

Sun City Computer Club

MUG MAC Users Group

June 26, 2024
3:00pm

**Questions, Comments, Suggestions welcomed at any
time**

Even Now

- Audio recording of this session as MP4 file
- Audio recording available at link shown above

Audio Recording In Progress

- Wake Words

**SIG attendees are required to be members of the chartered club sponsoring that SIG.
Sun City Community Association By-law**

- SIG Leader replacement
- Take over
- Inclusion Zoom & Recording
- Summers are Important Apple

- Apple Users Group
- New Leaders October
- iDevices in MUG

Presenter???

WWDC 2024

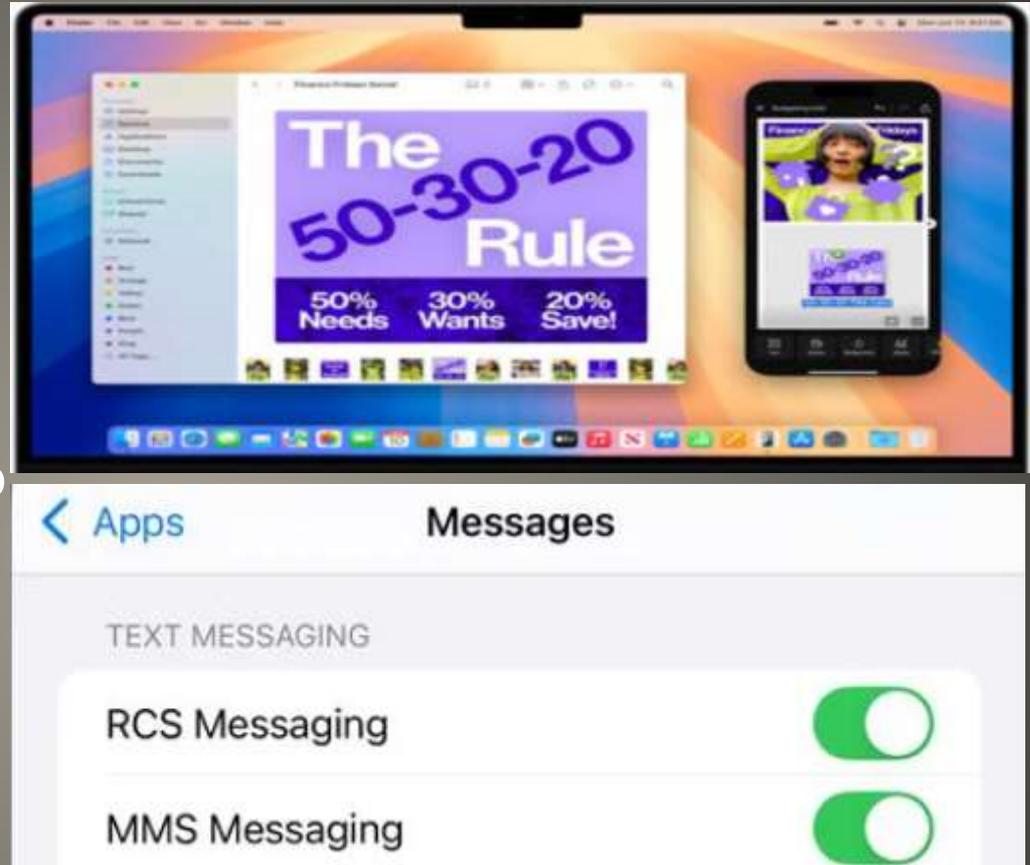


- Developer Beta
- Privacy
- Brick possibility

- Second developer beta June 24
- iOS iPadOS 22A5297f 1.74GB
Countdown to a
- tvOS 22J5305e

iOS 18 iPadOS 18 Beta releases

- iPhone mirroring
iDevice on Mac
iDevice locked
- SharePlay
Draw on your iDevice
See on shared device
Request permission to
remote control
- RCS toggle



Second Developer Beta iDevices

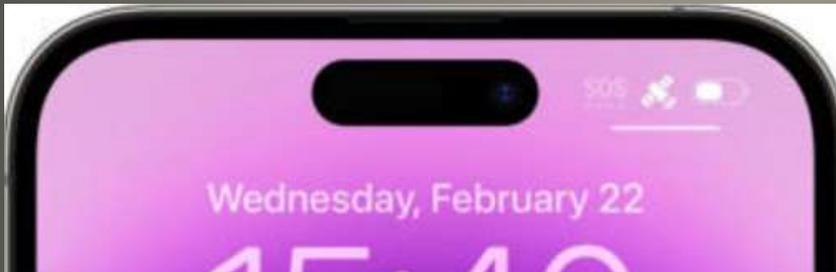
- After installing the betas and with the iPhone near the Mac, an icon appears on the Mac's Dock titled iPhone Mirroring. Open it.
- Click Continue.
- On the iPhone, unlock it.
- Back on the Mac, click Get Started.
- With the iPhone locked, open iPhone Mirroring on the Mac.
- The first time, you'll be asked if you will be required to authenticate with the Mac the first time only, or every time. Select Ask Every Time or Authenticate Automatically.
- Authenticate with the Mac when asked. You'll then be presented with the iPhone display.

iPhone Mirroring

- SOS 911 calls but not your cellular carrier



- SOS 911 calls maybe satellite

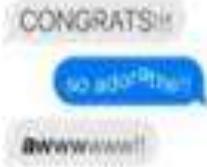


- OR Port swap
- OR Sim swap
- Airplane Mode on & off
- Contact Carrier

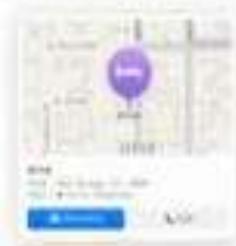
SOS



Easier window tiling



Text effects



Highlights in Safari



Passwords



Presenter preview

Collections
in Photos



on third-party
browsers



Hiking in Maps



Scenes
in Freeform

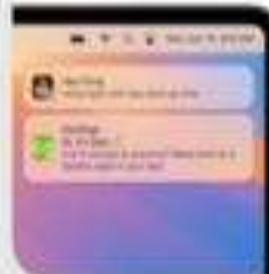


Game Porting
Toolkit 2



Emoji Tapbacks

iOS notifications on Mac



iPhone Mirroring



Redesigned
Reader



Math Notes

Send Later in Messages

Send Later in Messages

- Files app

- Connect drive

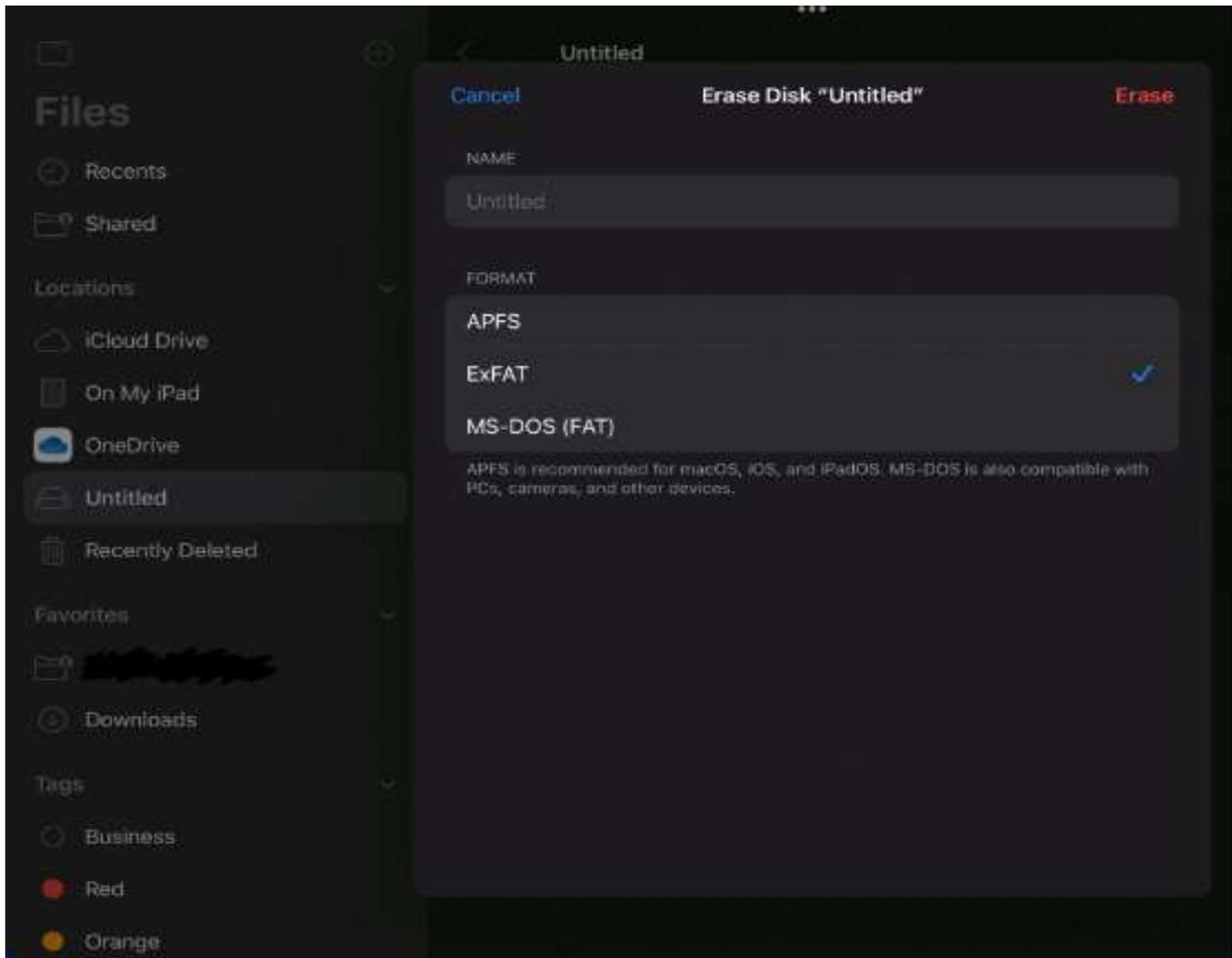
Flash drives, SSD cards, hard drives

Long press on external volume

APFS, ExFAT, MS-DOS (FAT)

iOS 18 iPadOS 18

external drive formatting



Untitled

Cancel

Erase Disk "Untitled"

Erase

NAME

Untitled

FORMAT

APFS

ExFAT



MS-DOS (FAT)

APFS is recommended for macOS, iOS, and iPadOS. MS-DOS is also compatible with PCs, cameras, and other devices.

