macOS 10.13 High Sierra

November 8, 2017

Safari

✓ Faster and consumes less power than previous versions.

- 80 percent better performance on modern JavaScript.

✓ Blocking of auto-play videos

✓ Intelligent Tracking Prevention using machine learning to identify trackers and segregate cross-site traffic monitors.

- Six ad industry organizations complain that Safari's Intelligent Tracking Prevention will not only hurt them, but the public as well — but Apple disagrees.

Photos

✓ New view, including a chronological display, and new filtration mechanisms.

- Metadata, including image categorization performed by machine learning routines, are automatically synchronized across devices.

✓ New editing tools have been added

- Selective color modification

- Curve changes

- All edits synchronized from external editors synced back to the photo library.

✓ Opened up its printed photos to third parties

APFS in macOS

✓ Apple File System, or APFS, was designed with all of Apple's platforms in mind, scaling from watchOS to iOS and tvOS to macOS, and taking advantage of the fact that most of the company's products are now using Flash or SSD storage. It also was built with encryption and the security it provides to users as a primary underpinning of the technology.

✓ APFS will not be initially supported on Fusion Drives such as those commonly found in the iMac.

- Unclear precisely when it will be implemented.

Migration of H.264 to H.265/HEVC

✓ Citing the wider adoption of 4K and HDR videography, Apple has added support to macOS for H.265 and HEVC. All High Sierra-compatible machines will support the codec, some in software, and some in hardware.

Metal

✓ Metal 2 includes driver optimizations, and Apple claims that it brings up to a 10 times better draw call throughput.

- More debugging tools are now available

- Mac Window Server has been migrated to Metal as well to enhance performance of the system-wide animations.

✓ Metal 2 brings the ability to use Thunderbolt 3 external enclosures for high performance video cards officially in macOS.

- Will only be added to the operating system in the spring of 2018.

Compatibility

✓ Apple has not put any more limits on High Sierra than already existed on Sierra.

✓ However, High Sierra is the last version of macOS to support 32-bit apps "without compromises."

✓ In January 2018, all new apps submitted to the Mac App Store are required to be 64-bit.

- In the summer of 2018, with all app <u>updates</u> needing to comply with the mandate.

Online Resources

✓ Apple Slides

✓ David Cox Summary

✓ Demo at WWDC 2017