

Getting Started in U/W Photography

Tips & Techniques Wide Angle Easy Steps to Success!

by Jack and Sue Drafaahl

It seems that whenever we tell someone we are scuba divers, they immediately want to know what it looks like in the deep blue. We find the best solution is to show them wide angle photos, which provide a true idea of underwater ambiance. These images vividly capture a colorful panoramic reef and the creatures that inhabit it. Thanks to technological developments in underwater camera equipment, these photos can now be captured by amateur and pro alike.

Sea & Sea offers one of the most versatile underwater camera systems, the Motor Marine II-EX. The secret to this system is the built-in close-up lens and that the auxiliary lenses are fully interchangeable underwater. With this system you can take general reef photos with the built-in normal lens, add a macro lens for that colorful nudibranch and then switch to one of the two wide angle lenses before that Manta Ray that passes you by.

The 16 and the 20mm wide angle lenses for the Motor Marine II-EX are quick and easy to use. Simply remove the wide angle lens from the lens caddy and attach it to the camera via the bayonet mount. Set the focus to infinity and you are ready to go. Depth of field varies, depending upon the *f*/stop you set on the camera.

Not to worry as the depth of field scale is in bold type on the top of the lens. For example, with the 16mm lens set at *f*/22, everything is in focus from 11 inches to infinity. With a coverage angle of 91 degrees this is a pretty impressive lens. If you only need an underwater picture angle of 80 degrees, then the 20mm lens at *f*/22 provides depth of field from 15.4 inches to infinity.

Since most wide angle scenes underwater need more than sunlight, a strobe that matches the angle of coverage of your lens will improve the quality of your images. There are dozens of combinations of strobes, synch cords and strobe arms that accomplish this task. For the beginning underwater photographer this may be a bit confusing, so we will discuss some of the more common setups we have found effective with the Motor Marine II-EX system.

Starting with the most basic system, you can attach a single strobe (YS-60, YS-120 or YS-300) to either the basic arm that comes in the Motor Marine II-EX kit or the Sea Arm V. The Sea Arm V gives you more flexibility and lets you move the strobe farther from the camera, which is important if there are particles floating in the water. By keeping the strobe at an angle some distance from the camera backscatter (caused by strobe light hitting the particles) is minimized.

The light from this setup frequently throws a single shadow somewhere on the background, which is not usually a problem. This shadow can be minimized if you balance the available light to the flash output. This is accomplished by adjusting the underexposure light inside the camera until the sunlight and strobe light are equal in value. Turn the f/stop down to f/22 and then slowly open it up as you press the shutter release down halfway. When the red light goes out, you have a balance between the strobe and sunlight.

Dual strobe photography gives you total control of the lighting in the scene. Ratio lighting usually provides the best results and is accomplished by mixing two different sized strobes or varying the output of each strobe. For example, you can use two YS-120 strobes with the double strobe synch connector and place one closer to the subject. Another option with two YS-120 strobes is to use one with a single TTL sync cord and the second set to power as a cordless slave.

We like to use either the YS-60 or YS-120 as the main strobe and the YS-30 as a cordless slave. Because the YS-30 is cordless and so compact, it allows total flexibility. We have even handed the YS-30 to a diver and had him/her illuminate the subject from a distance and used it as a photo prop.

We would like to tell you one setup works for all wide angle scenes but U/W photography isn't that simplistic. Dive locations throughout the world vary greatly in visibility, water color and currents and each situation demands a specific camera, lens and strobe setup.

Shipwrecks, for example, are usually in deep water and areas with plenty of silt. Using a strobe at any distance from the camera may cause backscatter, so your best bet is with high speed film and as wide a lens as possible. The 16mm lens is a great choice for wrecks and your film choice would be ISO 400. The higher speed film allows for a smaller f/stop, which allows you to shoot closer to the subject with an increased depth of field.

If you are into shark feeding, we recommend the 20mm wide angle and a single strobe. Pan the shark as it swims by and squeeze the shutter. The shadow from the single strobe will dissipate into open water; the compact size of the camera and a single strobe allows easy maneuverability.



There are two strobe techniques for capturing schools of fish on film. If you want to avoid the silver reflection of the fish scales, keep the strobe at a 45 degree angle to the school. If you want the silver effect, keep it as perpendicular as possible. Keep in mind that if you want the silver effect, the TTL sensors may be fooled by the bright light bouncing back. The results will be a very dark background and silver gray fish. To avoid this problem, you should use manual strobe and bracket your exposures.

The best part of becoming a wide angle underwater photographer is when you see the results of your efforts. Wide angle pictures keep the memories of your last dive alive. They allow you to share the wonders of the underwater world with those who have never taken the plunge. So, grab that wide angle lens, put it on your Motor Marine II-EX and let's go diving!

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