Files

Recents

Shared

Locations

iCloud Drive

On My iPad

OneDrive

Untitled

Recently Deleted

Favorites

[Redacted]

Downloads

Tags

Business

Red

Orange

- Copy Text from Images and Videos via Live Text
- People and Pets recognition in Photos
- Photonic engine and Night Mode
- Personalized suggestions in Journal app
- Personal Voice
- Image descriptions
- FaceID
- Predictive text & autocorrect

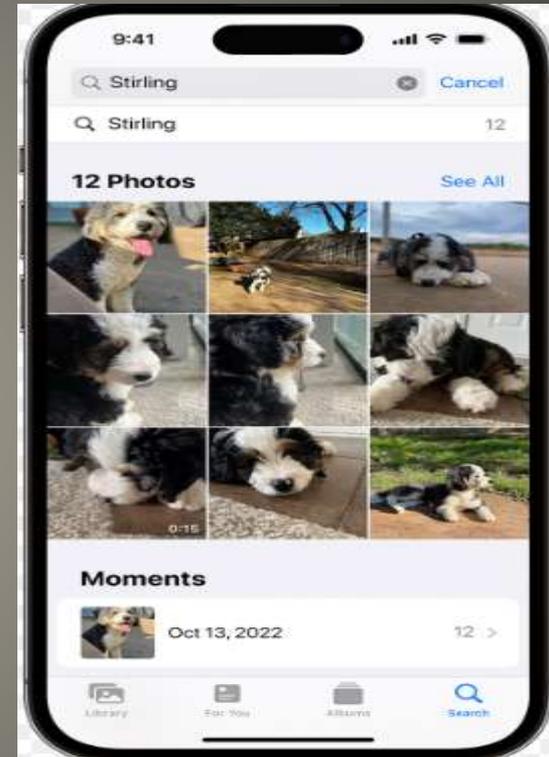
iDevice AI

- Live Text iPad & Mac also
- Camera app aim Live Text
- Photos app long press on text
- Translate, copy, search



Copy Text from Images and Videos via Live Text

- Photos app Album tab People & Pets
- On-device



People and Pets recognition in Photos

- Camera hardware + Software
- Night Mode – Low light with Night mode multiple exposures fuse them highlights
- Photonic Engine - iPhone 14 and later

Photonic engine and Night Mode

- On-device machine learning
recent activities
mental health

Personalized suggestions in Journal app

- Accessibility
- ALS or other voice altering maladies
- Speak about 15 minutes
- Process over night
- Use Personal Voice FaceTime & phone calls

Personal Voice

- Accessibility impaired vision
- Photos and Camera
- Image Descriptions with voice over
- Magnifier app > settings
+ Image Descriptions

Image descriptions

- Apple neural engine
- 30,000 invisible infrared dots
- Depth map

FaceID

- Keyboard with machine learning
- Transformer language model

Predictive Text & autocorrect

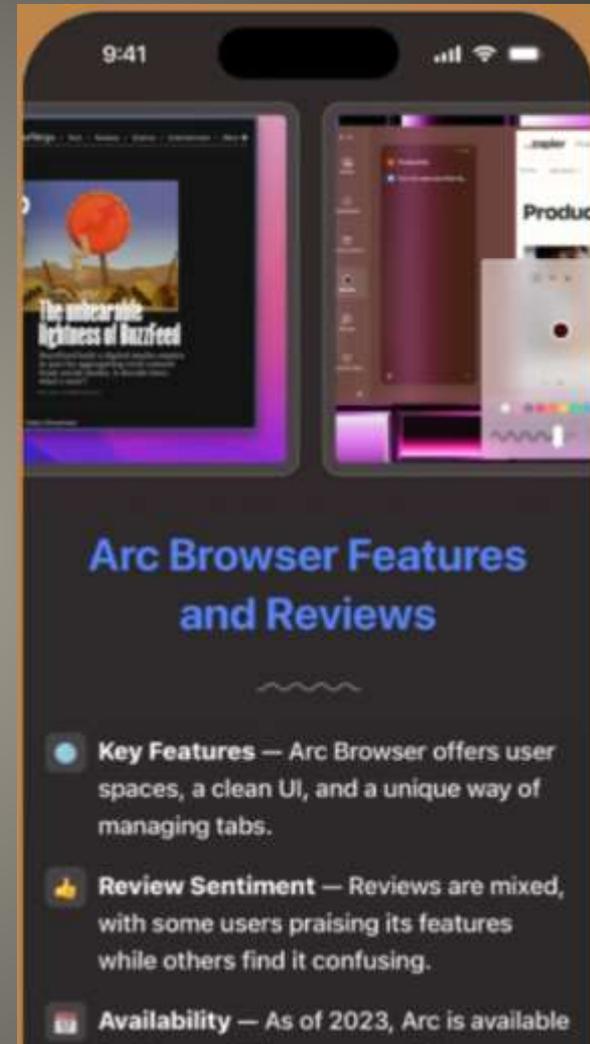
- Apple is developing software for users to create custom emojis using generative AI.
- Siri will get a generative AI upgrade to improve natural speech and new task capabilities.
- New AI features for iOS 18 and macOS 15 include transcribing voice memos and retouching photos.

AI generated emojis

- Billions to Google for search and Gemini
- Option

Apple and OpenAI

- iDevices
- In Apple App store
- <https://arc.net/blog/arc-search>



Arc Search

- Photo retouching.
- Voice memo transcription.
- Suggested replies to emails and messages.
- Auto-generated emojis based on the content of a user's messages, providing all-new emoji for any occasion beyond the existing catalog.
- Improved Safari web search.
- Faster and more reliable searches in Spotlight.
- More natural interactions with Siri.
- More advanced version of Siri designed for the Apple Watch, optimized for "on-the-go tasks."
- Smart recaps of missed notifications and individual messages, web-pages, news articles, documents, notes, and more.
- Developer tools for Xcode.

iOS 18 AI ?

- **Apple Maps:** At least two new Apple Maps features are expected on iOS 18, including custom routes and topographic maps. Custom routes would allow users to choose specific roads to travel on while navigating, while topographic maps include details such as trails, contour lines, elevation, and points of interest for hiking. Topographic maps were added to the Apple Watch with watchOS 10.
- **Apple Music:** With iOS 18, Apple Music will reportedly be able to auto-generate playlists, and there is also a rumor about smarter song transitions.
- **Apple News:** iOS 18 will reportedly be able to summarize news articles.
- **Calculator:** iOS 18, iPadOS 18, and macOS 15 are rumored to feature a revamped Calculator app with several new features, including a sidebar that lists recent calculations, an improved interface for converting units, integration with the Notes app, and more. That means the Calculator app will finally be available on iPads.
- **Calendar:** Two apps rumored to be integrated on iOS 18 are Calendar and Reminders. This would allow users to schedule and organize reminders directly within the Calendars app, without needing to open the Reminders app.
- **Freeform:** iOS 18 is rumored to add a new "Scenes" option to Apple's drawing app Freeform. This feature would allow users to select specific sections ("scenes") on the canvas for easier navigation.
- **Health:** Apple is reportedly planning new AI-powered features for its Health app, but no specific details are known yet.
- **Keynote, Numbers, and Pages:** Alongside iOS 18, Apple reportedly plans to update its iWork suite of productivity apps with new generative AI features for auto-generating slides in Keynote, writing faster in Pages, and more.
- **Mail, Photos, and Fitness:** These apps will reportedly be "overhauled" with iOS 18. AI-powered photo retouching is reportedly coming to the Photos app with iOS 18, and the Mail app could gain suggested replies to emails, but no other specific details are known yet for these apps.
- **Messages:** iOS 18 is expected to add RCS support to the Messages app, which will improve the messaging experience between iPhones and Android devices by allowing for higher-resolution photos and videos, audio messages, typing indicators, read receipts, Wi-Fi messaging, and more. It has also been rumored that the Messages app will use generative AI to auto-complete sentences more effectively, and to auto-generate custom emojis for users based on the content of messages.
- **Notes and Voice Memos:** With iOS 18, the Notes app is expected to be able to display mathematical notation, allowing users to include more types of algebraic equations and formulas in notes. The app is also rumored to gain a built-in audio recording tool, eliminating the need to switch over to the Voice Memos app. In addition, both Notes and Voice Memos could gain the ability to transcribe audio.
- **Safari:** iOS 18 is likely to add a browsing assistant to Safari, which could summarize web pages and more. A new "Web Eraser" feature that would allow users to remove certain elements from web pages has also been rumored.
- **Shortcuts:** With iOS 18, users will reportedly be able to automate complex tasks more easily with the Shortcuts app.
- **Settings:** Apple recently previewed several new accessibility options that will be available in the Settings app on iOS 18, including Eye Tracking, Vehicle Motion Cues, Music Haptics, Voice Shortcuts, and more.
- **Magnifier:** Apple said iOS 18 will add a new Reader Mode to the Magnifier app, and the option to easily launch Detection Mode with the Action button.

