

iOS Version 16 Generation (16.0 / 16.1 / 16.2 / 16.3 / 16.4 / 16.5) 2023 Release Notes

New Features

- ☐ End users using iOS 16 can back up their device over LTE cellular connection, 5G or Wifi connection (95276719)
- ☐ The RoomPlan framework is now available in iOS 16, enabling 3D parametric model creation of an interior room. The framework uses a device's sensors, trained machine learning models, and RealityKit rendering capabilities to capture the physical surroundings of an interior room
- ☐ APIs are available for end-to-end scanning experience, real-time data structures for custom UI creation, and both USD and USDZ generation of 3D room models (84170837)
- ☐ iOS16 permits developers to classify incoming SMS from unknown numbers into 12 new sub-categories within Transaction and Promotion categories for improved organization (95276296)
- ☐ For Indian users, Messages now supports event extraction from SMS. These event and appointment messages are presented as Siri suggestions and also are presented to users in Messages thread and in Calendar Inbox (95276513)
- ☐ For selected US Carriers, Messages extends the "Report Junk" feature to enable users to report SMS/MMS junk to Carriers
 - Feature is visible inside Messages from Unknown Senders (95276623)
- ☐ iOS16 Messages now supports the ability for customers with a dual SIM iPhone to filter their messages based on their SIMs (95276784)

Functional Deprecations

iOS 16.0:

- ☐ To improve security, CGImageCreate enforces parameter correctness on macOS 13 Ventura, iOS 16, iPadOS 16, watchOS 9, and tvOS 16. Passing an incorrect

CGImageByteOrderInfo is no longer supported, and will result in images failing to load (94855401)



- ☐ End user should avoid MKMapLandscape, MKStandardMapConfigurationMapMode, [MKMapView configuration], and [MKStandardMapConfiguration showsBuildings], rather use their functional equivalents MKMapElevationStyle, MKStandardMapConfiguration.EmphasisStyle, and preferredConfiguration, instead. showsBuildings is now deprecated (93449747)
- ☐ iOS16 deprecated the SKDownload API and removed the option to upload non-consumable in-app purchase assets for Apple to host. In addition, support for managing these assets in App Store Connect is no longer available as of April 2022 (89764253)
- ☐ FTP is deprecated for URLSession and related APIs. Please adopt modern secure networking protocols such as HTTPS (92623659)
- ☐ MetalFX effect outputs aren't designed to be consumed by the CPU. Outputting to a texture that is read only by the CPU might result in synchronization issues (91515075)
 - *Workaround:* If a CPU reading of the MetalFX output is desired, instead of encoding the MetalFX effect as the last item in a command buffer, encode a dummy blit that consumes the MetalFX output texture (a 1-pixel region blit is fine) in the command buffer. After the command buffer with the dummy blit is finished, reading of the MetalFX effect output texture with CPU synchronizes correctly
- ☐ The MTLResource.gpuHandle is deprecated. Use gpuResourceID, which functions as a replacement (92862429)

iOS 16.1:

- ☐ End users may receive an alert to turn on Wi-Fi when pairing a Matter accessory (98460235)

- *Workaround:* Ensure your device is connected to your Wi-Fi network
- ☐ The system memory allocator free operation zeroes out all deallocated blocks in iOS 16.1 beta or later. Invalid accesses to free memory might result in new crashes or corruption, including:
- ☐ Read-after-free bugs that previously observed the old contents of a block may now observe zeroes instead. Write-after-free bugs may now cause subsequent calls to calloc to return non-zero memory. To debug these issues, use Address Sanitizer and Guard Malloc (see libgmalloc(3)) (97449075)

