MICHAEL CLARK PHOTOGRAPHY





contents



WINTER 2013 NEWSLETTER

4 editorial

Under a Starry Night. An editorial about stoking the creative fires and the continual learning process.

6 news

An excerpt from my book *Exposed: Inside the Life and Images of a Pro Photographer* in the Fall 2012 ASMP Bulletin and an interview in Digital Photo Magazine (Germany).

10 workshops

Detailed information on various photography workshops I'll be teaching over the next six months in Hawaii, New Mexico and Texas.

14 equipment review

A comparison of the 80-megapixel Phase One IQ180 and the 36-megapixel Nikon D800. An in-depth shoot out and analysis of the Phase One IQ180 medium format digital back and how it compares to the Nikon D800.

24 on assignment

Details on an assignment shot late last year for energy giant NEXTera Energy Resources. This assignment had me climbing up 436-foot wind turbines on the high plains of Kansas, shooting landscape images in frigid temperatures and shooting aerials from a small plane.

34 portfolio

Aryeh Pettit taking the high road in the humongous pipe at the Lake Cunningham skate park in San Jose, California. This image was created during my Adventure Sports Photography workshop in San Francisco last year.

36 perspective

It's Not About the Camera. An editorial, to balance out the equipment review in this issue of the Newsletter, on finding and crafting your vision and how the tools are just part of creating that vision.

37 parting shot

Clay Moseley skate skiing at the Pajarito Nordic Ski area near Los Alamos, New Mexico. This image was shot while testing out a Nikon Speedlight setup and the PocketWizard ControlTL system of radio transceivers.

copyright notice:

This Newsletter was created by Michael Clark for the promotion of Michael Clark Photography. No reproduction of any part of this Newsletter is allowed without written permission. All images Copyright © 2013 Michael Clark Photography. All Rights Reserved. Contact me at info@michaelclarkphoto.com. To see more of my work view my website at www.michaelclarkphoto.com.

Cover Image: A sunrise shot of the wind turbines, owned by NEXTera Energy Resources, at the Gray County facility just outside of Dodge City, Kansas. Opposite Page: Katherine Mast and Annelia Tinklenberg snowshoeing near the Jackal Hut, one of the phenomenal huts in the 10th Mountain Division system, near Leadville, Colorado.



editorial



Under a Starry Night

As a pro you never stop learning and experimenting to improve your images

ast month I was camped out in nearby Diablo Canyon filming time-lapse sequences of the canyon under a canopy of stars for a personal project. Diablo Canyon is well-known to movie aficionados—it has been used for such films as 3:10 to Yuma, Cowboys and Aliens and Silverado among others. It is a steep and eerie canyon, as can be seen in the image on the next page. At night it is a wild place to be, creepy and beautiful all at once, with random rocks falling off the top of the 400foot cliffs. While filming time-lapse sequences, I was mindful of the rock fall—especially since I have been hit by a rock falling off the top of the canyon's cliff before.

I spent the better part of the night getting up every three hours to check the cameras and reset them for the next sequence. As a pro, you have to continually stoke the creative fires and work hard to improve your work. It is a never ending process. I spend a lot of time and energy on portfolio shoots to woo future clients. In this day and age, I think many of us forget that it is really all about the work. If my work doesn't blow the socks off a potential client then how can I expect them to hire me for their next huge project? Hence, in Diablo Canyon, I experimented with my gear and the images to perfect my time-lapse technique and produce new material for my portfolio.

The last few months have taken me on many tangents,

and have had me shooting assignments that were well off the beaten path of my specialty, which is adventure sports photography. In this issue, I detail a recent assignment for the largest green energy provider in the USA, NEXTera Energy Resources. That assignment had me climbing up huge wind turbines, shooting aerials from a plane and lighting up giant wind turbines at night.

The equipment review in this issue of the newsletter outlines another experiment where I, along with my fellow ASMP members, tested out a \$48,000 Phase One medium format digital camera and compared it to my highend DSLRs. As a pro, I am always looking to provide the best image quality for my clients and this comparison was a great education on cost vs. quality. I hope this issue of the Newsletter is inspiring and educational. Enjoy!

Opposite Page: My Black Diamond lightweight mountaineering tent lit up under a patchwork of stars while shooting time-lapse video for a new motion project in Diablo Canyon near Santa Fe, New Mexico.

Recent Clients: Nikon, Nextera Energy Resources, Continental Tires, Schiesser AG (Germany), New Mexico Magazine, N-Photo Magazine (Germany), Digital Photo Magazine (Germany), Digital Camera Magazine (UK), and Nikon World Magazine.



Exposed Excerpt in the Fall 2012 ASMP Bulletin

An excerpt about my experiences shooting the Wenger Patagonian Expedition Race

n excerpt from my book PeachPit, Exposed: Inside the Life and Images of a Pro Photographer, was published in the Fall 2012 issue of the ASMP Bulletin. The excerpt is from a chapter on the Wenger Patagonian Expedition Race and some of the trials and tribulations that I experienced while covering that race. For those of you that aren't members

of the ASMP (American Society of Media Photographers), and don't get the bulletin, here is the text from that article:

On Assignment:

The Wenger Patagonian Expedition Race

Little did I know that while sitting in an October 2007 website optimization seminar I was preparing myself for one of the most adventurous assignments of my career. ASMP's New Mexico chapter had elected to bring Blake Discher to Santa Fe for a primer on optimizing photographer websites to appear on the first page of Google



searches. While the technical details of this process weren't exactly exciting, I went home that evening and applied Blake's advice, optimizing my website for the search terms, "Adventure Sports Photography."

