Newsletter for week ending 25th May 2019

My Arran Holiday break



I took a five day break to Arran at the beginning of May. It was actually a week earlier than I had planned due to the fact that some friends wanted to take me out for my pre-birthday meal as they couldn't make my "official 70th" at the end of May. The weather apps showed a favourable week so I thought that I was going to have a great time. How quickly the situation changed. After catching the 6.30am ferry from Ardrossan over to Brodick in full sunshine and driving through two of the prettiest villages on the island – Lamlash and Whiting Bay to reach Kildonan where I was staying the clouds began to gather on the horizon. By the time I had unpacked into my "home" for the week (which was a camping pod) the day had become very uncertain.





I decided that I would risk it as the weather changes quickly on Arran and decided that I would take my Mavic pro drone to the "black cave" at Brennan head, some 2 miles away. Half way there the heavens opened and it poured down for another four hours. Time to retreat to the "pod" to dry out and have

evening meal.

The next day was dry with a little sunshine so I decided to try to film the black cave again. I had some problems with the drone flights as the video signal kept dropping out leaving me "blind" and resorting to the emergency return home function of the drone.



From the onboard video which was still being recorded to the micro SD card I was able to grab a frame just as the drone was turning back to make the return flight. I couldn't get a more central shot as the pitch of the propellers were obscuring the view as it pitched up. Shortly after this I manged a couple of shots of the common seals that had hauled out of the water.



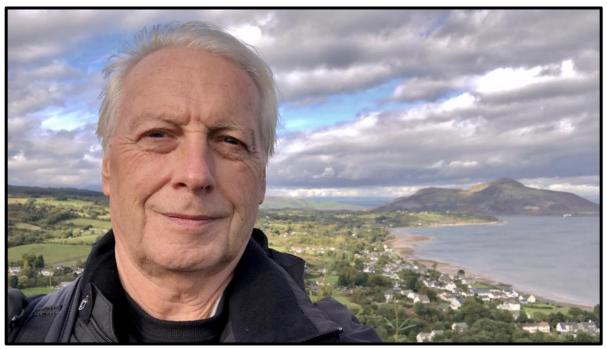
It was at this point that I discovered that my FZ1000 II had developed a fault. The drive mode dial had developed a "mind of its own". Sometimes the camera would be in time lapse mode, the next shutter release would see it in burst mode. Also the zoom/focus ring would not control either function. I was still able to shoot with it but I lost a lot of time trying to get the right mode selected.

I'm hoping this was just the result of an electronics failure that sometimes happens with high density electronics during the first 48 hours of operation.

It is now back with the Panasonic repair agents (DKAVS at Horley in the UK). I'm hoping to get it back so that I can capture some stills and video at my birthday next week.

On the Wednesday I made one of my favourite walks over the hills from Kildonan to Whiting bay. The day was dull and quite windy so I just enjoyed the walk. It was cut short due to forestry work so I was unable to get to Glenashdale falls which I always love to visit. The forest path was closed at the point where you can descend to Whiting bay via the Giant's Graves. This is another "special place" as the views of the Holy Isle are superb from up there.





Whiting bay and the Holy Isle from the Giant's graves.

On the Thursday I decided to drive over to the west coast of the island and visit the Standing Stones at Machrie moor. The morning was very cold with strong bitterly cold winds. The was even snow on the northern fells of the island.



It was so cold that I had to put on my nylon raincoat to help prevent the wind blowing through my fleece. I took shelter several times behind the stones to escape the wind.



Standing Stones, Machrie Moor

Returning down from Machrie moor I had a hot lunch at the tearoom, Machrie Moor Golf club house. I then continued up along the west coast to Pirnmill village.



The boat house at Dougarie

At Pirnmill there is a small war memorial and I stopped there to capture some of the very colourful plants that were in full bloom there.



From Pirnmill I made my way to Catacol where I wanted to photograph the 12 Apostles – a group of 12 cottages in the village.

Each of these historically famous fishermen's cottages has a different upper window so that when the men were at sea, their wives could light a candle and each man would know which house was signalling.





The twelve apostles at Catacol

From Catacol I visited Lochranza and its castle before heading down to north Sannox. Lochranza is at the northern most tip of the island and from here runs a summer timetable ferry to the Kintyre peninsula at Tarbet.



Lochranza



North Sannox



The Northern Fells at Sannox

From here I made the return journey back through Brodick to Kildonan.