Bug Fixes

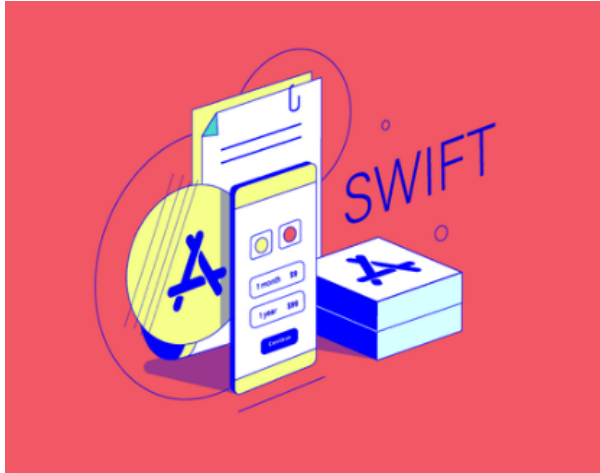
iOS 16.0:

- ☐ Removed the ability to create offline attachments
- ☐ Multi-line Text fields are auto-masked when added as a standard field on a custom record type
- ☐ Infinite spinner when trying to delete a shared folder while an expired user resolved
- ☐ American Express cards might need to be removed and re-added to Wallet after updating to iOS 16 beta 6 or later (97990752)

iOS 16.4.1

- ☐ Offline upload restriction not appearing after using the Scan a Document feature resolved
- ☐ Resolved the pushing hands emoji does not show skin tone variations
- ☐ Siri does not respond in some cases fixed

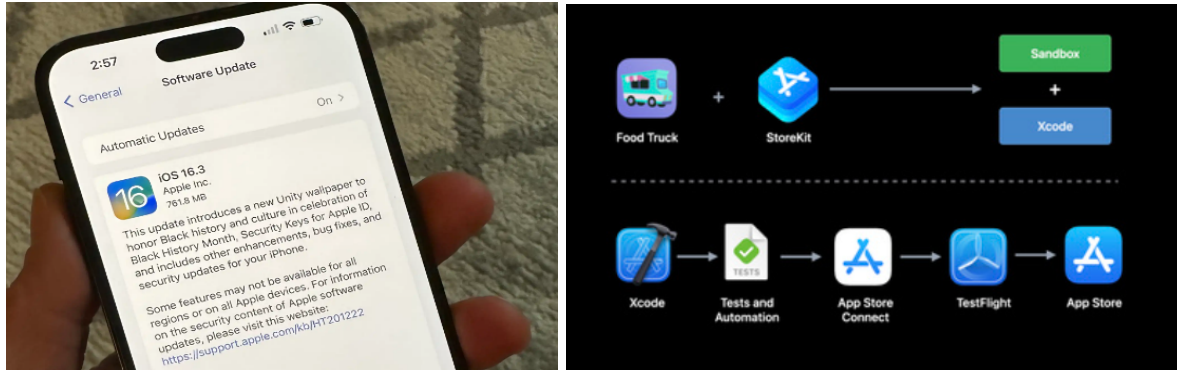




HealthKit

iOS 16.0:

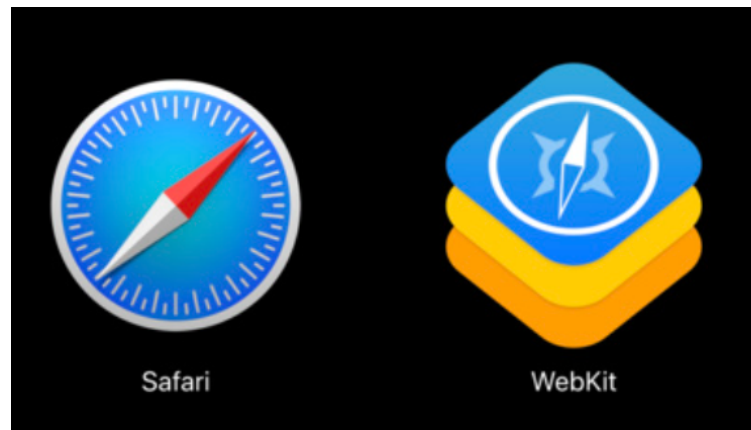
- ☐ HealthKit workout APIs now support multisport workouts with activities of swimming, cycling, and running (82588168)
- ☐ New data types for running workout metrics like running power, ground contact time, vertical oscillation, running speed, and stride length (82974514)
- ☐ A new data type is available to track AFib History (95315701)
- ☐ The HealthKit framework has a new Vision Prescription data type that allows developers and users to store prescription information received from eye care professionals featuring a new set of HKSample subclasses that allow developers to encapsulate prescriptions for glasses and contact lenses
- ☐ End users can directly store their prescription information from the Health app as well. Most regions require the actual prescription document to purchase glasses and contacts, this feature also allows the storage of attachment files
 - Due to the potential privacy concerns around sharing unintended additional details from the prescription, the HealthKit framework has a new authorization API to allow users to authorize prescriptions on a per-sample basis