A month later, I received an e-mail from the Patagonian Expedition Race based in Punta Arenas, Chile, asking if I would be interested in covering "the biggest challenge in the history of adventure racing." The e-mail went on to describe the event: "Merely equipped with a map, compass and minimal external assistance, the participants will compete in four main disciplines: Trekking, Mountain Biking, Climbing and Sea Kayaking. The race will cover

more than 600 km (380 miles) through the legendary Island of Tierra del Fuego, the awe-inspiring Darwin Range, and the mystical Beagle Channel: perfect scenery for an adventure that has no equal." And all expenses were covered.

My first thought was, this is too good to be true. It has to be spam. But in good spirit I responded, asking for more information, which I received in another e-mail a few hours later. It took me all of three seconds to say, "Yes, count me in!" As a professional photographer, I've found it extremely rare for an adventurous assignment like this to appear completely out of the blue. And because Patagonia had been on my list of travel destinations ever since I started climbing, this was an opportunity I couldn't pass up.

The World's Toughest Race

Named for the main sponsor, manufacturer of the genuine Swiss Army knife, the Wenger Patagonian Expedition Race is currently the world's toughest adventure race bar none. The Tour de France, the Marathon des Sables, the Iditarod and maybe a handful of others come to mind as contenders for the hardest endurance contest worldwide. It's also an education in suffering. These Olympic athletes, Ironman winners, and internationally ranked adventure teams were pushing the envelope of the lightand-fast philosophy in unmapped terrain.

Each team is composed of four people with at least one female member. Teams must navigate the course using a wide range of outdoor skills over several stages, alternating between sea kayaking, mountain biking and trekking, as well as short climbing sections. In many sections, racers are basically on their own in some of the world's most remote wilderness areas and rescue is extremely difficult. In that sense, it's an expedition and safety is always a lingering concern. The race uses a different course each year, normally covering a distance of approximately 600 km (380 miles) in ten days.

Each team must carry a minimum amount of safety gear, including a first-aid kit, a tent, sleeping bag, knife, headlamp and food. Global Positioning Satellite (GPS) technology is not allowed; the teams must navigate with a map and compass. Maps are generated from Google Earth satellite images rather than using topographic maps because the areas are unexplored and unmapped. Hence, orienteering is a major factor. Although the teams must be self-sufficient throughout the race, at each checkpoint they are allowed to switch gear, take on more food and retool for the challenge ahead.

From 2008 to 2010, I traveled to southern Chile each February to shoot the race, which became my yearly "epic" adventure. I can't say I made a lot of money shooting this, but that wasn't the point. The race gave me access to locations I could never reach on my own. During my coverage, I've explored and trekked through some of the most remote terrain on earth. To see the determination and suffering needed to finish the race is also truly humbling.

The 2009 race was the hardest version ever and one of the most arcane, ridiculous and beautiful events I've ever experienced. A full description of this race is featured in chapter 7 of my book. For additional images, check out my extended image gallery in the Projects section on my Web site at www.michaelclarkphoto.com.

Interview in Digital Photo Magazine (Germany)

An extensive interview about my work and my photographic techniques

t is a great honor to have an 8-page feature article and interview about my work in the January 2013 issue of Digital Photo Magazine (Germany). The article features quite a few of my images (as can be seen in the double page spreads shown here) and has a lengthy interview (in German) with Ana



Barzakova. The article includes some very kind comments on my work. The sub-title on the opening spread states, "The American photographer Michael Clark is one of the most well-known extreme sports photographers in the world. Why he chose this dangerous genre and how he creates his spectacular action shots, he reveals in an interview with Digital Photo."

The first paragraph continues, "Michael Clark wants to be open and has no fear to share his knowledge and experience to all photo enthusiasts. Hard work and a pinch of self-criticism are always for him the essential ingredients for successful images. For over 16 years, he has been one of the most prestigious American action photographers." This opening line refers to my latest book Exposed: Inside the Life and Images of a Pro Photographer, where I am

quite open about the trials and tribulations that have gone into my career over the last 16 years. Two more spreads from the 8-page interview are featured on the next page. The article also included a few photo tips on photographing action sports. The interview itself was quite lengthy and covered a wide variety of topics, including everything from digital workflow to "what makes a Michael Clark photograph memorable?"

These quotes in the last few paragraphs were translated from the German text. If you speak German and would like to read the entire article you can download a PDF of the article from my website. My thanks to Ana and the editors at <u>Digital Photo Magazine</u> for tracking me down and featuring me and my work in the magazine—and for the very kind words about my work.





keine seine

FÜR MICH IST ES EIN PRIVILEG, MIT DEN BESTEN ATHLETEN DER WELT ARBEITEN ZU DÜRFEN.







MEIN ZIEL IST ES, EIN BILD ZU SCHAFFEN UND NICHT EINFACH EIN FOTO AUFZUNEHMEN. MICHAEL CLAINS, ACTION FOTOGRAFI

workshops

2013 Photography Workshops

An overview of workshops coming up with Michael Clark

ach year I teach several workshops on a variety of topics including adventure photography, digital workflow and artificial lighting. Below is a listing of the workshops I will be teaching in 2013. For the full descriptions about each of these workshops and to find out how to register for these workshops go to the Workshops page on my website. I hope to see you out there in the field this year.

Surfing Photography Workshop

Oahu, Hawaii — February 14-17, 2013

Join legendary surfing photographer Brian Bielmann and adventure sports photographer Michael Clark for an exciting one-of-a-kind workshop that delves into the world of surfing photography. Brian is a top surfing photographer who has been shooting the sport for more than 25 years. Michael brings his adventure photography skills and knowledge as well as his in-depth experience with digital workflow to round out the workshop. This is our second year running the Surfing Photography Workshop and it went so well earlier this year that a few of the participants have already signed up to take it again!

This 4-day workshop combines daily photo shoots at world-class surfing locations and classroom instruction. We will be spending half of our time shooting in the early mornings and in the late afternoon and evenings when the waves and the light are at their best. The other half of the workshop will be spent in the classroom and our time there will be centered around image critiques, discussions on gear, strategies and the business of photography as well as in-depth discussions on shooting surfing. We'll also cover digital workflow in detail using Adobe Photoshop Lightroom Version 4.x.