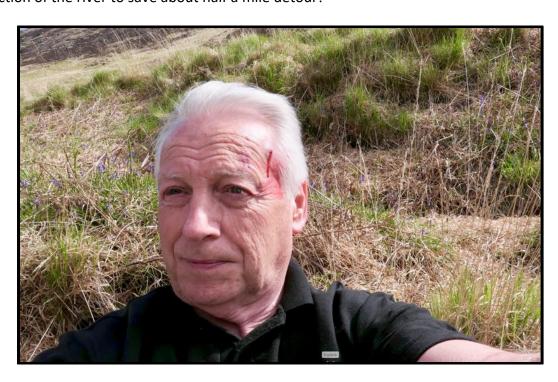
On Friday, my last day the weather looked to have changed for the better with plenty of blue sky and only light winds. I decide to visit Glen Rosa, another of my favourite places on the island.



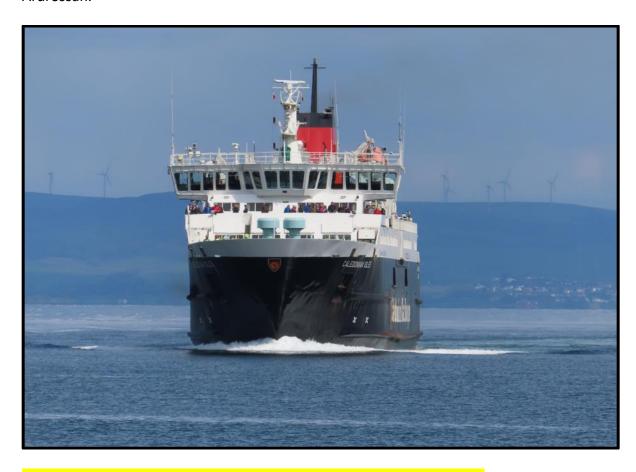
Glen Rosa

They say that Arran is Scotland in miniature as on this small island you can find just about every geographical feature of the mainland Scotland. I would add that it is also a photographers paradise.

I did manage to get some great drone footage for my own holiday video but I also sustained quite a nasty bang on the head as I slipped trying to jump over a 6 foot wide section of the river to save about half a mile detour!



That was the end of the trip as I had to return to Brodick to catch the 3.15pm ferry back to Ardrossan.



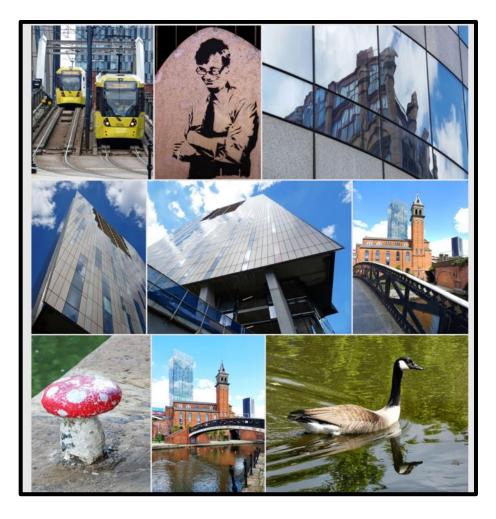
The Manchester Photo Walk at Castlefield Canal Basin 16th May 2019



Paul Wride, Mike Wingate, Bryan Gudgeon, David Hamilton with me at Castlefield

Four of the six invited subscribers who attended the photo walk around Castlefield in Manchester met up with me at the Castlefield bowl area. After a brief introduction and discussion about the aims of the event we set off to photograph some of the interesting architecture and features that make Castlefield an interesting location to visit. As this was my first venture into this type of event I was particularly interested in how the group would work together and just how much technical input I should make on the tour. I had prepared a small handbook of the places that I found interesting and some brief notes about the composition and camera settings that I found useful for each shot. In the end I decided to just let the event develop at its own pace. In hindsight perhaps the event should be classed as a photo workshop rather than a photo walk. Photo walks seem to be just guided tours around an area where the participants find and shoot their own images. Over a coffee it gave me chance to talk about filters and their effects on some of the images captured. We also looked at the Raynox close up lenses and saw them in action. Actually four turned out to be a better number as it allowed a little more interaction with the group. Fortunately the weather was kind, and the sun was shining for us! I have received some good feedback from the group and this will help shape any future

You can see some of the excellent images captured by the group on a page that I have set up to showcase their work. You can see the images here

