

NEW ADVENTURES with Birds of Prey

By Charles R. Preston, PhD

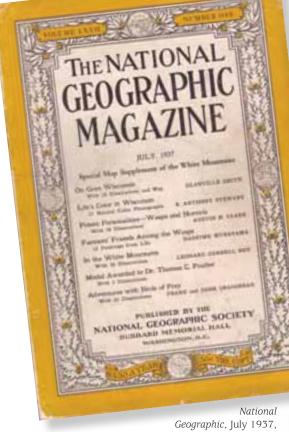
ational Geographic magazine has played an important role in many a budding explorer's life and career. It certainly played a big role in mine. Both of my parents were stationed with the U.S. Army at Ft. Chaffee, Arkansas, and I spent a good deal of after-school and summer time doing chores for my grandmother in her old Victorian-style boarding house in nearby Ft. Smith, Arkansas. Western history buffs know

Ft. Smith as Judge Isaac Parker's "Hell on the Border" town. It was made famous in the book and movies True Grit, as the western seat of law and order bordering the wild and wooly Oklahoma Territory in the late nineteenth century.

It still inspired a frontier spirit in me and my childhood friends growing up in Ft. Smith in the 1950s. My particular brand of frontier spirit was directed

> toward exploring nature and all things wild. So, when I

discovered the great cache of National Geographic magazines tucked away in the attic by one of my grandmother's boarders, I was ecstatic! I felt like I had discovered a magic carpet that would take me to exotic, dangerous, and mysterious places around the world. Despite being explicitly forbidden from climbing up to the dingy, spiderfilled attic, I snuck up there at every opportunity with a candle or flashlight to pour through the boxes of National Geographic magazine. In the autumn



from Preston's private collection.

Two great horned owls, eager to be on the wing, are perched on Frank Craighead's gloved fists, page 124. of my eighth year, I stumbled on an issue that has helped guide my life's work in wildlife ecology, and especially raptor biology and ecology, ever since.

The issue was published in July 1937, and contained an article and series of dramatic black-and-white photographs telling the story of two teenaged twin boys and their friends as they studied, photographed, captured, and trained birds of prey mostly in and around Rock Creek Park in Washington, D.C. I was especially enthralled with the photographs of powerful birds of prey perched on the boys' gloved hands. I'd never thought

of Washington, D.C. as exotic, but this article opened my eyes to the awe and mystery of nature that surrounds us everywhere. Birds of prey provide the perfect eye-openers. Some youngsters are first lured into a life of science by dinosaurs, faraway planets, or volcanoes, but for me it was those magnificent birds with talons as sharp as needles, flesh-tearing beaks, and huge eyes positioned like ours in the front of the face.

The article was titled "Adventures with Birds of Prey," and it was authored by the twin teenagers, Frank and John Craighead. This was the Craigheads'

first published article, but not their last by a long shot! These two explorers, scientists, educators, and conservationists became world famous-largely for their pioneering work on eagles and grizzly bears in the Greater Yellowstone region. We present an overview of the Craigheads'

careers and accomplishments in the Buffalo Bill Historical Center's new Wyoming Outdoor Hall of Fame exhibition and in our recent book *An Expedition Guide to the Nature of Yellowstone and the Draper Museum of Natural History*.

Of all the places they could have lived, John and Frank Craighead chose to live, work, and study most of their adult lives here in the Greater Yellowstone region. Frank died a few years ago, but John, now in his nineties, resides in Montana. I've been lucky enough to explore and conduct research in many of those exotic places I first saw in National Geographic—the Galapagos Islands, Belize, Ecuador, etc. But, like the Craigheads, I chose the Greater Yellowstone region above all others. Although I've studied a broad range of species and ecological topics, birds of prey have remained at the forefront of my scientific research program. In addition to being interesting in and of themselves, raptors are especially good barometers of environmental health and good models to explore broader ecological topics, such as predator-prey dynamics and habitat selection and use.

Birds of prey somehow connect in



"Fierce and alert, this young great horned owl scared the authors' dog," page 126.

John Craighead lowers himself to a nest of red-shouldered hawks, page 111.

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an emotional, even spiritual way with people across cultures and age groups. The ancient Egyptians considered Horus, the falcon-headed god of the sky, as one of the most important animal-gods. In one Egyptian temple, archaeologists have discovered the mummies of more than 800,000 falcons! Raptors have played a profound role in American Indian life in both religion and art. A casual glance at the Center's Plains Indian Museum collections reveals a wide variety of garments and other materials adorned with feathers from many species of raptors. Eagle feathers, and to a lesser extent, red-tailed hawk feathers are among the most prized.