StoreKit

- ☐ A property `recentSubscriptionStartDate` is included in `RenewalInfo`. It represents the date that marks the start of the most recent period of continuous subscription. A period is considered a continuous subscription if there is no more than a 60-day gap between any two subscribed periods (86599570)
- ☐ Product has new properties for localizing prices and subscription periods. For iOS 15, iPadOS 15, macOS 12, tvOS 15, and watchOS 8 or later use `priceFormatStyle` to format numbers derived from price. Use `subscriptionPeriodFormatStyle` to format durations of time relating to a subscription period. On iOS 16, iPadOS 16, macOS 13, tvOS 16, and watchOS 9 or later use `subscriptionPeriodUnitFormatStyle` to format single units of a subscription period (93780442)
- ☐ A property `environment` is included in `Product.SubscriptionInfo.RenewalInfo` and `Transaction`. It represents the server environment in which the `RenewalInfo` and `Transaction` occurred, respectively (85988753)
- ☐ `AppTransaction` allows developers to cryptographically verify that the app was purchased on the App Store (86739279)
- ☐ The `recentSubscriptionStartDate` property is included in `Product.SubscriptionInfo.RenewalInfo`. It represents the date that marks the start of the most recent period of continuous subscription.
 - *Please Note: A period is considered a continuous subscription if there's no more than a 60-day gap between any two subscribed periods (86599570)*
- ☐ The `priceLocale` property is included in `Product`. Use this property to format price values deriving from the product's decimal price (81480683)

- ☐ Present the offer code redemption sheet with the `offerCodeRedemption(isPresented:onCompletion:)` view modifier in your SwiftUI apps (85321941)
- ☐ The StoreKit Messages API allows you to control when App Store messages are displayed in your app (85321880)
- ☐ All StoreKit APIs are now annotated for sendability and main actor isolation (84157048)
- ☐ Fixed an issue where restoring transactions wouldn't prompt for authentication or restore any transactions if there was no App Store account signed in (99506258)
- ☐ Fixed the issue wherein purchasing or restoring in-app transactions with hosted content would block new purchases or restores from processing (100117681)



WebKit

iOS 16.4.1

- ☐ Impact: Processing maliciously crafted web content may lead to arbitrary code execution. Apple is aware of a report that this issue may have been actively exploited
- ☐ Improved memory management

Tags: apple, iOS, iOS16, appleiOS, appleiOS16, releasenotes, iOSreleasenotes16, scan, scanning, newfeature, pdf, jpeg, applepdf, applejpeg, macbook, macbookupdate, macbookos16, iPad, iPad16, applewatch, applewatch16, storekit, applestorekit, applestorekit16, toolkit, appletoolkit, appletoolkit16, webkit, applewebkit, applewebkit16, tvOS 16, watchOS16, beta, 5G, wifi, bluetooth

Resources: [iOS-release-notes/iOS-16-release-notes](#), [iOS-version-16.8.0](#), [iOS-16-4-1-now-available-features-fixes](#), [iOS-ipados-release-notes/ios-16_1-release-notes](#)