The workshop is scheduled during a period where large waves hit the north shore frequently. Though we cannot predict or guarantee the wave size or surfing conditions, the north shore of Oahu serves up sizable waves on a nearly daily basis. The workshop is being hosted at the Turtle Bay Hilton Resort on Oahu's North Shore.

It is expected that you know how to download images from your camera to the laptop, know basic editing techniques using your software, and are able to organize the edited images for critiques. Also since surfing photography relies on large telephoto lenses, each participant will need to bring a telephoto lens that is at least 400mm. A 500mm or 600mm lens is preferred. If you don't own one of these lenses please rent or borrow one to bring with you. Please contact Michael or Brian with any questions about lens selection and rental options. Both B&H and Samy's Camera in the USA have rental houses that can rent these lenses. We also have a special deal with Hawaii Photo Rental Oahu, who have 500mm and 600mm lenses for both Canon and Nikon and will be renting these to workshop participants at discounted rates ranging from \$323 to \$550 for the duration of the workshop. Call Josh Strickland at Hawaii Photo Rental Oahu at (808) 735-3838 for more information on renting one of these lenses.

The cost of this workshop is \$1,035 per person. A deposit of \$350 is required to secure your spot in the workshop. You can find more information about the workshop on my website and on my blog, including detailed info on what we will be doing each day and the equipment you will need for the workshop. This workshop is very unique and it is one of the most exciting workshops anywhere in the world. If you have ever wanted to photograph surfing, I encourage you to come join us in Hawaii. You won't regret it. If you have any questions or would like to register for the workshop send me an email.

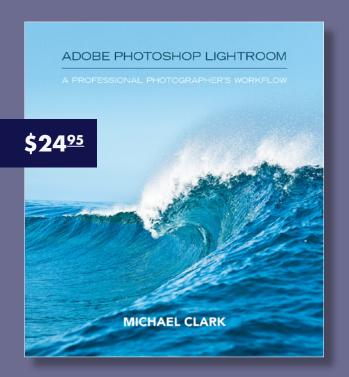
Mentor Series Photo Trek

San Antonio, TX. — February 21-24, 2013

Pack your camera gear and Speedlights and join the Mentor Series as we trek south to light up San Antonio, Texas. This historic locale will provide the perfect backdrop in which to learn the rewards of using light to create an intentional effect in your photos, as well as capture the spirit of this Lone Star destination. Allow Nikon professional photographers and illumination gurus David Tejada, Michael Clark and Dave Black to simplify techniques and help you address lighting scenarios that will convey a desired

ADOBE LIGHTROOM WORKFLOW

A COMPLETE WORKFLOW FROM CAPTURE
TO OUTPUT BY MICHAEL CLARK



The Adobe Photoshop Lightroom Workflow, a 409-page e-book, is a workshop in book form. Updated for Adobe Lightroom 4 and Photoshop CS6, this e-book was completely re-written and presents a workflow that can be adapted by any photographer, professional or amateur. I can honestly say that I have not seen any other book on the market today that includes as much detailed and comprehensive information as this e-book does on digital workflow.

To purchase Adobe Photoshop Lightroom: A Professional Photographer's Workflow click on the website link below. Payments can be made with any major credit card or via your PayPal account. For more information on the workflow and exactly what is covered go to Michael's website.

WWW.MICHAELCLARKPHOTO.COM

atmosphere, while capturing unique images in both controlled and spontaneous shooting situations.

Light is the essence of any photograph, and it is important to understand how to control your light and to explore which lighting is best suited to subject and scene. Take your passion for photography to the next level on this trek by practicing the Mentor Series hands-on approach and walking away with in-depth knowledge of your Speedlights and how they can work for you.

Utilize the rugged natural beauty and "days gone by" ambiance at the Enchanted Springs Ranch, a working cattle and horse ranch that boasts an authentic Old West town. This gorgeous stretch of the Texas Hill Country landscape is rich with history of the passage of Spanish and American explorers. Here you will learn the concept of lighting "on location" and have an opportunity to direct professional models, such as gunfighters, stagecoach drivers and saloon girls, and practice using off-camera flash. Your mentors will assist you in assessing a particular shooting situation and finding the best angles. You will learn to interpret any existing light source and understand how to use your Speedlight (or more than one) to render the best image.

We will continue our exploration of how luminosity can shape the mood and color of the portraits you create at the San Antonio Botanical Garden. The garden's stunning floral displays and serene pathways will provide a backdrop for your lighting education worthy of note. Further develop your skills at one of the area's missions as you consider the ambient light and learn to frame the Spanish architecture against a blazing blue sky.

You can't miss with mentors Dave Black, Michael Clark and David Tejada, industry leaders when it comes to using Speedlights in their stylized images. During this trek you will bring to light the best in your photography and round up images to treasure for years to come. Sign up today!

Who Should Attend - A Note from Mentor Dave Black: If you are currently using the Nikon Speedlight system and want to advance your skills in creative Speedlighting, then this Master Trek is for you. This will be an all Nikon Speedlight Master Class that is designed to help those who already have experience with off camera Speedlight photography and want to take it to the next level. With mentors Michael Clark, David Tejada, and Dave Black you will learn how to light portraits on location with a variety of Speedlighting techniques using Nikon Speedlights, FourSquare soft box system, Speedlight modifiers, and Off Camera Remote Mode triggering equipment. This is not just flash photography, but Creative Location Lighting at it's best. So pack up your Nikon Speedlights and we'll see you in San Antonio.

The cost of this workshop is \$1,399. This price Includes in-the-field instruction, entrance fees, presentations, digital reviews, and transportation to each shooting location." For more information or to sign up for this photo trek visit the Mentor Series Photo Treks website.