Among Plains Indian cultures, the golden eagle eclipses all other raptors as a symbol of spiritual power. Eagles and other raptors have been chosen as national symbols by many countries across the world, including the United States (American bald eagle) and Mexico (golden eagle). Sports teams and multinational corporations also use raptors to symbolize their power, speed, and proficiency, and falconry continues to be among the most popular outdoor avocations across the world. There is something magical that happens when someone, youth or adult, is introduced to a live raptor. It defies description, but it is undeniable that people are attracted to and mesmerized by an encounter with a live bird of prey. For some, it is truly a life-changing experience.

Over the last several years, we have incorporated birds of prey into the Buffalo Bill Historical Center in various ways. For example, we have been engaged in a long-term study of golden eagle nesting ecology in the Bighorn Basin and other areas of the Greater Yellowstone region since 2009, incorporated various raptors into each of the four life zones presented in the Draper Museum of Natural History exhibits, displayed interpretations of birds of prey in the Whitney Gallery of Western Art, and as noted above, showcased raptor feathers and other elements in our Plains Indian Museum galleries. Since coming to the Center, I've authored two books on raptors, along with several scientific and

popular raptor articles. We're currently developing a grant proposal for the National Science Foundation to use our golden eagle research, and Plains Indian collections and expertise, as a foundation for an engaging suite of informal and formal educational experiences directed to audiences across the nation. Following in this

path, we've embarked on an exciting new initiative—a live raptor education program titled the Greater Yellowstone Raptor Experience.

When we were first developing the vision and exhibits for the Draper Museum of Natural History between 1998 and 2002, we envisioned that the Draper would help the Center expand our walls and move beyond traditional museum boundaries in many ways.

One concept that kept rising to the top—in part buoyed by that profound *National Geographic* moment so long ago in my grandmother's attic—was the development of a live raptor program that would help us provide our audiences with engaging and even inspirational experiences with birds of prey in the West. We could think of no better way to fulfill the Draper Museum's mission to increase understanding and appreciation for the relationships binding humans



Sioux/Northern Plains war bonnet with eagle feathers, ca. 1890. Gift of Irving H. "Larry" Larom Estate. NA.205.35

and nature and emotionally connect people with nature. With so much else to accomplish, however, the idea of a live raptor program was placed on a backburner until early 2008. The Center's new **Executive Director** and CEO, Bruce Eldredge, had only been on board for a few months when we had the chance to

talk casually about future programming initiatives. When I described a live raptor education program, Bruce was immediately enthusiastic and supportive. He knew how popular live raptor programs were in other venues and encouraged me to pursue the concept. After some additional discussions and research, we submitted grant proposals to the W.H. Donner Foundation and Donner Canadian Foundation (the latter in partnership with University of Wyoming's Berry Biodiversity Conservation Center) to establish the Greater Yellowstone Raptor Experience and fund operations for up to three years. Late in 2010 we received notice that our proposals were approved for funding!

Our first order of business was to recruit a dynamic, experienced, and highly skilled professional to come to Cody, Wyoming, and the Buffalo Bill Historical Center to become our first "Raptor Wrangler" and establish the new program. "Walking on water" was only left out of the job description at the insistence of Chris Searles, the Center's Human Resources Manager. We embarked on a national search, hoping to attract at least a couple of strong applicants for this highly specialized position. We advertised in several national raptor-related venues, and I contacted dozens of my colleagues in the raptor research and education field to spread the word.

To our delight, we received more than two dozen applications, including many highly-qualified candidates. One person stood out, though, when we began interviewing the top tier of candidates. She was highly personable, dedicated to quality education and the highest level of bird care, and possessed many years of experience in first-rate organizations. There was one problem, however; she was currently employed by my close and highly respected friend, master falconer Kin Quituqua. I even sit on the advisory board of the amazing organization, HawkQuest, that Kin operates in Colorado, and he has presented programs at the Center in past years, helping us test the waters for a live raptor program.

Kin brought a golden eagle to help celebrate the Draper Museum of Natural History grand opening in 2002. I knew Kin valued our top candidate highly, and she had great respect for Kin. But she was also at a point in her career when she was prepared and anxious for this new challenge, and she loved Cody. So, we offered her the job, and I put in a courtesy call to Kin to give him a heads up. Fortunately, Kin was gracious, and Melissa Hill accepted our job offer. Of course, I have to find some way to make this up to Kin, and he calls to remind me of that from time to time. From my perspective, that's fair trade!