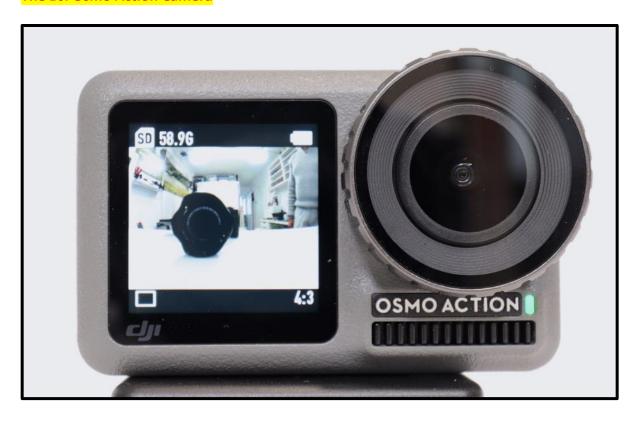




I will organise another couple of events maybe in the autumn and maybe a night photo workshop at the Blackpool illuminations and firework shows. I'll publish new dates nearer the time.



The DJI Osmo Action Camera



I've always been impressed with the image quality the DJI obtain from their drone cameras for both stills and 4K video.

When I found out that DJI had entered the action camera market I decided to purchase one to see if their expertise could be transitioned into this type of camera.

Undoubtedly, GoPro has had a strong market presence in this market and I indeed do own a Hero 4 silver edition however this does not shoot at 4K.

What does the Osmo Action Camera have that other action cameras don't? Well most notably, it has a 1.4-inch colour LCD screen on the front of the camera in addition to the 2.25-inch touchscreen on the rear — a nice feature for YouTube content creators and others who would like to see exactly what they're shooting while they have the camera pointed at themselves.

The user interface is nicely uncomplicated, with three buttons controlling power on/off, record start, and switching capture modes; hitting the shutter button once turns on the camera from standby and starts recording in a pre-set mode in less than two seconds. Modes include time lapse, hyperlapse and slow motion. In addition and the camera even responds to five voice commands like "Shoot Photo" "Start Recording".

An HDR video mode is available, which DJI says stretches dynamic range by about three stops, but HDR shooting is limited to 30fps and electronic image stabilisation is disabled!

Frame rates are limited by your choice of aspect ratio — 4K 16:9 shooting allows frame rates up to 60p, but 4:3 shooting is limited to 30fps. The is similar in 2.7K mode, which reaches 60p only at 16:9. This is, presumably, because 4:3 is the native format of the camera's image sensor, while 16:9 mode crops pixels at the top and bottom to make the wider frame, reducing image-processing requirements.

4K video recording takes place at up to 100 Mbps (this is compared to a max of 78 Mbps on the GoPro Hero7 Black). In HD mode, the frame rate can be set up to a full 240fps for an 8x slo-mo effect.

It's rated as waterproof at up to 11m and said to endure temperatures as low as -10 degrees Celsius. Built-in "RockSteady" electronic image stabilisation adds gimbal like stabilisation at the slight loss of field of view.

The Osmo Action camera interfaces with DJI's Mimo app for editing and sharing photos and video. Videos and still images are saved to an on-board microSD card.

The onboard mics must be used in some form of noise cancellation mode as wind noise is surprisingly suppressed. External audio will need the special USB-C to 3.5mm adaptor which DJI will release soon (I hope) as none of the usual USB-C to 3.5mm adaptors work



A sample JPEG out of the camera. It is possible to shoot in RAW (DNG) format as well 12M 4:3 aspect ratio.

Focus, as normal with these cameras, is fixed with 60cms as the closest working distance – unless you use a supplementary close up lens.

It is a 15mm 35mm equivalent with an aperture of f2.8. The sensor is a 1/2.3 inch type so the usual $5.4 \times aperture$ and ISO equivalences must be taken into account.

For video there is a choice of MP4 or MOV format and standard or Cinelike D profiles to choose from.

I have more of a review and samples here on my photoblog

Telephoto Lenses, Perspective and Depth of Field Explained

We have all seen how long telephoto lenses can image distant subjects into very short focus planes (the compression look) but have we considered how they affect perspective and depth of field.





Take a look at the two images above. The lower image is taken with an 11mm lens and the image enlarged to give the same image size as the image from the 22mm lens. It is taken from exactly the same location.

The images are identical. The top image has 15M pixels and the lower 12.6M pixels.