Adventure Photography Workshop

Santa Fe Workshops — April 3-6, 2013

Adventure photography can be an adventure in itself, involving breathtaking locations, extreme conditions, and working with elite athletes in risky situations. It requires a



host of skills, including technical excellence with the camera, familiarity with a sport, and the ability to be mindful of your goals and your safety at all times.

This workshop concentrates on creating unique images of rock climbers, mountain bikers, and the activities of a working ranch. Using elite athletes as our models and northern New Mexico's incredible landscape as our backdrop, we explore innovative ways to express the excitement of each sport and location. Topics include research and preparation, composition and camera angles, equipment selection, use of natural light, fill flash, and batterypowered strobes, and autofocus techniques. We also learn how to work with athletes who routinely put themselves at risk, and we discover the best methods for capturing the intensity of their exploits. Location days find us working with athletes who are as daring as they are skilled. Classroom time includes daily editing, review sessions, and one-on-one meetings with Michael. In addition, Michael shares his insights and experiences regarding career development, portfolios, and photographing for stock, editorial, and commercial clients.

The cost of this workshop is \$1,095 plus a \$120 Location and Model Fee. For more information visit the Santa Fe Workshops website or call (505) 983-1400. If you would like to register for this workshop please click on the link above.

For more information on the workshops that I will be teaching in 2013 please visit the Workshops page on my website. Hope to see you out there in 2013!

equipment review

The Nikon D800 vs. the Phase One IQ180

A comparison of the 36-MP Nikon D800 and the 80-MP Phase One IQ180 Digital Back

Recently, the ASMP New Mexico chapter helped sponsor a presentation along with Phase One. In tandem with that presentation the local Phase One representative, who came down for the presentation from Colorado, asked us if we would like to set up a test shoot

with the Phase One IQ180 80-megapixel digital medium format back. There were several of us in the ASMP NM chapter that were interested in seeing how the Phase One IQ180 stacked up against our DSLRs. Hence, we readily accepted the Phase One reps offer and set up a meeting at the studio of our chapter president, Peter Ogilvie. The Phase One rep gave us a brief introduction to the camera and then let us shoot images with it. Peter hired a model for the test shoot and also had a still life set up. Of course. with the Phase One, the key thing we were all chomping at the bit to see was how well that giant 80-MP sensor resolved images.

Along with our test shoot of the IQ180, the Phase One rep graciously let us take test shots of the same setups with a Nikon D800 and a Canon 5D Mark III so we could compare the images afterwards. Now, of course the D800 and the 5D Mark III are well known to many photographers. I gushed over the Nikon D800 in my Spring 2012 Newsletter, calling it "the best DSLR ever produced by

any camera manufacturer so far." I still stand by that statement, especially after seeing the images created during this comparison. Note that the key word in that sentence is "DSLR." The Phase One is a medium format digital camera, and as such is not considered a DSLR style camera.





The 36-megapixel Nikon D800 (top) and the Phase One 645DF camera with the 80-megapixel IQ180 digital medium format back (bottom) mounted on the back of it.

In my review of the D800 I also went on at length about how "The D800 is a medium format killer." I continued by saying: "I don't know why anyone would spend the money on a \$40,000 medium format camera unless they need more megapixels or really want that medium format depth-of-field look. For some, medium format will still be worth it, but I am betting the number of people that opt for a medium format back just dwindled to a very low number. I don't want to see



Hasselblad or Phase One go out of business, but the playing field has just changed and they better get their R&D teams working overtime to figure out how they can differentiate their cameras from the D800. \$3,000 for a D800 or \$20,000 for a Hasselblad H4D-40? In my testing, I would be hard pressed to tell the images apart. Here's hoping Hasselblad and Phase One can figure out how to get exceptional high ISO performance similar to that of the D800, because this is just one of many areas where the medium format cameras suffer badly. "

With those statements in mind, lets begin by discussing the test and how we went about comparing these two amazing cameras. First off, we set both the IQ180 and the D800 to ISO 100 and we also chose similar focal length lenses. On the Phase One we shot with a Schneider LS 110mm f/2.8 leaf shutter lens and on the D800 we shot with a Nikkor AF-S 85mm f/1.4G. For all of the images we shot for this comparison we also used Elinchrom studio strobes to light both the model and the still life.

Let's start first with the still life set up. When we shot the still life both cameras were mounted on a tripod and we had approximately the same exposure settings on both cameras. The aperture was set to f/11 on both cameras and the shutter speed varied slightly to account for the sensitivity differences between the two cameras. We shot with the Phase One tethered to an Apple MacBook Pro laptop so that we could see the images, and check for accurate focusing on the fly. As you can see on the next page, the images from the IQ180 are quite a bit larger than those from the D800. Here, I am showing the image (with just a bit of cropping for the layout) and just below that a screenshot of the images with no sharpening applied at 100% view in Photoshop.

A few things to note here, the 80-MP sensor of the IQ180 has 2.2 times as many pixels as the 36-MP D800 sensor. So it is no surprise that the IO180 shows a lot more detail than the D800 in these test shots. Also, we used the regular D800 for this comparison, not the D800E, which does not have an anti-aliasing filter. The D800E would have been a better camera to use for this comparison but we did not have one on hand to use for the test. Nonetheless, the D800 still did quite well. If you zoom into the images on the next page (to 150%) you can see a little more detail in the images. Of course, comparing the images in this newsletter at a reduced resolution isn't necessarily ideal to make your own judgements so you will have to trust my objectivity here. Of note, there were five different ASMP members who were at the test shoot and we all looked at large prints of the images and also viewed them on a monitor. Hence, I will not only give my thoughts on the results but also the consensus of the group here in this comparison.

The first thing that struck all of us in the still life test images was how little depth of field there was in the IQ180 image, even though it was shot at f/11. Granted the image was shot with a 110mm lens but as you can see in the close up image on the next page from the Phase One, the apple is out of focus and it is only a few inches in front of the wire disc behind it. Maybe it has just been a while since we have all shot with medium format cameras but this lack of depth of field made it difficult to get accurate focus—even on a still life with the camera locked down on a tripod.

