

A central image of a lit sparkler with bright orange and yellow sparks radiating outwards against a dark background.

**GOODBYE
2023**

Another product launch from drone manufacturer DJI occurred in November, in the form of their small Pocket line of vlogging cameras.

The new Osmo Pocket 3 includes a number of improvements over the previous model, the most obvious being the much larger 2.0-inch OLED screen that can also rotate between portrait and landscape formats. Its resolution has also been increased to 314x556 with a brightness of 700 nits. An almost 50% improvement on the previous model.

The camera's sensor is also improved with DJI managing to fit in a 1-inch sensor into the diminutive camera although the camera's aperture does take a hit dropping to f/2 down from f/1.8. The megapixels have also been reduced to 9.4MP which seems like a massive drop from the Osmo 2's 64MP, but with an improved ISO range, higher max video bit rate and 10-bit D-Log M and HLG colour modes, it seems DJI is more focused on improved video capabilities over

photography. This makes sense given the main use case of these cameras. In regards to the camera's video performance DJI are stating improved night time capabilities, and more natural skin tones with increased dynamic range for professional workflows where colour grading is likely to be carried out.

Osmo 3 features 3-axis mechanical stabilisation ensuring stability even during fast camera movements, with multiple rotational speeds. A new Full-Pixel focusing system ensures subjects in the foreground remain in focus making the cam perfect for live-streaming. When Osmo 3 is switched off the screen and gimbal automatically locks into a stored position to keep it safe for next time.

Battery life is improved vastly with a much larger 1300mAh battery, which offers up to 26 mins more life than the previous. And with a 3x faster charging speed, 80% capacity can be charged in just 16 minutes.

The Osmo 3 is available to order starting at £489.00/AU\$849.00 with a Creator Combo pack available for £619.00/AU\$1,129.00.





Released a little while back, the Samsung S23 FE is a budget entry in the Galaxy S smartphone range that really has a lot of bang for the buck.

It features Samsung's floating camera system, the front 10MP selfie camera appearing as nothing more than a small dot. Round the back is a three camera array featuring a 12MP ultra-wide camera, 8MP 3x optical zoom telephoto camera, and 50MP wide-angle camera. Despite the S23 FE entry-level position, it still features Samsung's Nightography system for smooth low-light video and crisp, bright photographs.

The phone features a 6.4-inch 2X AMOLED display that is capable of 1,450 nits peak brightness. To top it off, the phone also has an adaptive 120Hz refresh rate and Vision Booster which automatically adjusts the screen based on lighting conditions, so it remains vivid even in the brightest of conditions.

Powering the phone is an Exynos 2202 Octa-core processor which is kept cool using a vapour chamber, which given this is an entry level phone is quite remarkable to see. Battery life is also decent with a 4,500mAh capacity that can be charged to 50% in just 30 minutes using the optional 25W adapter.

The Samsung S23 FE is available to order starting at £599.00/ AU\$999.00.

Earlier this year, Meta released their new mixed reality headset, the Meta Quest 3 which features a number of improvements on the previous Meta Quest 2 but is not replacing it, as it still remains in the range at a reduced price.

Performance has been improved with a Snapdragon XR2 Gen 2, 8GB of DRAM and storage options of 128 or 512GB. Users should expect better quality graphics but also faster loading times. The headset's displays have been improved with resolution of 2064x2208 per eye for 1218 pixels per inch (PPI). The display also runs at more refresh rates than the Meta 2 with 72, 80Hz adding to the 90 and 120Hz. Motion sickness should also be reduced with an increased field of view (FOV) of 110° horizontal and 96° vertical.

The headset features full-colour passthrough so users can still see their surroundings while stereoscopic depth perception allows users to interact with characters in the room. Audio has been improved with 3D Spatial Audio that has an audio range that's 40% louder than Quest 2.

Comfort has been improved by Meta who have even made provisions for the headset

to sit over glasses. Lenses can be adjusted between 53mm to 75mm. The soft adjustable strap can accommodate a variety of hair styles and head shapes and it is relatively light coming in at just 515grams.

The controllers are an improvement featuring a TruTouch variable haptics that try to replicate the feel of casting a fishing line or swinging a sword as if you were really there. A vast improvement over the prior models basic haptics. Controller free navigation is also made possible with machine learning that learns and follows gestures through the four IR and two RGB cameras. Move hands to tap, scroll and navigate through menus and play.

Meta Quest 3 is fully backwards compatible with access to the full back catalogue of 500+ titles. It can also be used on PC with a separate Meta Quest Link Cable and Air Link. Battery life is slightly improved at an average of 2.2 hours despite having a much larger battery at a capacity of 5,060mAh.

The Meta Quest 3 is available starting at £479.99/AU\$799.00. As a result of this release the price of the Meta Quest 2 has been reduced to £249.99/AU\$439.99 which could make an ideal Christmas gift.



HEY, THAT'S MINE



Currently in Apple's beta for iOS 17.3 is a great new feature that will ensure another layer of protection against thieves accessing data on your phone called Stolen Device Protection.

Thieves who have managed to observe a user enter their passcode, and then steal the phone can quickly gain access and change passwords. They will then lock users out of their Apple ID's stopping them from remotely wiping the device, turn off Find My and view other passwords. It can be pretty devastating and clearly Apple recognise that a 4 or 6-digit pin is not really good enough to protect important functions like viewing passwords, disabling Lost Mode, erasing content plus many more. With Stolen Device Protection enabled these lower level functions that are a gold mine for thieves will require either Touch ID

or Face ID to gain access.

The new feature goes a step further by requiring Face or Touch ID for performing sensitive actions like changing passwords or the phone's passcode. They will then need to wait one hour and use either Touch or Face ID again. This is not the case if the phone is recognised to be in a familiar location so if users want to make these changes to their device they will not run in to the same problems a thief will who is most likely to have fled the scene.

Stolen Device protection is currently an opt-in feature in the iOS 17.3 beta which can be switched on in Settings > Face ID and Passcode > Stolen Device Protection. Hopefully iOS 17.3 comes out of beta soon, as this is a feature that could save a lot of people time, money and the worry of not knowing what a thief has gotten away with when it comes to this kind of loss.

Action cameras seem to be having a good time at the moment with some pretty decent releases in the last year, with releases like DJI's Osmo Action 4 and GoPro's Hero 12 the rugged entries and last month Insta360 unveiled two models which they hope will de-throne those previously mentioned giants of the category.

The Insta360 Ace Pro is a monster of an action camera. It features a 1/1.3-inch sensor and a new 5nm AI neural processor. Insta360 state that the new AI denoising coupled with the new sensor produces clearer and more stable low-light results in both video (4K30) and stills at 48MP. Another feature called Active HDR automatically turns on when the correct lighting conditions are met ensuring details are reserved in the highlights and shadows. All of this is stabilised by Insta360's Flowstate Stabilisation

which can deal with the extreme shakes and bumps. The Ace Pro can also shoot at 4K60, 4K120 and 8K24 without the aid of the AI or stabilisation. Leica have also been involved in the engineering and provide a Summarit lens with an equivalent focal length of 16mm.

Finally, the camera features an IPX8 water resistance rating, and has a swappable battery which can provide 100 minutes of 4K30 Active HDR video. The battery can be fast charged to 80% in just 22 minutes of 100% in 46 minutes.

There is also a cheaper Insta 360 Ace which has a smaller 1/2-inch sensor and a lower max resolution of 6K30, no fast charging and no Leica engineering or lens.

The Insta 360 Ace and Ace Pro are available priced £359.00 and £429.00/ AU\$729.00 respectively.