Melissa started her job at the Center in February 2011, and has been a whirlwind since. I haven't seen her walk on water yet, but she has certainly fulfilled our grandest expectations thus far. Even Melissa couldn't have anticipated all the challenges of establishing a live raptor program from scratch—securing permits, acquiring birds, overseeing design and construction of raptor housing, recruiting and training volunteers, and so on. I had contacted both federal and state agencies to begin the permitting process, but it was left for Melissa to follow through and work directly with these agencies. We have a team to help Melissa, but she has ably shouldered the eagle's share of the challenge and has already thrilled audiences with our new stable of raptors.

In the following article, Melissa will tell you in her own words what she has accomplished to date and what we're planning for the future. This is an exciting time for the Buffalo Bill Historical Center, and I hope we can help infuse our audiences with the spirit of exploration and the sense of awe and mystery I felt so many years ago when I was first exposed to "Adventures with Birds of Prey!"

Dr. Charles R. Preston is a Senior Curator at the Buffalo Bill Historical Center and Founding Curator in Charge of the Center's Draper Museum of Natural History.



Don Chaffey (L) and Richard Gruber, members of the Center's Golden Eagle Posse.

The building of an empire... well, a new program, anyway!

AUDIENCES RAPT WITH RAPTORS

By Melissa Hill

here was a time when I wouldn't have considered myself "happy." Now, it's odd to think that just one year ago, I had become at least moderately happy with my career and life in the suburbs of Denver thanks to some birds. Yes, my outlook completely changed as I found myself working with raptors (birds of prey) again after far too long a break.

I was employed with HawkQuest, a raptor education group in Colorado that traveled to the Buffalo Bill Historical Center the previous two summers to give lectures. I still recall our first evening in Cody in 2009 when I turned to Dr. Charles Preston, natural history curator, and said, "So, are you hiring?" I didn't even care what position might be available! I wanted to leave Denver and move back to a small town where people were friendly and genuine. After spending only a few minutes in Cody and the Buffalo Bill Historical Center, I knew I had found that place.

Little did I know that Dr. Preston had actually been planning a live raptor education program even before he spearheaded the opening of the Draper Museum of Natural History in 2002. Here we are, nearly two and a half years later, and I'm living my dream. It's been a lot of work, with a few minor setbacks, several headaches, and a whole lot of fun, but I'm proud to say that the Greater Yellowstone Raptor Experience is here!

Musing about the mews

After arriving in Cody in 2011, my first task was to design the living space for the birds, called a mews. I drew up a plan to accommodate the five birds the state of Wyoming would allow for educational programs and showed the plans to the state game warden from the Wyoming Game and Fish Department; he would inspect the mews upon completion. Was that ever a good idea! After talking to the game warden, I realized we weren't on the same page. We were each using a different guideline for housing birds of prey—his for raptor rehabilitation

Melissa Hill and Isham, the red-tailed hawk. and mine for non-releasable, permanent residents.

I revised the plans and armed myself with the references I needed to back up my design. I planned to show the game warden exactly why I had chosen the sizes for the enclosures we intended to build. I dropped off the design at his office, and then held my breath as I waited to hear back from him. What if he still had concerns? Had I taken this job and moved across two states only to fail before the program even got off the ground?

It's amazing the fear that can overtake you when you step completely out of your comfort zone. This was a new adventure for me. Granted, I had worked at three different raptor organizations-each an amazing learning experience for me. I knew I was great at handling raptors as well as teaching kids and adults alike about the birds that I so love, but I wasn't the one in charge before. I had never had the weight of an entire program riding on my decisions. Maybe I wasn't ready for this; I was starting to panic.

Nevertheless, I prepared to argue my case and "save the program," but it proved to be totally unnecessary. "If you build what you have on these plans, I'll approve the building," the warden said. Hooray! The first obstacle was overcome! Now it was time to start building.

Calling all inhabitants, er, raptors

I forwarded my design to the mews construction project manager,

Historical Center Carpenter Matt Bree. His task was to turn my design into actual working blueprints and gain approval from the Planning & Zoning Commission. Finally, we broke ground on the mews on April 19, 2011, to very little fanfare, but much excitement for those most closely attached to the program.