So we can double the focal length of our lens by cropping and enlarging without any appreciable loss of image quality. Now this can be especially useful in low light situations where the bigger aperture the better for light gathering. Most non-constant aperture lenses will quickly go from f2.8 to F4 losing that one f-stop of light as you start to apply any zoom. If you shoot wide open and then crop you are gaining that extra stop and helping reduce image noise.





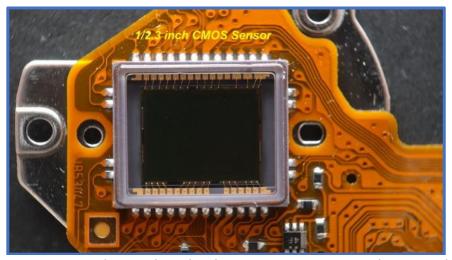
The same exercise with the 18 -55mm lens. The 18mm enlarged to the same size as the 55mm image. Again no difference in perceived image quality. So it looks like we can achieve 3x Digital zoom if we need the extra reach with our lenses.

Loreo Lubot Loupe Review

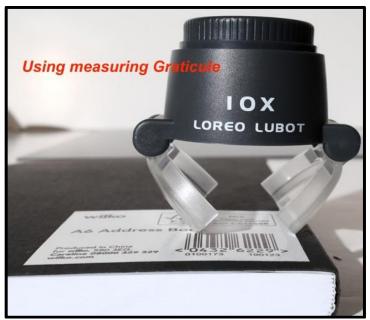


The Lubot is a 10x optical loupe. Its high-tech three element optical configuration incorporates a computer designed aspherical lens, which produces ultra-sharp images across the entire viewable image area. This extremely wide field of view is infinitely superior to that produced by conventional two element optical systems. The Lubot offers a flat field of view, with visual limits the user can cover without having to refocus the eye.

This permits the loupe to be used continuously over a prolonged period without eyestrain or fatigue. Not only is this loupe fitted with first class optics, it also combines the benefits of the popular jewellers' loupe with its covered lenses and small size, as well as the advantages of an ordinary 10x loupe with a clear skirt and graduated reticule. The Lubot has an ingenious pair of clear collapsing skirts. When the skirts are opened completely and held against or placed on an object to be viewed, the Lubot is automatically at the correct distance for proper focus. The lens assembly is adjustable so that many eye glass wearers can use the Lubot comfortably without their glasses. When set at their intermediary click stop position, millimetre and inch reticule scales on the skirts enter the field of view. These amazingly accurate scales are moulded into the skirts and will never rub off or dissolve when cleaning is required. They are indispensable in determining sizes of viewed objects. Closing the skirts completely covers and protects the bottom of the lens assembly from dirt and scratches.



An image captured using the Lubot loupe using Canon M50 plus 20mm lens



With the two skirts folded to the 45 degree position the two graticules come into the field of view



The eyepiece can be adjusted to compensate for objects which may be higher (or lower) than the pre-set distance which is set by the plastic skirts. I used this to photograph the CMOS sensor which was about 3mm higher than the original focus plane.

Magnification: 10x Distortion Free

Lens system: 3-element achromatic Aspherical lens design Field of view: 30mm nominal (up to 50mm by "looking around")

Eye Piece Diameter: 20mm

Eye Relief: 15mm

Working Distance: 17mm

Dioptre Adjustment: +1.5 to -2

Built-in retractable graticules: millimetres and inches

Overall Height: 43mm

Full product details/sales and other lenses etc

http://loreo.com/pages/shop/loreo products online.html

New Series for Canon M50 Mirrorless Camera Users.

I've been onboard with the Canon mirrorless EOS M series from the start and had the original M1 and then the M3 and then I sold both of those bodies to but the M5.

My only negative comment about then was the lack of a fully articulated touch screen that I was so used to with Panasonic bridge cameras. When the M50 was announced which had this feature plus the ability to shoot in 4K UHD I just had to order one.

That was 18 months ago and I still love the way the M50 just gets on with taking great stills and video.