Of course, we were all blown away by the huge image files that came out of the IQ180. Straight out of the camera the IQ180 raw images files were around to 80 MB!



Above are images of our still life setup shot with the Phase One IQ180 (left) and the Nikon D800 (right). The full frame images appear at the top of this page and 100% crops of those images appear underneath them. As you can seen in the 100% crops of each image, the Phase One IQ180 has quite a bit more resolution than the D800—approximately 2.2 times as much resolution. Also of note, the depth of field from the Phase One IQ180 and 645DF camera was considerably shallower than that produced by the D800 as would be expected. These images were not altered in any way in the post-processing. They appear here just as they came out of the camera with no sharpening or tone correction. If you zoom into this PDF at 150% you will have the most accurate representation of these images.



Once they were saved as 16-bit Photoshop files the file size was just under 500 MB. By comparison the D800 raw image files were a paltry 41 MP. The resolution produced by the IQ180 was jaw dropping as you might expect but the biggest difference between the D800 and the IQ180 was in the bit depth. The D800 has a bit depth of 14-bits, while the IQ180 produces a full 16-bit image file. Because the IQ180 produces a 16-bit image the transitions from deep blacks to pure white highlights were buttery smooth. In fact, we tried to blow out the highlights completely with the IQ180 and found it nearly impossible to do so. If we had been shooting outdoors sans strobes then I am sure we could have blown out some highlights but even then we would have had to really work hard to do so. Aside from the obvious resolution differences, the bit depth was the biggest and most obvious difference we could see—especially in the prints.

Moving on, when we photographed the model, as can be seen on the previous page and on page 15, we shot with both cameras handheld. As you would expect, the D800 is a joy to use and far exceeded the Phase One 645DF in terms of camera handling. The Phase one 645DF with the IQ180 back on it was quite heavy. It felt like you were holding a brick, albeit a brick with a very well crafted grip on the side of it. The 645DF feels incredibly solid, let's just put it that way. While the IQ180's autofocus was responsive, it certainly lagged far behind the D800. I think all of us that shot with the 645DF had issues with the autofocus locking onto the subject where we wanted it to. The 645DF has one large AF point in the center of the focusing screen which doesn't allow for a precise selection on your subject unless you are really close. Because of this, even when shooting the model a f/11 we still had trouble getting the eyes in focus. Often the eyelashes would be in focus and the eyes would be ever so slightly out of focus. Luckily we had the camera tethered to a laptop so we could check the focus but this was a fairly serious issue. The Phase One rep said that the new 645DF+ camera body was shipping soon (and has already started shipping) and that it would have faster and more accurate AF than the 645DF we were shooting with. The updated AF in the 645DF+ includes three smaller focus points which should allow for more accurate autofocus but I have not shot with that camera body. I will say that when I shot with the Hasselblad H4 cameras I was guite impressed with how accurate and responsive their autofocus was for a medium format camera system. Though I haven't used the new Phase One 645DF+, I would say that the Hasseldblad H4 and H5 series cameras have much more accurate and advanced autofocus than the Phase One cameras.

All of us were amazed at how ancient the technology on the Phase One camera itself felt when compared to a modern DSLR. The 645DF felt like shooting with a Nikon F90x in a different form factor. Hence, while the IO180 back produced astounding image quality and resolution the Phase One 645DF did not impress anyone in our group. In fact, I think most of use were finding the camera body so limiting that it was hard to think about switching to the IQ180 digital back. Now, I do know of a few photographers using this camera to shoot action sports and I know that they are getting in-focus images but I can only assume that they are pre-focusing or using wide angle lenses to extend the depth of field so that they can get the subject in focus. Even so, this is not a camera that screams "action" photography.

Once the test shoot was over, one of our members who









Above are images of our model shot with the Nikon D800 (left) and the Phase One IQ180 (right). The full frame images appear at the top of this page and the 100% crops of those images appear underneath them. I chose to focus the 100% cropped images on the lips because we had difficulty getting the eyes in focus with the Phase One 645DF. As is obvious, the Phase One back produced a much higher resolution image. These images were not altered in the post-processing and there was no sharpening added to the images. If you zoom into this PDF at 150% you will have the most accurate representation of these images.

was quite comfortable with Phase One's Capture One software worked up the IQ180 image files and I worked up the D800 image files in Adobe Lightroom. Of note, when I say work up, I mean that we ran the images through the software, made no changes whatsoever and output 16-bit Photoshop files for the final comparison. Also, just another side note here: we set both cameras to shoot in auto white balance so that we could compare how each camera handled the white balance. As you can see by the portraits here both cameras did a decent job but there are very slight color differences.

After the images were worked up, another ASMP member, Steve Zeifman, a professional fine art printer here in Santa Fe printed a series of prints from all of the cameras that we shot with including the Canon 5D Mark III since many of the ASMP members here locally shoot with that camera. Steve made 11x14 inch prints of each image as well as cropped 100% blow ups of each image so that we could see what they looked like at full resolution.

All of us that were at the test shoot compared the images on our own monitors and then got together to look at the prints that Steve made. I will just say this before I discuss our thoughts on these two cameras: there is no winner or loser here. Both the Nikon D800 and the Phase One IQ180 digital back produce amazing images. With that statement out of the way, I'll share both my thoughts and the thoughts of the group. First off, if you need to print images that are five feet wide and you need the absolute best resolution that you can possibly get then yes, the IQ180 will produce higher quality prints than the D800. For most of us, printing anything that huge is quite rare. For the fine art photographer this may be a difference worth considering.