iOS 18 Apps

- People familiar with the matter have revealed that [...] Siri will be able to take into account entities such as people and companies, calendar events, locations, dates, and much more [...] when generating replies and summaries [...]
- In pre-release versions of Apple's operating systems, the company has been working on a notification summarization feature known as "Greymatter Catch Up." The feature is tied to Siri, meaning that users will be able to request and receive an overview of their recent notifications through the virtual assistant.
- Apple plans to introduce AI-powered text summarization and transcription to its built-in applications. We have since learned that the company intends to bring these features to Siri as well.
- This ultimately means that Siri will be able to answer queries on-device, create summaries of lengthy articles, or transcribe audio as in the updated Notes or Voice Memos applications.

iOS 18 Siri

- Secure Enclave in M2 Ultra and M4 chips

"to help isolate the data being processed on its servers so that it can't be seen by the wider system or Apple."
With the confidential-computing approach, Apple will be able to handle processing of AI-related data in the cloud while making it extremely difficult for hackers to gain access to the data even in the event of a data breach. It would also reduce Apple's burden of having to hand over personal data from its servers in the event of a government or law enforcement request.

- Siri access to third party apps

"Add this address to his contact card."

"Bring up that article about cicadas from my Reading List,"

"Send the photos from the barbecue on Saturday to Malia,"

"Play that podcast that Jamie recommended,"

"When is Mom's flight landing?"

- Warn when using ChatGPT
- Proofreading
- Summarize

users can select text and have it recapped in the form of a digestible paragraph, bulleted key points, a table, or a list.

- Whisper accurate transcription
- Notes and Phone app record, transcribe, summarize audio participants notified, summary at call end
- Natural language for photo/video search

Apple AI

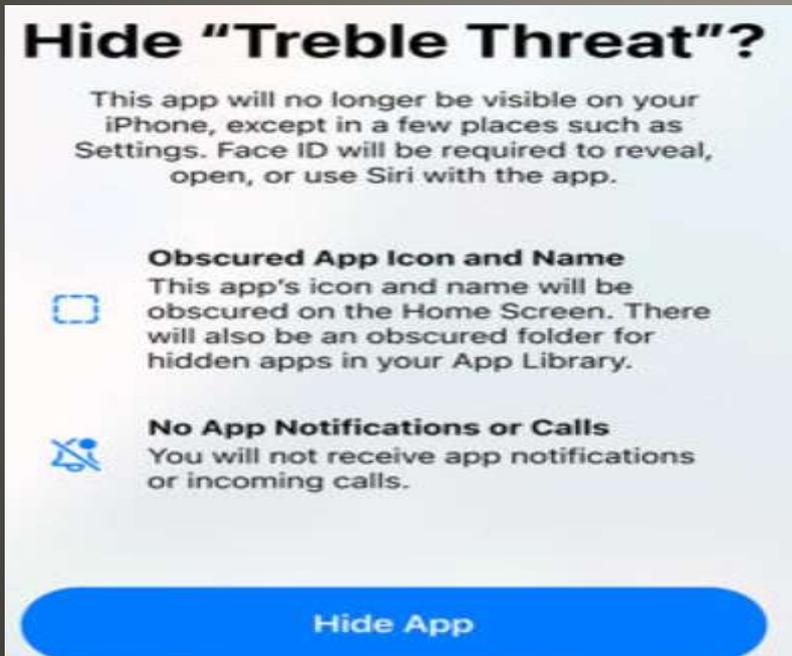
- Password autofill feature
- Stores on device
- FaceID or Touch ID



- Helpful <-> Harmful

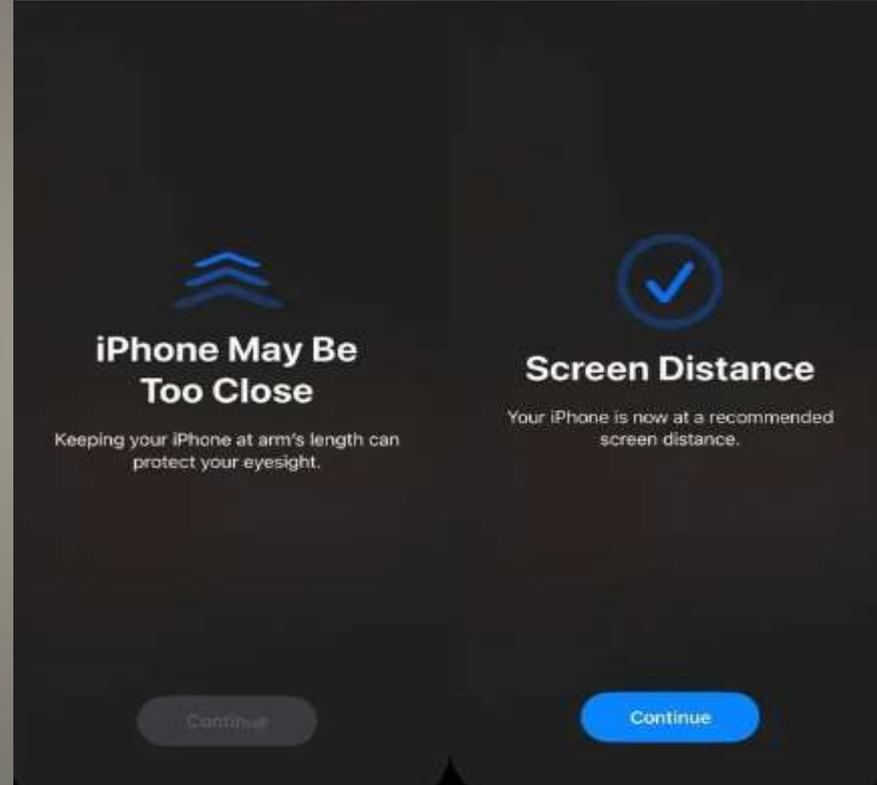
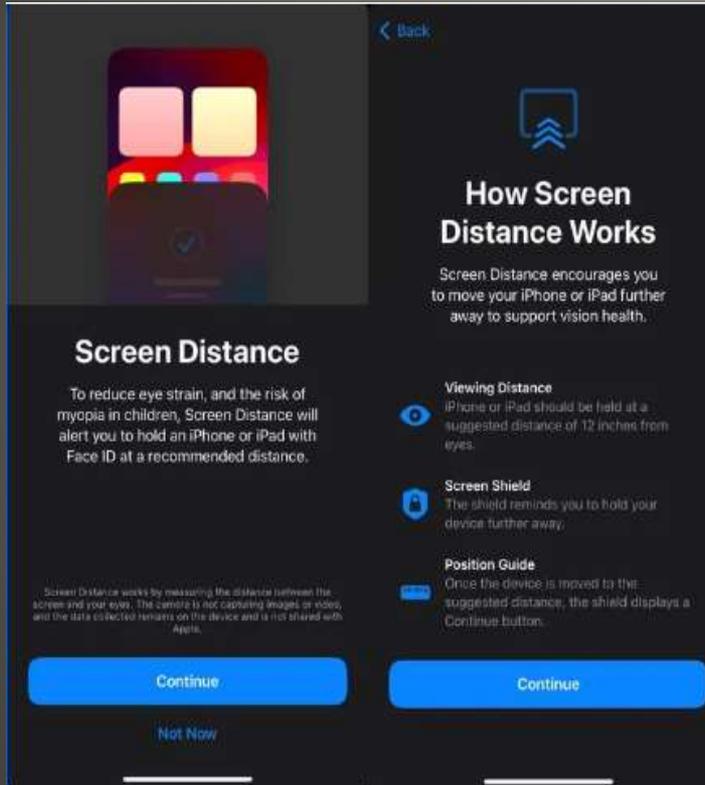
iOS

- Lock App
Long Press > Require Face ID
- Hide App
Long Press > Require Face ID > Hide



