

Olympus M. Zuiko 8mm f1.8 Fisheye Pro

by Andrew McLachlan

Lens choice plays a crucial role in underwater photography. Superior optics allow us to overcome the challenges of image quality, light refraction, and distortion, which allows us to produce stunning imagery. One such lens that meets these requirements for my micro four thirds (MFT) set-up is the M. Zuiko 8mm f/1.8 Fisheye PRO lens. When this lens is paired with a mini-dome, it offers exceptional quality and versatility, allowing photographers to capture dramatic wide-angle imagery, close-focus compositions, and creative perspectives that can be difficult to achieve with standard rectilinear wide-angle lenses.

My particular set-up for using the OM1 and M. Zuiko 8mm Fisheye lens (Zuiko 8mm) beneath the waves is an AOI UH-OM1 Housing with an AOI DLP-06 Acrylic Dome Port. An AOI PN-24 Extension Ring sits between the housing and dome port. My strobe choices are either the AOI Ultra Compact Q1-RC Strobes or the new AOI Ultra-InTeli P1 Strobes.

The Zuiko 8mm lens offers an incredible 180-degree diagonal

field of view and a close focusing distance of 2.5cm (front lens element to subject), making it one of the widest lenses available for MFT photographers. This allows photographers to capture vast underwater landscapes, reef structures, wrecks, large marine life, and close focus wide-angle (CFWA) photography. The extreme close focusing capability of the lens when paired with a mini dome is an incredibly powerful tool for photographing small marine creatures within their habitat.

Another major advantage of using this lens in a mini dome is the compact size. When compared to the larger dome ports required for rectilinear wide-angle lenses, a mini dome significantly reduces bulk and drag underwater, making it easier to maneuver in tight spaces such as coral reefs, caves, and wrecks.

The Zuiko 8mm also excels in low light conditions with its fast f/1.8 aperture.

Another benefit of using fisheye lenses in mini domes is that the amount of water between the



M. Zuiko 8mm Fisheye Lens, ISO 200, F8 @ 1/250 sec., AOI UH-OM1 Housing, AOI DLP-06 Lens Port, 2 X AOI Ultra-InTeli P1 Strobes



Zuiko 8mm Fisheye Lens, ISO 800, F16 @ 1/320sec, AOI UH-OM1 Housing, AOI DLP-06 Lens Port

Zuiko 8mm Fisheye Lens, ISO 1000, F8 @ 1/1000sec, AOI UH-OM1 Housing, AOI DLP-06 Lens Port



Zuiko 8mm Fisheye Lens, ISO 200, F8 @ 1/250sec, AOI UH-OM1 Housing, AOI DLP-06 Lens Port

Zuiko 8mm Fisheye Lens, ISO 1000, F8 @ 1/125sec, AOI UH-OM1 Housing, AOI DLP-06 Lens Port



subject and the lens is reduced. This helps with clarity, contrast, and color reproduction as there is less water for the light to travel through, therefore, the loss of such details is minimized. I find the close focusing capabilities of the Zuiko 8mm in a mini dome set-up especially useful during situations when there is more particulate matter floating in the water column due to turbidity.

Fisheye lenses are noted for their distortion effects which can be used creatively to emphasize curvature and exaggerate the sense of depth, making compositions more dynamic. When positioned correctly, subjects can appear larger than life, which I have found works exceptionally well for capturing large marine life here on Grand Cayman such as for stingrays, and sea turtles.

While this distortion can be used artistically in many instances, it may not be something that all photographers find appealing. In situations where maintaining straight



All shots:

*Zuiko 8mm
Fisheye Lens,
ISO 800, F16
@ 1/320sec,
AOI UH-OM1
Housing, AOI
DLP-06 Lens
Port*

lines is preferable a rectilinear lens would be the better option.

A mini dome is typically considered too small to effectively capture over-under (split) shots, as it lacks the necessary waterline separation required for smooth transitions between underwater and topside elements. A larger dome port would be better suited for such compositions, and I do often resort to my 8" dome for split shots, but I have also had some success with capturing over-under (split) shots with my 4' dome on Grand Cayman.

Due to the extreme curvature of the mini-dome and the nature of fisheye optics, flare and chromatic aberrations can sometimes occur when shooting towards the sun. However, these can often be minimized with careful positioning. Strobe positioning is also critical to avoid illuminating unwanted backscatter due to the extreme field of view of fisheye optics.

I typically have the strobes pulled back slightly behind the housing handles and how far out or close they are to the housing depends on my proximity to the subject matter. At other times I may



Zuiko 8mm Fisheye Lens, ISO 500, F8 @ 1/250sec, AOI UH-OM1 Housing, AOI DLP-06 Lens Port

play around with some creative strobe placement for different lighting effects on subject matter, such as a single strobe with a beam restrictor or an inward lighting technique.

Despite being a fisheye lens, the Zuiko 8mm delivers exceptional edge-to-edge sharpness, even in the reduced optics of a mini-dome. Stopping down to f/5.6 or f/8, my preferred settings, further

improves sharpness and depth of field, making it ideal for wide-angle reefscape and marine life photography. Olympus / OM System are noted for their high-quality optics and lens coatings, as a result images exhibit vivid colors and excellent contrast. The f/1.8 aperture allows for excellent low-light performance, enabling photographers to capture ambient light details in darker



Zuiko 8mm Fisheye Lens, ISO 800, F8 @ 1/250sec, AOI UH-OM1 Housing, AOI DLP-06 Lens Port

environments such as caves, wrecks, and deep reefs. This reduces the reliance on artificial lighting for a more compact set-up beneath the waves.

The Zuiko 8mm, when paired with a mini dome, is an exceptionally versatile tool for underwater photography. Its ultra-wide field of view, excellent close-focusing ability, fast aperture, and compact form factor make it an ideal choice for capturing stunning underwater scenes, whether shooting vast coral landscapes, marine life close-ups, or creative fisheye perspectives.

With the right technique and understanding of its strengths, the M. Zuiko 8mm fisheye lens in a mini dome can elevate your underwater photography to new artistic heights, delivering sharp, colorful, and visually striking images that capture the beauty of the underwater world.

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