Before I go any farther let's discuss the financial aspect of these two cameras since that will be a major factor for 99.9% of the photographers reading this comparison. The Nikon D800 camera body sells for \$2,996.95 at B&H right now and the high-end Nikkor 24-70mm f/2.8 zoom lens sells for about \$1,900. Put that together and you are looking at \$4,900 for a very basic kit. The Phase One IQ180 sells for a whopping \$47,990.00 at Samy's Camera (in California) and for that price it comes with a Phase One 645DF camera body and an 80mm Schneider lens. The price difference between the IQ180 and the D800 is \$43,090! Knowing this price difference had a huge effect on all of us who tested the camera because for most of us buying an IQ180 would be a financial disaster. There were a few in the group that did have the ability to pony up for the IQ180, but it comes down to just how much better is it than the D800 or the 5D Mark III. With these prices in mind let's continue with our comparison.

Just looking at the images, particularly the prints, it was obvious that the IO180 was double the resolution of the D800. Looking at the uncropped 11x14 inch prints it was very difficult to tell the D800 from the IQ180. In fact, we had to look at the images very closely to see any differences and even then a few of us guessed wrong. Incidentally, it was pretty easy to tell the Canon 5D Mark III print from the other two. When we stepped up to the 100% crop prints, which were also printed at 11x14 inches, the IQ180 definitely showed more resolution but the difference was not as profound as we would have thought. These were easy to tell apart because the IQ180 print was zoomed in much farther than the D800 or 5D Mark III prints at 100%.

In the end, we all agreed that the Nikon D800 held it's

own surprisingly well against the Phase One IQ180. Considering we had a very difficult time telling the 11x14 inch prints apart for most of our work, there seems to be very little reason to spend \$43,000 more on a camera system to get basically the same results. For the high-end fine art photographer looking to make huge prints that extra cost may be worth it, but for those of us that are primarily commercial photographers if we need that kind of resolution renting a medium format camera system seems to make much more sense than buying one, especially when factoring in how quickly medium format digital cameras depreciate. Renting a 60 MP Phase One kit or a 60 MP Hasselblad kit runs about \$500/day right now, which seems quite reasonable—especially if the client is paying for that rental fee. It isn't that the image quality of the IQ180 wasn't outstanding—it is just that the price difference for a very small jump in image quality seems enormous. In fact, the end result of our comparison was that a few Canon 5D Mark III owners have bought the Nikon D800 and a few Nikkor lenses to go along with it.

Talking with the rep and seeing a quote that he gave to one of our members I just want to say that the actual final price you would end up paying for one of these top-end medium format digital cameras is likely to be quite a bit lower than the sticker price that Samy's displays on their website. The rep had a few ways of bringing down the price: like buying an older refurbished or used medium format digital back for a lot less money and then trading that one in for the newest version of a digital back. From the estimate I saw this could save around \$10,000. Even with that discount you are still forking over \$33,000 more than you wold for a Nikon D800. I just thought I would bring this up since for some photographers that discounted pricing might make it worthwhile.

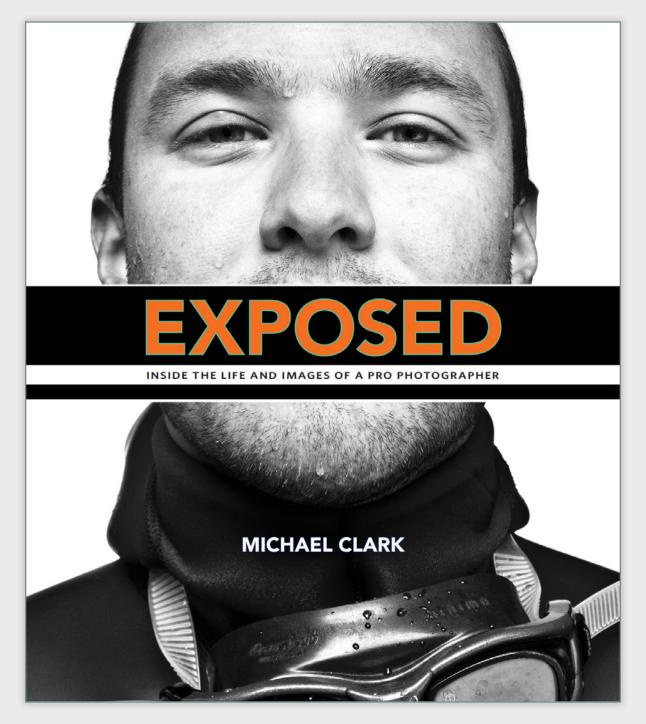


Above is a pathetic iPhone photo of the final evaluation prints. Laid out on the top row are the full resolution test prints and on the bottom row are the uncropped 11x14-inch prints. While it was fairly easy to tell which image was shot with the Canon 5D Mark III, differentiating the Nikon D800 from the

One final thought that Peter brought up was how you would deliver the final images produced with the IQ180 to a client. The finished 8-bit full res images were around 250 MB each. Hence, sending a few images to a client would be a difficult task and storing the huge image files would mean a major investment in hard drives.

As an adventure sports photographer, regardless of the image quality of the IQ180, the camera itself would not work for the types of fast-action images I produce. Sure I could produce images with that camera but I would be severely limited. The Nikon D800 isn't necessarily a sports action camera either but it would excel in that genre far better than the IQ180. Hopefully at some point Nikon and Canon will come out with a 16-bit DSLR, which seems like an obvious improvement we can all benefit from. My thanks to Phase One for letting us test out the incredible IQ180 and the 645DF. For more information on the Phase One 645DF+ camera body and the IQ series of medium format digital backs visit <u>phaseone.com</u>.

Exposed. The Life of a Pro Photographer.



Revealed. The Secrets Behind the Images.