Lock and Hide Apps iOS 18

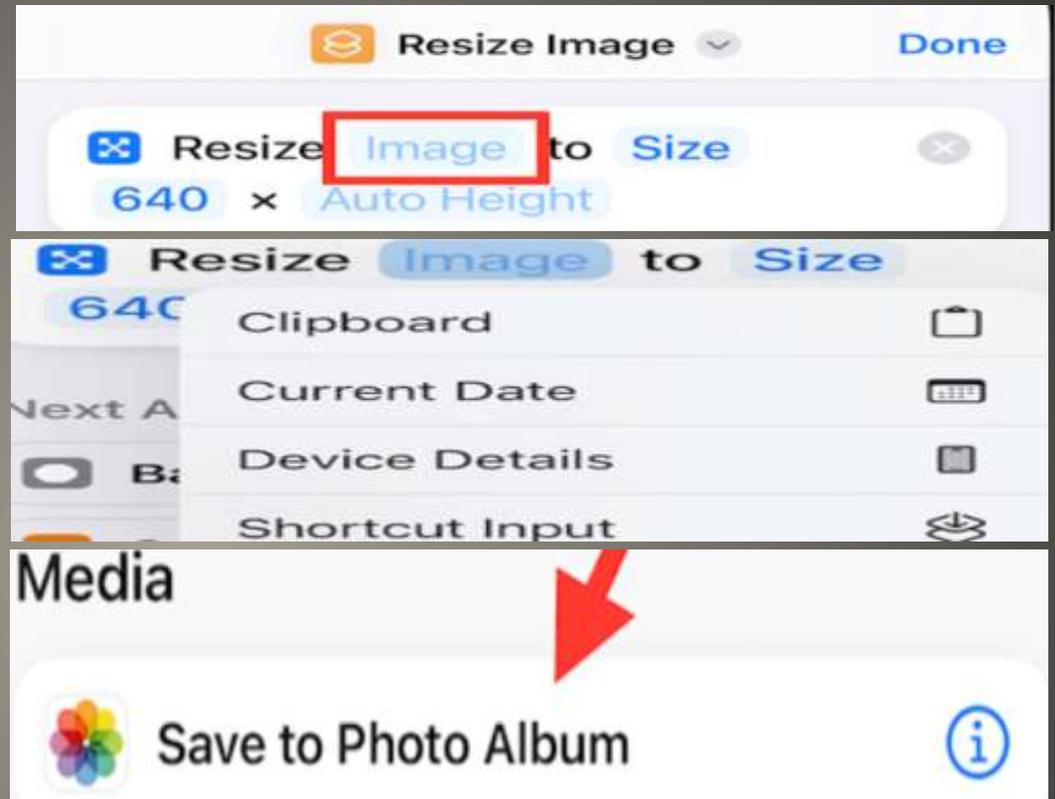
- Kurt the Cyber Guy Passwords & Passkeys
- Screen Distance



ios

- Using Shortcuts
- Shortcuts app +
- Add Action
- Resize Image
- Tap Image
- Shortcut Input
- Save to Photo Album
- Info icon
- Show in Share Sheet
- Done

- Select Photo



Resize iDevice photos

- macOS mouse, trackpad
- iPadOS touch
- Yeahbut iPad Pro M4 has keyboard & trackpad
- Sidecar Duet Display

Virtualize MacOS in iPad Pro M4?

- Video, Photos, Apps, ...
- Control Center + Screen Recording
- Swipe down for Control Center
- Count down
- Long press record button Microphone on
- Stop
- Saved to photos

iPad screen recording

- iDevices & macOS
- Synch across devices is using iCloud photos
- One hidden folder
- Photos app
- Select first photo
- Three dots
- Select Hide from drop down

- To access hidden folder
- Photos app
- Album tab
- Utilities tab
- Hidden

To remove Photo from Hidden
Select Photo
three dots
select Unhide

Hidden Album in Photos

- macOS
- Turn On Hidden Album
- Photos App
- Menu bar Display Hidden Photo Album

