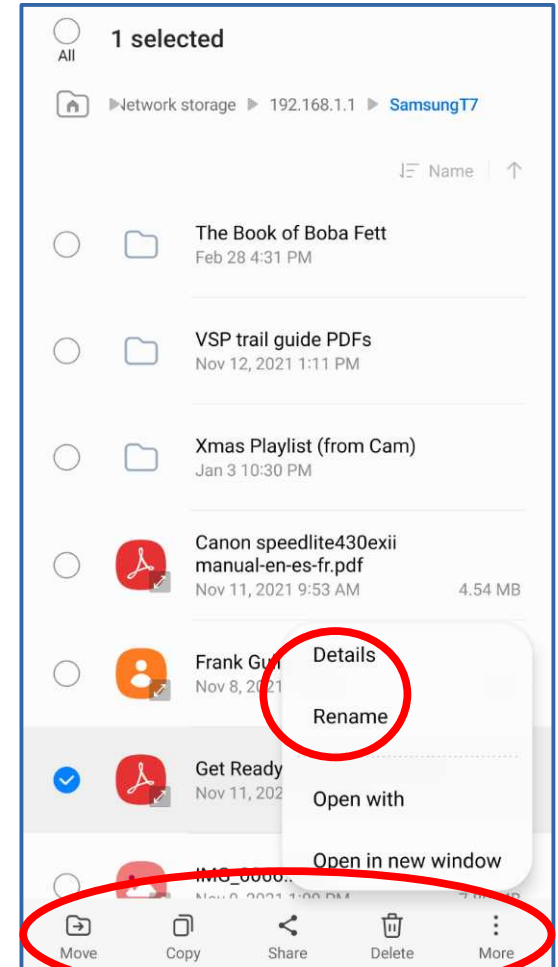
# Configure My Files to use NAS

- Tap the **Add button** in the lower right corner (not shown).
- My Files shows the NAS found at that IP address.
- In the main My Files screen, you can tap **Router IP → NAS name** to see files contained in the NAS at any time.



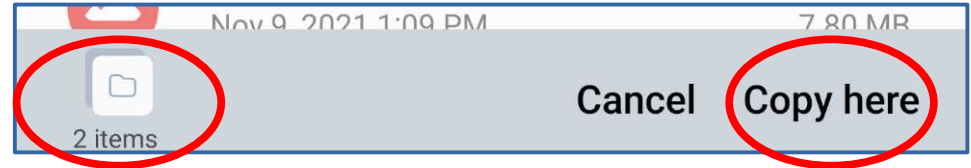
# What the My Files app can do

- Long-tap a file or folder.
- Action options appear at the bottom: Move, Copy, Share, Delete, and More. The More menu includes Details and Rename.
- You can also check-mark multiple files and folders, and apply any one of those action options to all selected files and folders at once.



# What the My Files app can do

- If you choose Move or Copy, then the app displays a **gray bar** at the bottom of the screen.



- The gray bars reports the number of files or folders chosen.
- Navigate to the destination storage folder.
- Tap **Copy here** or **Move here** in the gray bar.
- The selected files and folders will appear in the destination storage folder.

**THE END**