With construction under way, I looked for suitable birds for our program. Dr. Preston and I agreed to showcase birds found in the Greater Yellowstone region. On the first day of my search, I learned of several birds that seemed perfect for our program: an American kestrel, a peregrine falcon, and a great horned owl. As it turned out, the kestrel and owl already had homes, but fortunately,

the rehabilitator had another great horned owl that could not be released—a requirement for captive birds of prey in the United States. We discussed the possibility of the owl coming to live in Cody, and after several e-mail exchanges, we decided he would be a perfect fit. "Teasdale," named after Teasdale, Utah, where he was found by hikers, was ours!

Shortly after that, I discovered that the peregrine falcon was still available, and the rehab facility was very excited to have finally found her a home. It is very difficult to place non-flighted peregrine falcons with education programs—everyone wants a falcon that can fly and show off his skills. We weren't concerned about all that, though, and the facility reserved "Hayabusa" (the Japanese word for peregrine falcon) for us!

As our program began, I knew I wanted either a red-tailed hawk or a rough-legged hawk. Normally, redtails are very common, but I couldn't find any that needed a home. Finally, I stumbled upon a perfect candidate. Not only was he beautiful, but he had been in an education program for years, which meant he was already trained. Again, a few e-mails later, "Isham," named

after one of Buffalo Bill's horses, was

Volunteer Rosemarie Hughes and Teasdale the great-horned owl The building of an empire... well, a new program, anyway!

set to join our program. We were off to a great start!

Interns to the rescue

In mid-May, our summer interns, Nate Horton and Pat Rodgers, arrived. We had a slight problem, however: The mews was barely under construction, and we had no birds for their raptor education internship. I trained them to hold raptors and tried to teach them as much as I could without actually having live birds on site. Fortunately, both interns were very handy and played a major part in the construction of the mews as well as assisting Dr. Preston in his golden eagle field research. Amazing interns, they could help with any project, and work independently when necessary. I desperately hoped that the birds would arrive before the interns headed back to the University of Wyoming at summer's end.

Finally, at the end of June the mews was complete! Within two days, the Wyoming Game & Fish warden inspected and approved the building.

Then, I handed him our application for the owl, falcon, and hawk, which he said he'd sign and send to the state office that night. In addition, I immediately mailed our application for federal permits to the U.S. Fish & Wildlife Service.

And then we waited...

AUDIENCES RAPT WITH RAPTORS

A note printed very clearly on the federal permit application instructed us to allow thirty to sixty days for processing but advised that it could take even longer. We assumed we would wait quite a while since Wyoming falls within one of the busiest regions of the Fish & Wildlife Service. How shocked we were when our approved permits arrived in just thirty days!

Time for raptor wranglers

While we waited for our state permits (required in conjunction with federal permits to keep captive raptors in the state of Wyoming), I received a call from a friend in Kansas who also works in wildlife rehabilitation. She had a baby turkey vulture that was imprinted on humans and would need a home in a captive program like ours. Would I want her? Of course! Turkey vultures are my favorite birds, and I was



really hoping to find one for our program. "Suli," derived from the Cherokee word for "vulture," would be our fourth bird.

When our state approval finally came in the middle of August, I was "chomping at the bit" to get the birds to Cody. Within a few days of receiving our permits, I put 2,200 miles on my car, and we had three birds in the mews. I spent the next few days getting acquainted with them and soon started training. It wasn't long before all the birds were standing nicely on the glove, and we began bringing in the volunteers to learn how to hold them and care for them.

Even before I arrived in Cody, folks around town had heard about the upcoming program and were eager to volunteer to help with the birds. I had met several of them and knew we had an impressive group of volunteers lined up.

I was astonished at how well both the volunteers and the birds handled

their training. On September 5, 2011, we made our first public appearance with Isham, and within four days, all three birds had been in the public spotlight. It was all finally coming together!

In mid-September I traveled to Colorado and then to Kansas to pick up Suli. At last, we had all our birds for the time-being anyway. Although she had been raised by humans, this turkey vulture was very timid, and I spent a large chunk of the next week getting her to trust me so that I could get close to her and eventually get her equipment on. Finally, she trusted me enough to eat dinner from my glove! Once we'd achieved that, her training proceeded by leaps and bounds.

The rest of September and October was a whirlwind of training. I suddenly had fifteen volunteers who were enthusiastic and incredibly helpful. The birds were getting out into public areas almost daily, and we received a lot of great press.