- Select photo
- Control-Click
- Select Hide from drop down

Hidden Album in Photos

- Hold Button



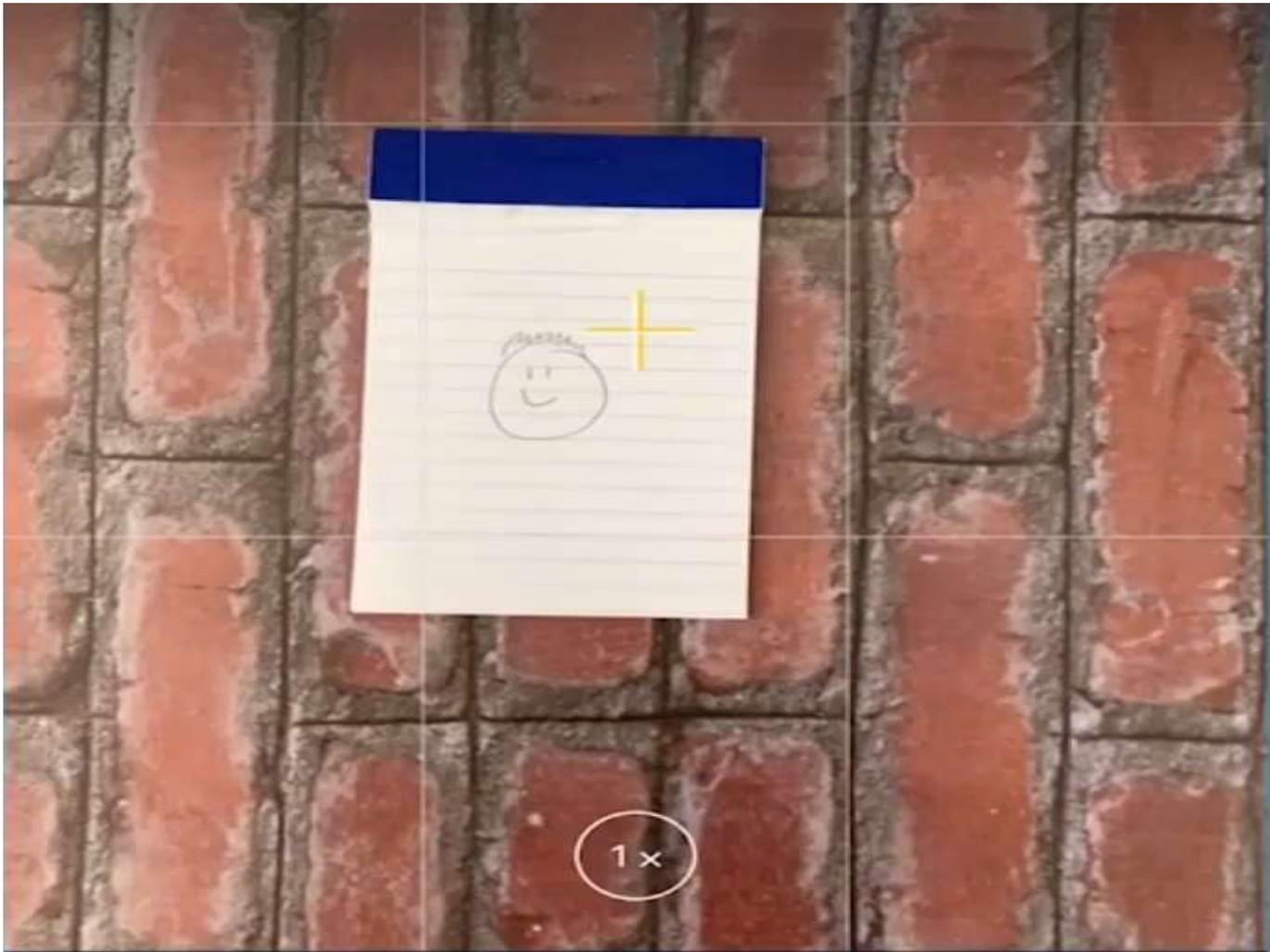
iPhone Hold Button

- Settings > Camera > Grid

Grid



iDevice Camera level



SLO-MO

VIDEO

PHOTO

PORTRAIT

SQUARE

- 3D touch
- Timer

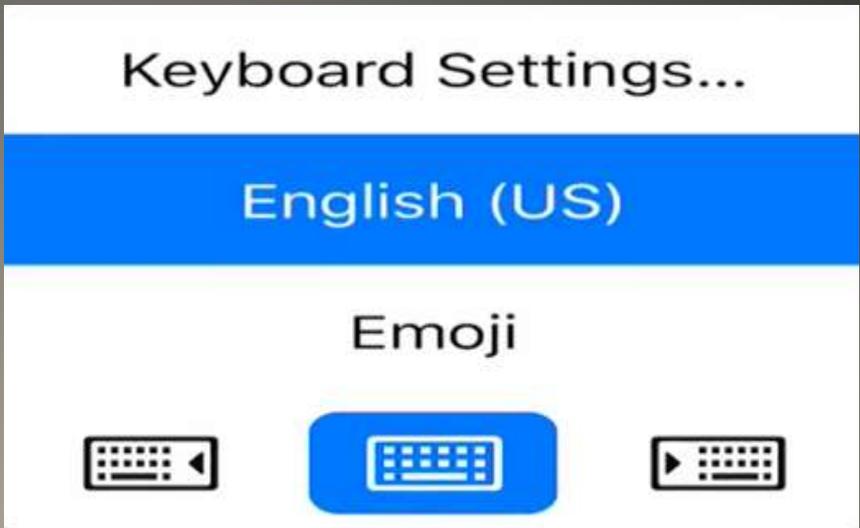


Control Center Extra Functions

- Flashlight
- Do Not Disturb
- Camera



Control Center Extra Functions



Right or Left handed keyboard

- Long Press

🔒 google.com



Request Desktop Site

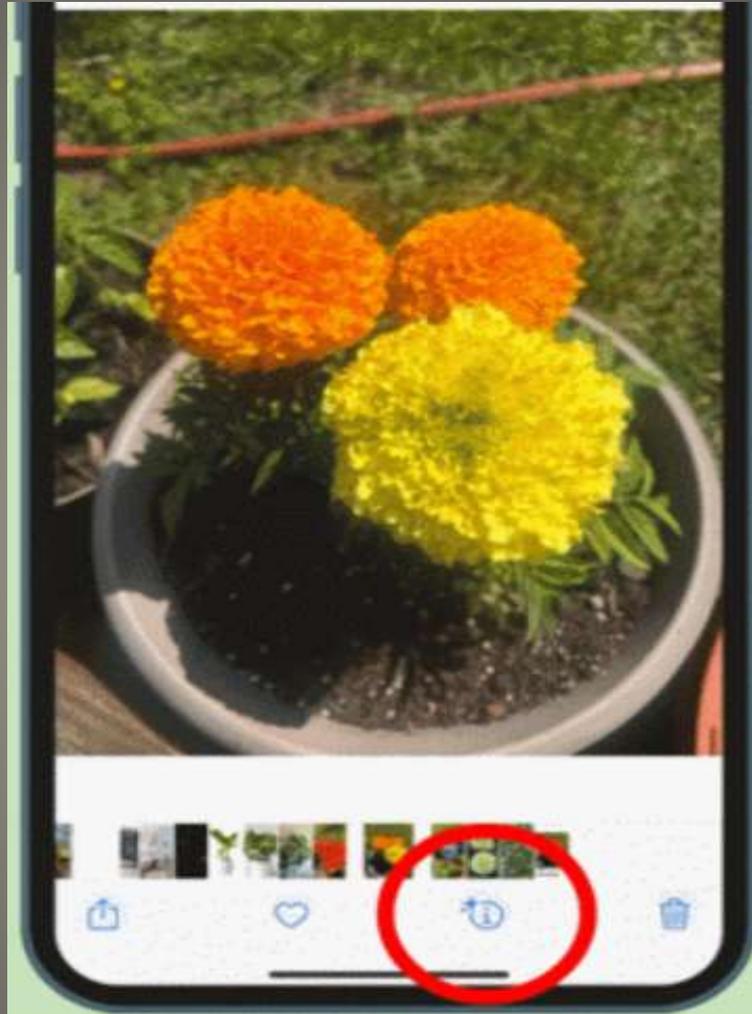
Reload Without Content Blockers

View Desktop version

- Support for Samsung Monitors



macOS DisplayBuddy



Visual Lookup

- Add Text Using Markup
- Add Text Using Freeform
- Add Text Using Pages
- Add Text Using Third-Party Apps
- Add Text Using a Web App
- Alternatively, Use a Computer

Add Text to Any Image

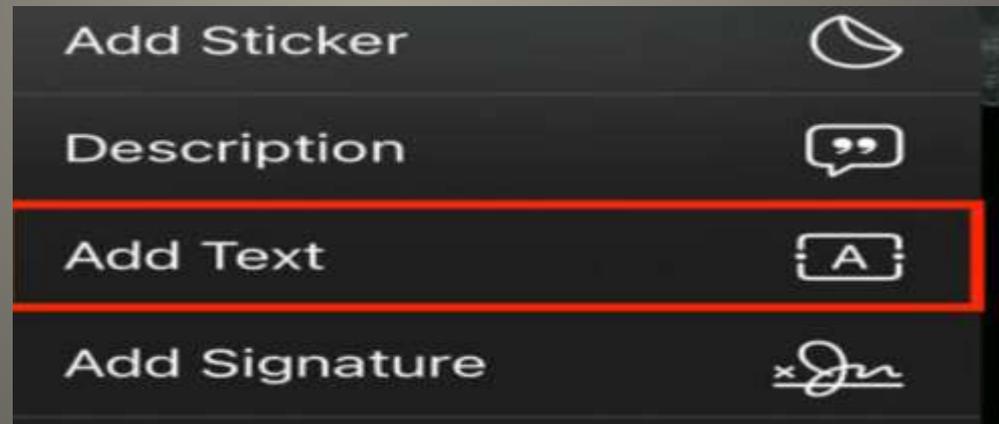
- Photos > Edit



- Markup

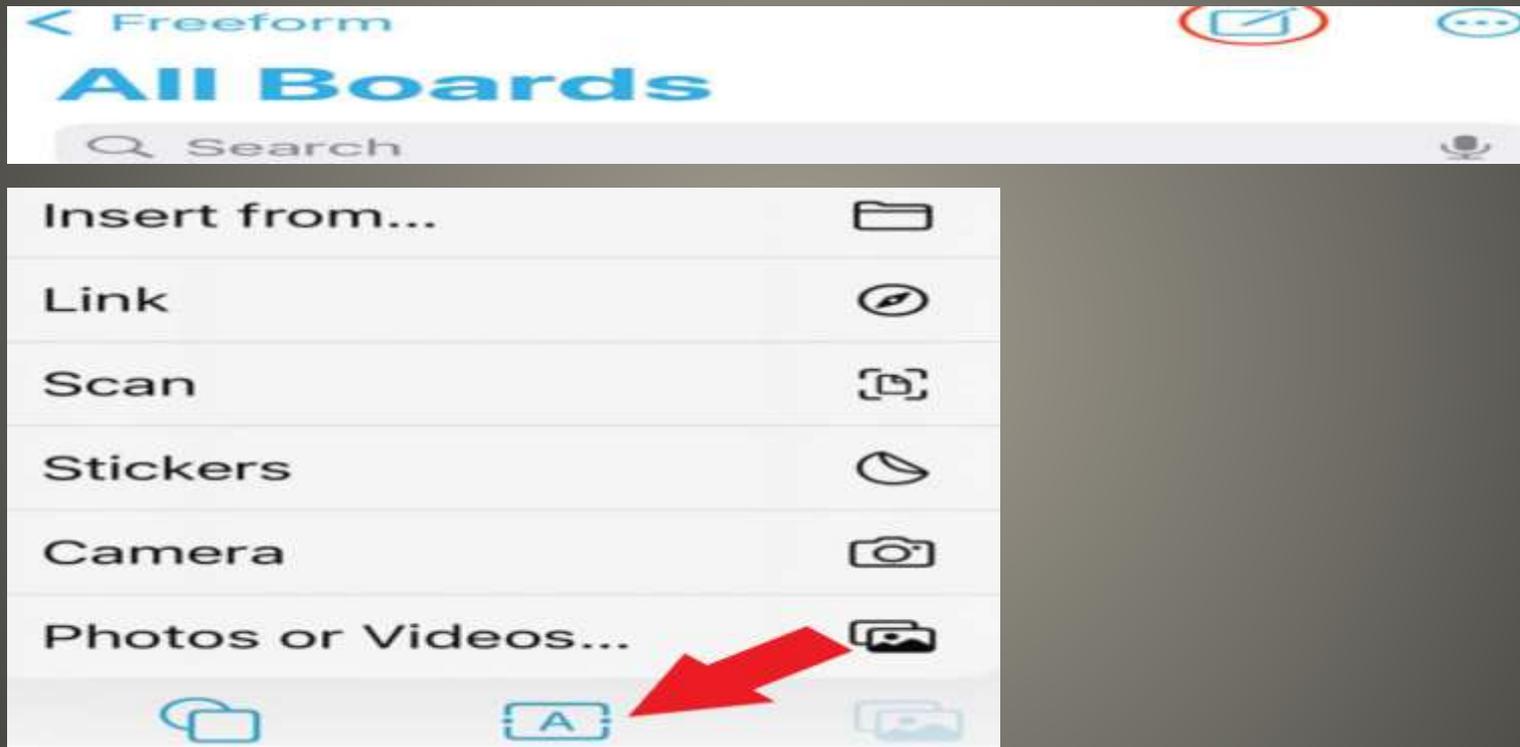


- Add Text
- Adjust
Font
Size
Location
- Done



Add Text using Markup

- Freeform collaborative whiteboard tool
- Output is PDF document
- Apple App Store