ORDER THE BOOK ONLINE AT PEACHPIT, AMAZON OR BARNES AND NOBLES

ON ASSIGNMENT:

NEXTera® ENERGY

RESOURCES.



ate last year I was contacted by a green energy company about photographing a few of their wind turbine sites in Dodge City, Kansas. That company, NEX-Tera Energy Resources, was looking for different types of images than the standard beauty shots of wind turbines and the surrounding landscape. Of course, I still had to come back with some stellar images of the wind turbines themselves, but the landscape in Kansas wasn't exactly exciting. When I got the assignment, the art buyer informed me that I had my work cut out for me because these wind turbine sites were built on flat patches of dirt. When I got out to the sites, I found the landscape to show

off the wind turbines quite well and there was even a fair bit of green still in tact from the summer crops.

Dodge City is one of the windiest locations in North America and there are at least 1,000 or more wind turbines surrounding the

city. As an adventure sports photographer this assignment was quite far off the beaten track for me but I was keen to help promote green energy and also to climb up to the top of a giant wind turbine. Strangely enough, in the past few years, I have shot three energy related assignments. As you can see from the opening image on the previous spread, my rock climbing skills came in handy even on an industrial assignment like this one. For this assignment with NEXTera Energy, I spent three days shooting at three different wind turbine sites. As usual, each day had me out shooting well before dawn to get the best light on the wind turbines. The temperatures while I was in Kansas were frigid—much colder than I had

expected. Making the cold conditions worse, the wind never let up. On the first day of the assignment the wind speeds were over 40 mph, with gusts up to 50-plus mph. I had to hang a 30-pound sand bag on my tripod just to keep the camera steady for the early morning shots.

Having never shot wind turbines before up close and personal I was blown away by how elegant these giants are and how beautiful they appear on the landscape. The giant Seimens wind turbines at two of the sites (as pictured on the next page) reach up to an amazing 436 feet (130m). The blades are each 174 feet long (53m) and the

tower holding the hub and the nacelle is a whopping 262 feet (80m) above the ground. When the blades swish by you at the base of one of these wind turbines they are remarkably quiet for such a huge device. I have to think that these are one of mankind's most

beautiful works of art and hundreds of years from now these wind turbines dotting the landscape will be just as remarkable visually as the old windmills from the 1800s.

For most of this assignment I was on the ground shooting the windmills from a variety of vantage points. I had free reign to roam pretty much wherever I needed to go at each site to get the best images. Because of the windy conditions and the extremely fine silty soil, I had to clean my camera sensors every night religiously. Even with my constant attention, there were still some dust spots on the sensor that showed up in a few images. It was a constant battle to keep my gear clean. The silty top soil



seemed to get into everything that was exposed to the wind for even just a few minutes. Thankfully my Nikon D4 and D800 were well sealed. Having never shot at a wind turbine site before, I had never thought about the constant battle to keep your gear clean and functional on such an urban assignment.

At one site I was also able to get up in the air and shot out of a small Cessna (as can be seen on Page 32). From the air the wind turbines looked rather small, but the patchwork farms that they were built on created some very interesting patterns. Shooting out of an open window on the Cessna only exacerbated the cold temperatures out-

side. By the time the one hour flight was over I was having a very hard time keeping my fingers warm—even with my fleece gloves.

By far, the most exciting part of this assignment was getting to climb up into the

top of one of the wind turbines. Normally, there is a two day training course that you have to take just to be allowed to climb up one of these turbines. But after talking with the site manager at the last site, I was able to convince him by showing him a few of my climbing images that this would be a rather easy climb for me. Once we got out to the wind turbine, I checked out the OSHA approved harness and gear that they used to climb up the towers—and I seemed to know a bit more about how it worked than a few of the other employees just because I used similar style gear when I shoot climbing. I think this gave the site manager a little more confidence that I wouldn't be a liability. On the way up the turbine, I made

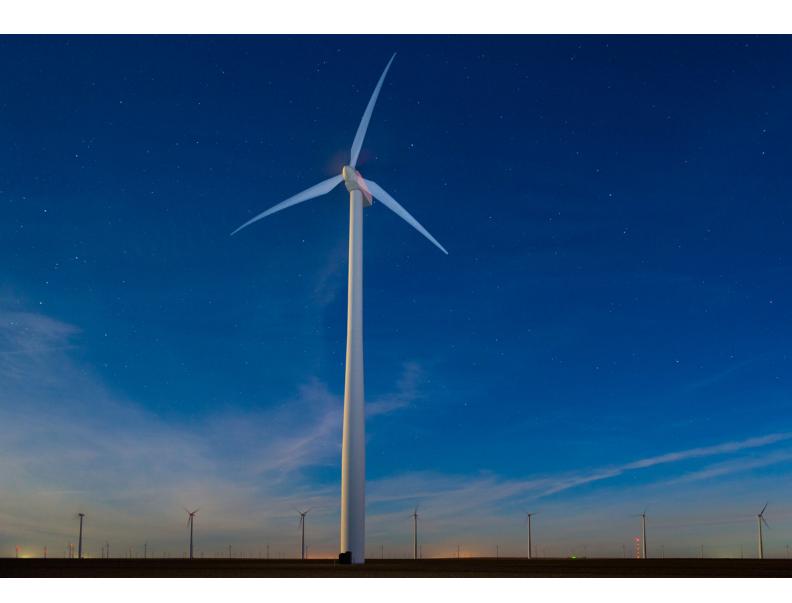
sure that I went up the ladder first or second so that I could shoot images of the other employees climbing below me. The opening spread for this article was shot during this ascent. To get that image, I had to crank the ISO on my Nikon D4 up to ISO 6400 since it was fairly dark inside the tower.

Once we got on top of the nacelle, which is the generator housing on the top of the main tower, we opened up the main doors (as seen in the double page spread on pages 30-31). The site manager and his crew were inspecting this brand new wind turbine before it could be turned on and also took time to work with me to create images on

top of the nacelle. The climb itself was not that difficult. It was basically a series of 80-foot ladders with platforms between each section so that certain areas of the wind turbine's tower can be inspected and maintained.