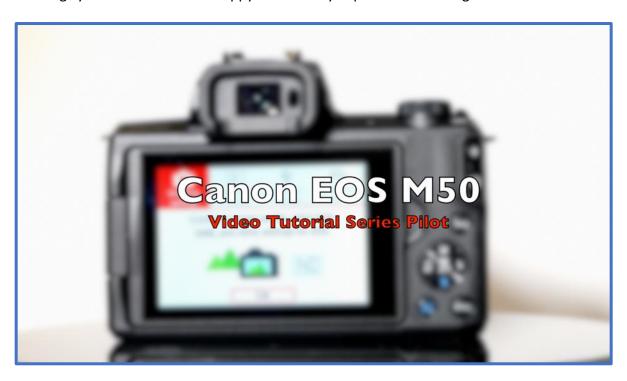
Now the M50 is not without its critics. Mainly because of Canon's way of implementing 4K from a 24M sensor. They just take a straight 1:1 pixel crop from the centre of the sensor.

This of course gives a much narrower field of view with a reduction of 1.56X times.

So a native 24mm lens becomes more like a 39mm lens if you turn on the enhanced image stabilisation as well.

The other side of the coin is that if you shoot wildlife videos this extra reach can be of huge benefit.

As I have grown with the system I have added extra lenses and adaptors and now have a working system that I am now happy to share my experiences in using the M50.



The new series pilot episode is now on YouTube here

Tripod Plates!

What was meant to be a relatively quick production run of the FZ200/300/1000/2000 tripod adaptor plates has become a real challenge.

The thickness of the material should have been 6mm and it is only 5mm and this has meant that the nickel brass inserts had to be cut down. Paint finish is also a real problem.

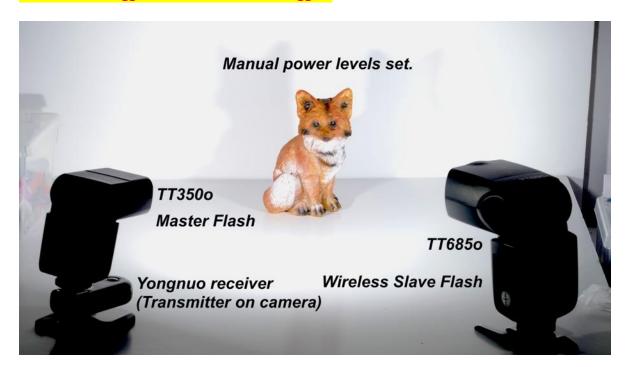


The latest batches of the tripod plates.
Testing alternative fixing for the nickel brass inserts

If the plates were only for me I would be quite happy to use them on my cameras however as I planned on these being purchased I have to decide if that should now be the case with this particular batch.

I have some new material to try another short production batch to see if I can improve on the quality. If not then I might have to call it quits and abandon this project!

Godox Flash Triggered from other flash triggers



I was asked if it was possible for a Godox 3500 to be used as an off camera master flash with a TT6850 unit used as a slave when the master flash was triggered using a standard wireless flash trigger.

Well the answer is yes if you understand the connection logic here.

The Yongnuo flash trigger is basically a "dumb" trigger – it cannot transmit TTL commands from the Panasonic/Olympus camera. It just send the flash signal to the receiver.

On the receiver is mounted the TT3500 which is set in the manual flash mode but as the wireless master controller for channel 1 and group A. The TT6850 is set up as a slave flash in the manual mode with its channel set to 1 and the group set to A.

So when the camera fires the Yongnuo transmitter on the camera hot shoe sends the flash command to the receiver. The receiver passes this through to the TT3500 which fires at the power level set on it. Simultaneously it send the wireless command to the flashes on channel 1 group A to fire. In this case there is only one flash which then fires at the power level set on it.

The slave could have been set up as an optical slave S1 however the wireless protocol is more reliable and doesn't need line of sight to work.

New JPEG Compression systems in development

The original JPEG image file compression system was developed in 1992 and has undergone very little change. Now there are two new systems which are reaching final stages.

The JPEG XS with video images (file streams) and JPEG XL for still images. The XL system will allow existing JPEG images files to be lossless converted to a much smaller one. This will be ideal for web based images (i.e. just about any program that displays web images) allowing much faster display times and reduced bandwidth needed during download of the whole web page.

The system sounds like the HEIC/HEIF system that Apple have taken on board for their mobile phone stills and video compression.

The new standard will still, of course, have to be accepted by the major players like Adobe, Google and other companies who deliver products for saving JPEG images.

If you are interested you can find more technical details over at the JPEG.org website.

In the coming weeks.

From my 70th birthday celebration I'm hoping to do a couple of product reviews which I hope have been purchased for me!

Hopefully the FZ1000 II will be back from repair and I can do the updated review and a look at a DIY lighting rig for macro.

Until the next newsletter, thanks for your continued support through the Amazon links. It really does help!

Graham