Add Text using Freeform

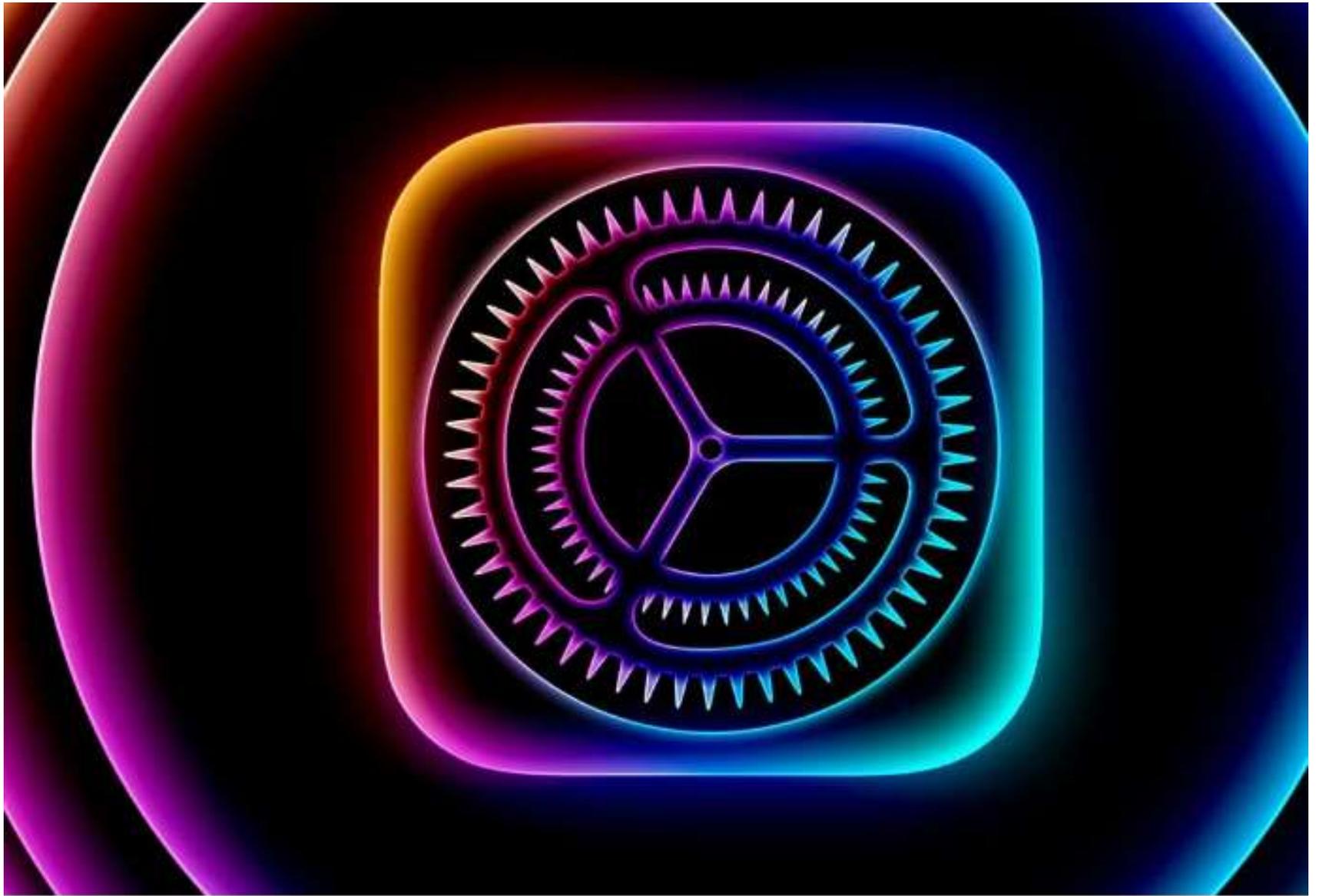
- Word processor
- Apple App Store



Add Text using Pages

- Add Text Using Markup
- Add Text Using Freeform
- Add Text Using Pages
- Add Text Using Third-Party Apps
- Add Text Using a Web App
- Alternatively, Use a Computer

Add Text to Any Image



- iOS iPadOS
- UK Legal requirement 5 years
- Google & Samsung 7 years

iOS iPadOS Support

- Pixels on display Hardware function



iPad M4 Pro Security Feature

- Apple devices since 2023
- FCC device certification reports
- Why does that *Matter*?

Thread Radio

- Last MIG RetroArch Apple TV
- Reverse decision to allow video game emulators App Store
- Delta old handhelds Nintendo Game Boy
- PPSSPP
- Emulators and legal concerns

Gaming Emulators

- MacBook Pro: 2018 and later
- MacBook Air: 2020 and later
- Mac mini: 2018 and later
- iMac: 2019 and later
- iMac Pro: 2017
- Mac Studio: 2022 and later
- Mac Pro: 2019 and later

macOS Sequoia

- iPad Pro: 2018 and later
- iPad Air: 2019 and later
- iPad mini: 2019 and later
- iPad: 2019 and later

iPadOS 18

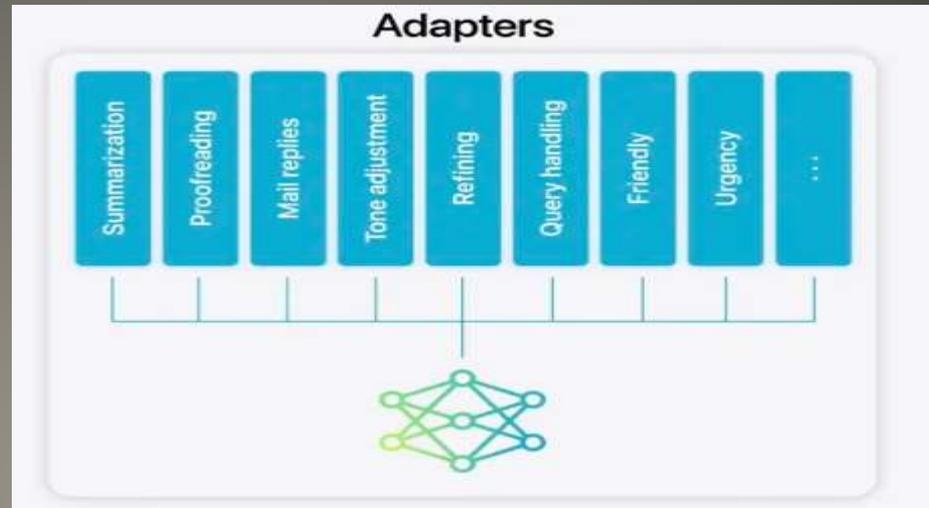
- iPhone 15
- iPhone 15 Plus
- iPhone 15 Pro
- iPhone 15 Pro Max
- iPhone 14
- iPhone 14 Plus
- iPhone 14 Pro
- iPhone 14 Pro Max
- iPhone 13
- iPhone 13 mini
- iPhone 13 Pro
- iPhone 13 Pro Max
- iPhone 12
- iPhone 12 mini
- iPhone 12 Pro
- iPhone 12 Pro Max
- iPhone 11
- iPhone 11 Pro
- iPhone 11 Pro Max
- iPhone XS
- iPhone XS Max
- iPhone XR
- iPhone SE (2nd generation)
- iPhone SE (3rd generation)

iOS 18

- In iOS 18, Apple Intelligence is codenamed Graymatter. There are references to a waitlist, with specific strings that say “Join the Graymatter Waiting List” and “Joined Waitlist.” There is also wording that refers to it as a “limited preview.”
- “While Graymatter is in limited preview, you may experience unusually slow responses when not in a supported region.”
- Apple Intelligence is free for users and will be available in beta as part of iOS 18, iPadOS 18, and macOS Sequoia this fall in U.S. English.