"I have to think that hundreds of years from now these wind turbines dotting the landscape will be just as remarkable visually as the old windmills from the 1800s."

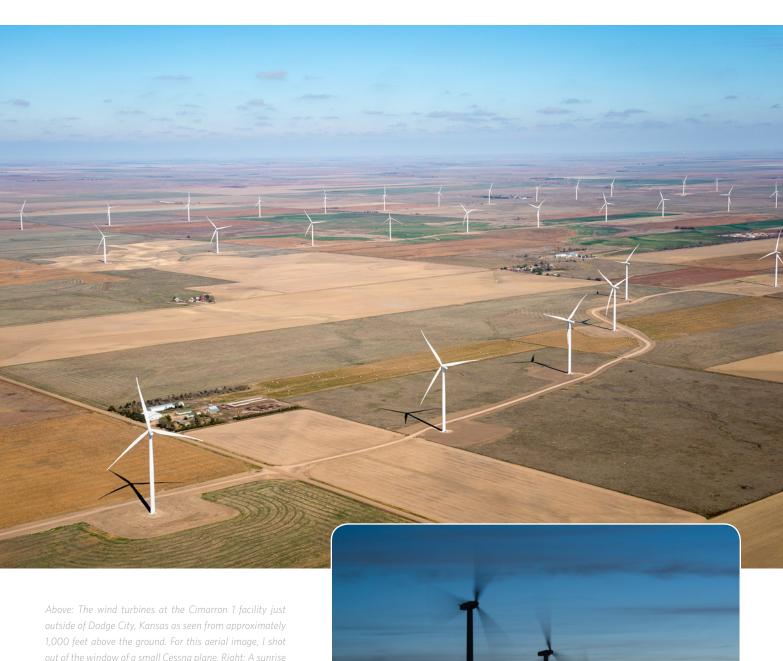
It is great to see so many wind turbines going up and the increasing amount of green energy being produced here in the USA. It was also quite nice to learn about how these wind turbines work and to see them up close. These wind turbines are technological marvels and they are already a significant percentage of our energy production, along with solar energy, here in the USA. Working with NEXTera was a great pleasure. The art director was very responsive to my ideas and I checked in with him several times during the assignment. My thanks to the fine folks at NEXTera Energy, the site managers and everyone that helped me out to create these images.



Opening Spread (Page 24-25): Lucas Jurek climbing up the inside of a wind turbine at the Ensign facility just outside of Dodge City, Kansas. Page 27: The wind turbines at the Cimarron 1 facility just outside of Dodge City, Kansas. Above: A night shot, created with a powerful strobe, of a wind turbine at the Gray County facility just outside of Dodge City, Kansas. Note that you can see through the blades of the turbine because of the long exposure. Double page spread (Pages 30-31): David Farkas and Lucas Jurek working together in the nacelle atop a wind turbine at the Ensign facility just outside of Dodge City, Kansas.







out of the window of a small Cessna plane. Right: A sunrise shot of the wind turbines, owned by NEXTera Energy Resources, at the Gray County facility just outside of Dodge City, Kansas. For this image, I used a long exposure to blur the blades of the wind turbines—note that the turbines in the background were not spinning.

Right: A sunrise shot of the wind turbines at the Ensign facility just outside of Dodge City, Kansas. This facility has a smaller number of wind turbines than the Gray County facility just next to it but the Ensign wind turbines are much larger and produce more energy even though there are fewer of them. Below: A sunset shot down a row of wind turbines at the Gray County facility just outside of Dodge City, Kansas.







perspective

It's Not About the Camera

by Michael Clark

t's not about the camera. It's about vision. Photography involves guite a bit of sophisticated equipment no matter what you are shooting with. But the camera is just a tool and megapixels are not the end-all-be-all measurement of a cameras abilities. With the comparison of the 36-megapixel Nikon D800 and the 80-megapixel Phase One IQ180 in this issue of the newsletter I wanted to balance out that geek session with an editorial on forming a vision for your work. The tools are just the tools. These days we have incredible tools to create photographs and that is not to be downplayed. The new digital cameras allow us to create images that could never have been made before. But the reality is that without vision and forethought, it doesn't matter what camera you have in your hands—it won't create stunning images on it's own. Hence, photography is not about the camera.

I recently got a comment on my blog from a reader asking, "How in the hell did you take these great shots with the Nikon COOLPIX 500?!!! I've got to know. I've had this camera for about a year. Have experimented every which way and always have to wait for people to stand still to get a good crisp picture." This comment was in response to a blog post detailing an assignment I shot for Nikon using their COOLPIX P500. You can read my full answer to his questions by clicking on the underlined link in the last sentence but the gist of it was that I spent a

significant amount of time learning how the camera worked and then spent a lot of time setting up a series of photo shoots to show off it's capabilities. Did the camera limit me in what I could do with it? The answer is yes. It was a point and shoot afterall. But even so, I had a vision for what I wanted to create and I worked hard to create those images. This just goes to show that while the camera may be limiting a creative person can still overcome those limitations and create amazing work with any tool.

Before any photo shoot, I always craft a shot list. This is a list of the types of images I want to get. Of course, depending on the shoot I may or may not have control over anything. Either way, creating a list of the type of images I want to get will help me think through the shoot and will prepare me to succeed. If I have control over the shoot then I can work with the subjects to create the types of images I am looking for. If I don't have control then I have prepared myself to anticipate moments that I think will be key to telling the story of that event. In effect, I have pre-visualized the images I hope to get. How I capture those images is a matter of using my tools to the best of my abilities—and yes, certain tools can help me get the image I am looking for but that is just part of the process to achieve my vision. With this in mind, enjoy the detailed camera comparison in this issue of the newsletter then forget it and go out and create something amazing!

parting shot



Clay Moseley skate skiing at the Pajarito Nordic Ski area near Los Alamos, New Mexico.

Adventure Sports Photography. Redefined.