Time for the big test

A huge test for the program was coming up, though—the Historical Center's Annual Holiday Open House on December 3. The birds were scheduled to be available for viewing for three hours, and I had most of my volunteers signed up to help. It was a very big deal for us as the event typically draws several thousand visitors to the Center. Could the birds handle crowds like that? Could the volunteers?

Once again, I worried for nothing. Not only did everyone—birds and volunteers alike—do well for the three hours, they remained in the limelight for nearly five hours! An estimated three thousand people saw the birds that day and declared us a huge success.

The rest of December breezed by with most of the training focusing on getting the birds used to traveling in kennels or travel boxes for outreach programs. We were back in action for our next challenge on December 30,



The building of an empire... AUDIENCES RAPT well, a new program, anyway!

2011, though, as the birds traveled twenty miles east to Powell, Wyoming, for their first offsite program. Again, they were a huge success! All the hard work I had invested in the program over the last nine months was paying off—and all the worry was really for naught.

Wrapping up the raptor story

So, that's the past year of my life in a nutshell. It's been a crazy ride, but I wouldn't trade it for anything in the world, and the best is yet to come. The future is very bright for the Greater Yellowstone Raptor Experience; we are ready to travel to schools, churches, assisted living centers, civic group gatherings, and other venues for fun and informative programs. When summer arrives, we'll concentrate our efforts on programs right here at the Center. I have very big plans for presentations in our beautiful gardens that showcase our amazing "avian ambassadors." Will there be flight demonstrations? Will there be excitement and adventure around every corner? Perhaps...I guess you'll just have to visit the Buffalo Bill Historical Center and see for yourself!

As Assistant Curator for the Greater Yellowstone Raptor Experience, Melissa Hill works in the Historical Center's Draper Museum of Natural History to establish, launch, and manage the new program. She comes to the Center from HawkQuest, a nonprofit raptor education organization based in Colorado that has presented popular raptor programs at the Historical Center in recent years. She was lead lecturer there and prior to that, served as curator of birds at Reptile Gardens in South Dakota, where she conducted programs, trained birds, and taught staff and volunteers to care for and handle them. Hill's bachelor's degree is in Wildlife and Fisheries Biology and Management from the University of Wyoming.



MEET the RAPTORS



HAYABUSA: peregrine falcon

"Hayabusa" came to us from Northwest Wildlife Rehabilitation in Tucson, Arizona. She suffered an impact injury near the "wrist" joint on her right wing. Sadly, the damage was so severe that she never regained full extension of that wing and, to this day, has very poor flight. Because peregrine falcons are extremely acrobatic and rely on their speed and aerial maneuvering to catch prey, her injury means she can never return to the wild. Haya loves to eat and will eat anything, anytime, in front of anyone, making her a huge crowd pleaser as staffers feed her in public most days.



ISHAM: red-tailed hawk

"Isham" was struck by a car and suffered such severe damage to his right eye that it had to be completely removed. The loss means he has no depth perception, making it very difficult to catch small animals. The blindness also makes him an easy target to other predators. Because he could not be returned to the wild, he was taken to Talking Talons Youth Leadership in Tiejeras, New Mexico, where his great disposition helped the staff teach the public about birds of prey for five years before coming to the Historical Center where he continues his winning ways.



TEASDALE: great-horned owl

A hiker and his dog found the injured "Teasdale," the great horned owl, on New Year's Eve 2010, near Teasdale, Utah. When the bird arrived at the Second Chance Wildlife Rehabilitation Center in Price, Utah, the staff learned the owl had fractured several bones in his right wing, which had already healed improperly. Consequently, he cannot fly well enough to survive

on his own in the wild and will live in captivity for the rest of his life.



SULI: turkey vulture

A Kansas couple found "Suli" in a haystack when she was only a couple weeks old. The couple placed her in a nearby building assuming her parents would hear her and continue to care for her at the new nest site. What they didn't know is that vultures don't have a voicebox and can only hiss and grunt. When her parents didn't return, the couple took her to the Milford Nature Center in Junction City, Kansas. The center did not have an adult turkey vulture to act as a foster parent, so Suli grew up with people. Because of this she did not gain the critical skills for survival that her parents would have taught her, and she can never be released back into the wild.

The Greater Yellowstone Raptor Experience is made possible in part by funding from the William H. Donner Foundation and the Donner Canadian Foundation. Read more about the program on our Web site, *www.bbhc.org*, and stay up-to-date with all the latest "mews news" on Facebook; yes, each bird has its own page.