Apple Intelligence

- Local Adapters

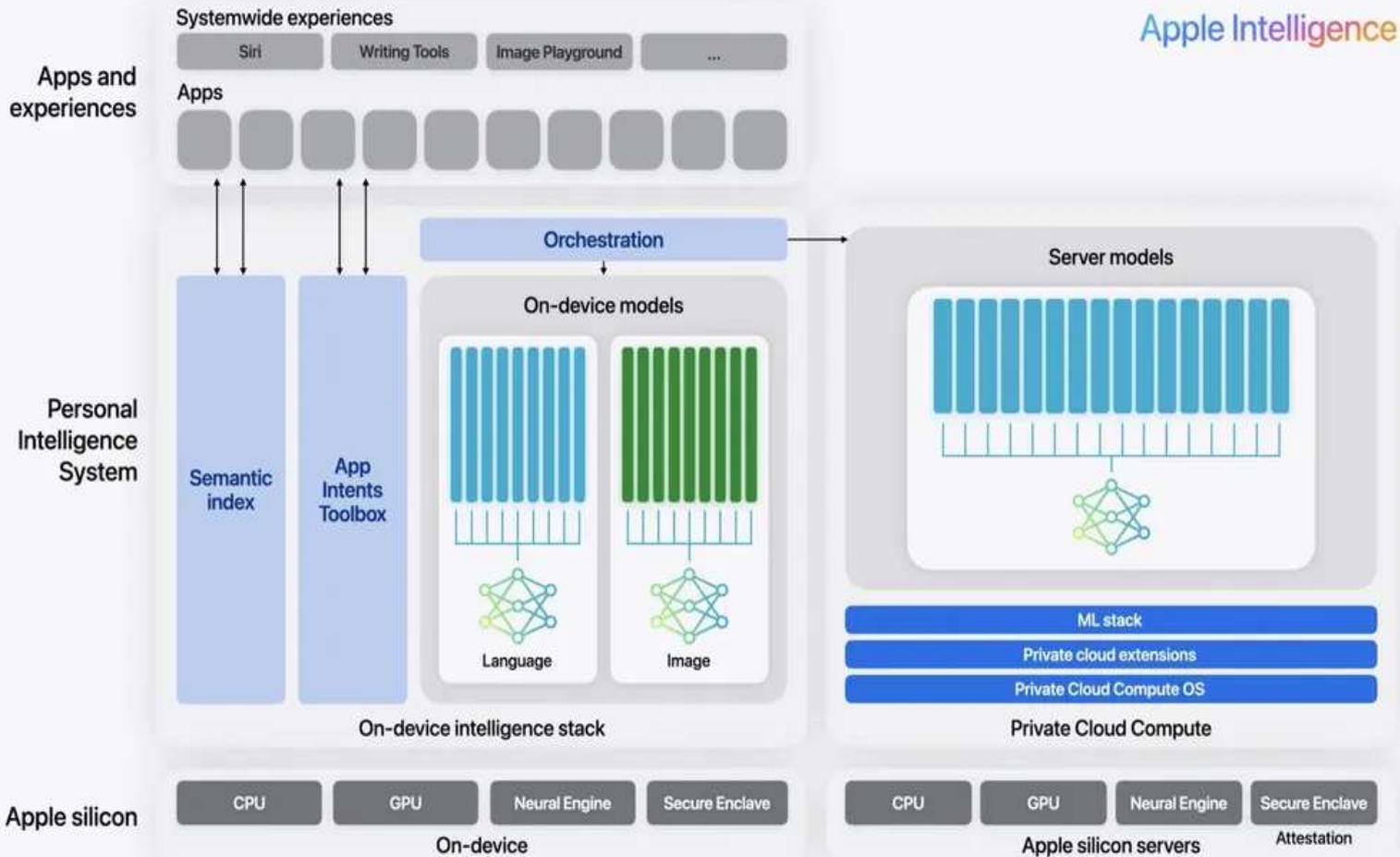


- Speculative Decoding
- Context Pruning
- Group Query Attention

NPU Required

M-Series macs & iPads iPhone 15 Pro & Pro Max

Apple Intelligence



Apple Intelligence

- Private Cloud Compute servers
- Own OS iOS foundations - no shell
- Secure Boot Secure Enclave encryption keys/device
- Trusted Execution Monitor signed & verified code can run
- No persistent storage
- Orchestration – Cloud or Local
- ChatGPT with user permission

Apple Intelligence

- On Device
- Secure cloud infrastructure private to individual
- Users content & data

AND

- User can grant permission to access ChatGPT 4o
- Apple Intelligence Siri Intelligence Siri Intents
- Sell more hardware? Just use Private Cloud Compute?
On device => Your data
Models are different
Apple Intelligence design
Use of ChatGPT "always allow?"
Vision Pro with M2 chip - M2 chip is busy
- Functions: writing assistance
Image creation
Siri cognitive capabilities
- Language set to English
- Not in EU DMA restrictions

Apple Intelligence

- Apple will not share Apple user data with OpenAI
- OpenAI will not train its models with Apple user data



Apple and OpenAI

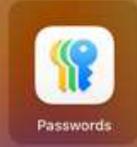
- On Device
- Secure cloud infrastructure private to individual
- Users content & data

AND

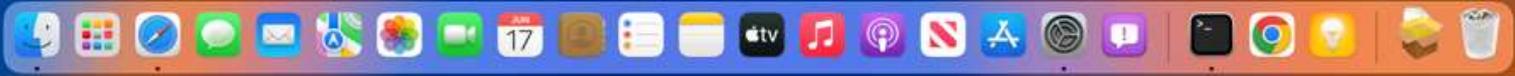
- User can grant permission to access ChatGPT 4o
- Apple Intelligence Siri Intelligence Siri Intents

Apple Intelligence

pasd



Launchpad



Apple Password

- Passwords App locked
- Import Passwords? .csv format
- Should not replace existing passwords
- Ability to review saved passwords
- Enable Password Notifications?
- View saved credentials
- Manage Passkeys
- Create rotating verification codes
- Review saved Wi-Fi logins
- Receive alerts for passwords in compromised data leaks
- Family Passwords

Apple Passwords



806 >

All



3 >

Passkeys



0 >

Codes



40 >

Wi-Fi



51 >

Security



8 >

Deleted

SHARED GROUPS



Family Passwords

2 >

Apple Password

- Apple Devices
- AND iCloud Windows App
- Not offered:
 - secure notes Apple Notes
 - Credit Card Apple Wallet
 - Cross Browser authentication
 - 2-factor authentication

Apple Password



Time & Findable Low Battery



Cellular signal strength indicator, Wi-Fi Calling, and Wi-Fi icon.

Alarm clock icon, 72% battery level, and battery icon.

Power Button to Control Center



Chess



Chess

- Enhance dialogue with HomePod
- Smart subtitles
 - Off -> On when TV muted or rewind 10 seconds
- InSight - Actor background song (add to Music library)
- 21:9 projector support
- Better screensaver
- Best TV shows on Apple TV Plus

tvOS 18

- Siri 2.0

Increased ability to understand and respond conversational language

Knowledge of Apple ecosystem

- Agent behaviors

Content aware tailored to user

- ChatGPT via Apple Intelligence

- Privacy Private Cloud Compute

- Photos upgrade

New layout Customization options Custom categories & galleries

Natural Language search *Maya skateboarding in tie-dye shirt*

- Photo cleanup tool

Remove distracting objects

- Memories

Memory movie - natural language processing

- Image Playground DALL-E or Midjourney like

- Genmojis - custom emojis

- Rewrite different versions adjust tone Apple ecosystem wide

- Proofread Grammarly like

- Summarize short paragraph, bullet points, table

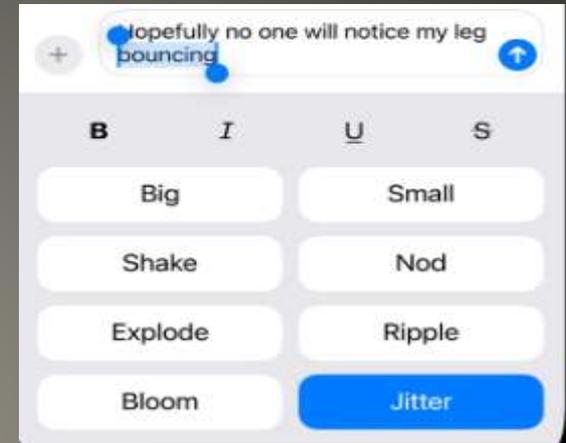
- Reduce interruptions

- Smart Reply - Mail

- Priority Message - Mail

iOS 18

- Scheduled messages
- New text formatting options
Bold, italicize, underline, strikethrough
Animated effects explode, nod, ...
- Tapback improvement
Any emoji or sticker
Live stickers
- Satellite iPhone 14 or later
- RCS support
- Apple Intelligence



iOS Messages

- Any desktop web browser
Scan code with iPhone after iOS 18
- Redeem rewards
- Tap to Cash Apple Cash tap two iPhones together
Security?
- Apple Wallet tickets
Stadium details,

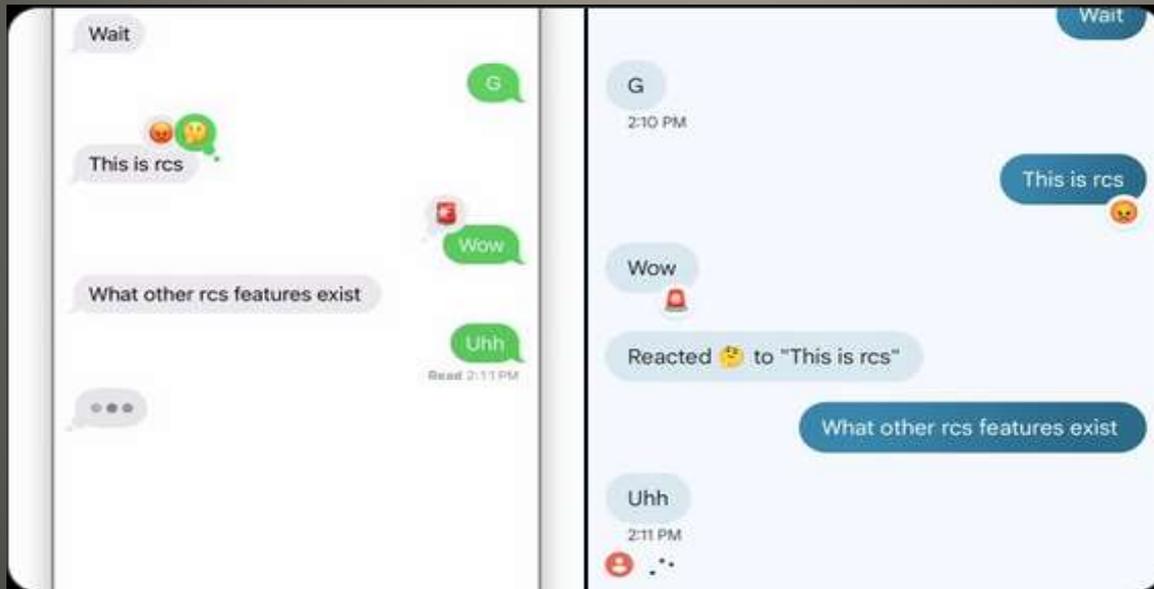
Apple Pay

- Auto manufacturer's custom

In iOS 18, when an iPhone is connected via Bluetooth to a vehicle without CarPlay, Siri's audio quality can be significantly improved through the new option "Respond over Media Source". Users will be able to enable this feature by going to Settings "Siri & Search" → "Siri Responses" → "When Connected to Car Bluetooth".

CarPlay

- First instance?
- Emoji an Apple thing
- Hit & miss
- iPhones on T-Mobile, AT&T, Verizon



RCS Messaging in iOS 18

- RCS more modern texting/messaging
- Typing indicators, group chats, high quality media
- Delivered status
- High quality media
- Vibrant
- RCS indication



RCS Messaging in iOS 18

9:41



Aileen

Made it just in time for the superbloom.



Wow. It's just so vibrant! You really captured it.



Tap to listen

Can't wait to see the video!

Delivered



Text Message - RCS



- Math any/everywhere
- Calculator to iPadOS
- Set preferred Home Hub
- Wallet

To help prevent fraud, when adding an ID to your iPhone, you may be asked to take a Live Photo instead of, or in addition to, conducting a series of head and facial movements. The Live Photo is evaluated by your device and Apple to help ensure that the photo being submitted is of a live person and that the same live person is submitting their photo.

- FaceTime

FaceTime in Low Data Mode now uses more data when network conditions are good for improved video call quality.

- Control Center

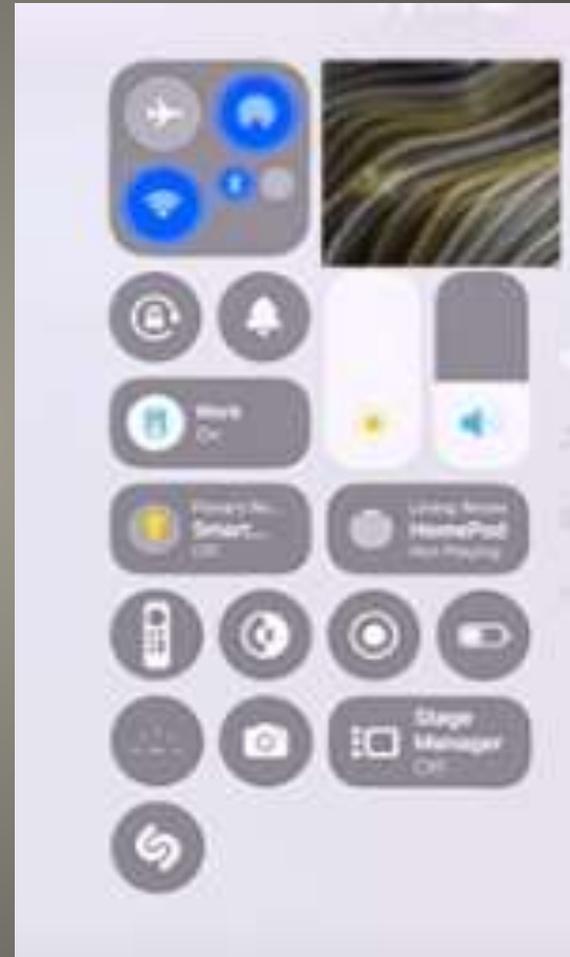
Customize & rearrange toggles from Control Center Tap & Hold Drag & Drop
Create multiple pages of shortcuts

iOS 18

- Apple released the first developer beta of iOS 17.6, watchOS 10.6, macOS 14.6, tvOS 17.6, and visionOS 1.3 for all devices.
- Apple Pay Later -> Affirm Truth in Lending Act ?
- EU Digital Markets Act breach by Apple App store

AND

- Power Button Press & Hold - avoid accidental tap
- Rearrange



Control Center

- AirPods Pro (2nd generation) with MagSafe Charging Case (USB-C): 6F8
- AirPods Pro (2nd generation) with MagSafe Charging Case (Lightning): 6F8
- Powerbeats Pro: 6F8
- Beats Fit Pro: 6F8
- AirPods Pro (1st generation): 6A326
- AirPods (3rd generation): 6A326
- AirPods (2nd generation): 6A326
- AirPods Max: 6A326

- Synch & Be Patient

AirPods firmware update

- Impact: When your headphones are seeking a connection request to one of your previously paired devices, an attacker in Bluetooth range might be able to spoof the intended source device and gain access to your headphones
- Description: An authentication issue was addressed with improved state management.

AirPods vulnerability

- **Siri Interactions:** This feature lets you interact with phone calls, messages, notifications, and more by simply nodding or shaking your head.
- **Voice Isolation:** This feature is making the jump from the iPhone, iPad, and Mac directly to the AirPods Pro. Machine learning, running on the H2 chip in AirPods Pro and the paired iPhone, iPad, or Mac, isolates and enhances voice quality while removing significant background noise for the listener.
- **Personalized Spatial Audio for games:** When using AirPods Pro, gamers will now have the best wireless audio latency Apple has ever delivered for mobile gaming. AirPods Pro users can also enjoy improved voice quality, including 16-bit and 48kHz audio, when chatting with teammates and other players.
- **Custom Adaptive Audio:** Once this feature is released, users can ask Siri to "remove more noise" or "remove less noise," which makes Adaptive Audio more customizable for your everyday usage.

AirPods futures?

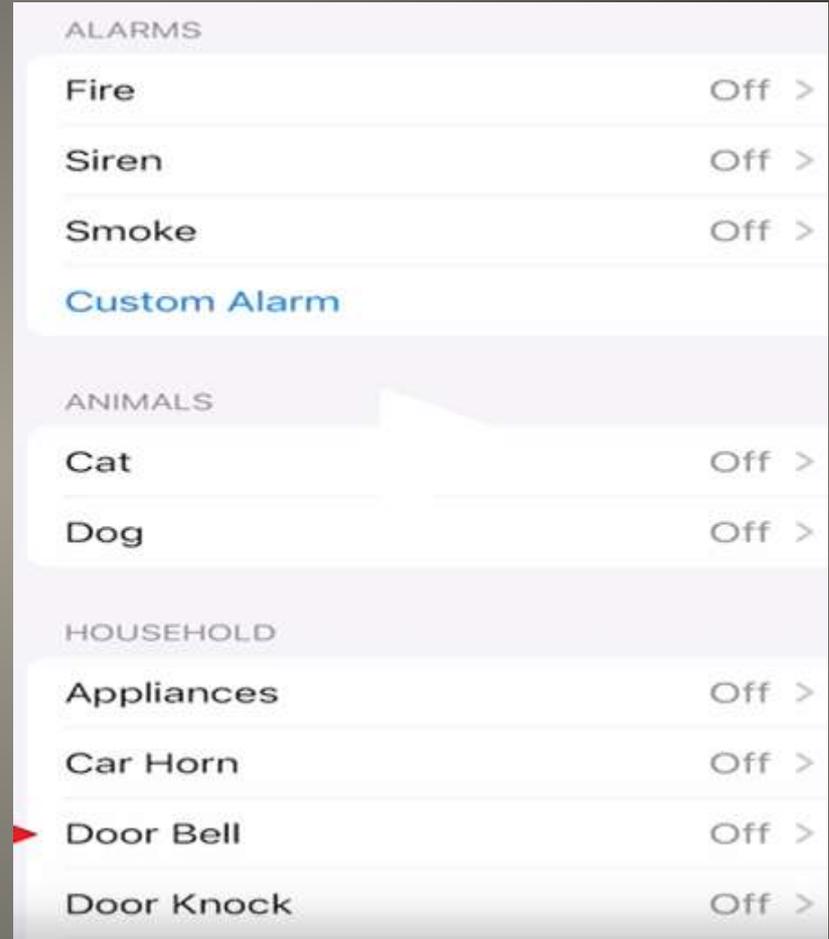
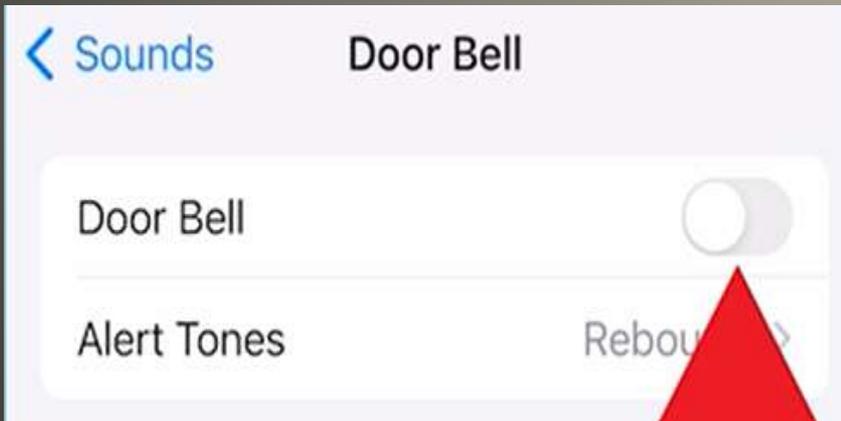
- Macs, iPads, iPhones
Same Wi-Fi, same iCloud account, Bluetooth turned on
File > Edit > Copy | Cut Paste
CMD + C copy
CMD + X cut
CMD + V paste
- Clipboard history
Mac Finder > Edit > Show clipboard

Universal Clipboard

- Settings > Accessibility > Sound Recognition



- Sounds



Sound Recognition

- Replace Spotlight CMD + Space
- OpenAI website
- Screenshots, analyze files, review text
- Macs with M-series Sonoma or later

ChatGPT for Mac

- None of us are as experienced as all of us
- Awareness, Preparedness, Understanding
- Participate
- Topic Suggestions
- Questions: scccMUG@gmail.com



- Helpful < - > Harmful
- Awareness, Preparedness, Understanding

Computer Club, Help Center, SIGs,
Presentations, classes

Cyber Security SIG meetings, NEWSBLOG
Internet

- Questions, suggestions, comments?

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