

SOUTH TEXAS WILDLIFE



A publication of the Caesar Kleberg Wildlife Research Institute
at Texas A&M University-Kingsville

Winter 2012
Volume 16, No. 4



Photos (top L to R) provided by Timothy Fulbright and CKWRI Quail Associates Program
(bottom L to R) David Hewitt and CKWRI Feline Research Center

RESEARCH AT CKWRI—HOW DOES IT ADD UP?

by David B. Wester

The *Caesar Kleberg Wildlife Research Institute* is a world-renowned center for wildlife research. All of us have an idea of what research is—we hear about it in every form of media, and what we learn from research informs us every day. This is certainly obvious when it comes to wildlife: most of us grew

Editor's Note: Dr. David Wester is a Research Scientist at CKWRI and Professor at Texas A&M University-Kingsville.

up with educational programs such as *Nature* and *Wild America*, watching biologists study the wonders of the natural world around us.

Some parts of research are obvious to everyone. The urbanite might think of a scientist in a lab coat studying bacteria through a microscope. But, to most South Texas ranchers, perhaps the most obvious image of research is the field biologist. Maybe a young man in a floppy hat standing in the bed of his pick-up waving an antenna in the air trying to locate a radio-collared deer. Or how about a young lady, hair tied back to avoid blowing in the wind

and wearing snake leggings as she tromps through the South Texas brush, Global Positioning Systems (GPS) unit in hand, searching for quail nests. What are these folks doing? Well, they are collecting data of course!

Research is also obvious when a project is completed. For the student, it is a diploma granted and a bound thesis or dissertation proudly displayed on the mantle at their parent's home. For the student's advisor, it is the next generation on its way to tackle tomorrow's problems in the world. And, of course, to the larger public, it is another project that might appear on the next *National Geographic* special.

So, we see the biologist in the field every day...and then we see the end product, in print, or on the screen. But, what happens in-between? And, why is it important?

Let's go back to the data collection part of research: every one of these projects is about asking ques-

This Issue

Stats & Wildlife Research.....	1
By The Numbers.....	2
CKWRI News.....	3
Did You Know?.....	3
Year Wrap-Up.....	3
What Do They Eat?.....	4
Advisory Board.....	4

By The Numbers

1934 the year in which the United States Congress passed the Migratory Bird Hunting Stamp Act

14,000,000 dollars spent each year by birders in and around Santa Ana National Wildlife Refuge, Texas (estimated by U.S. Fish & Wildlife Service, Office of Migratory Bird Management)



© David Hewitt

Students often spend 2 or more years collecting data in the field, but analysis is needed to interpret what it means.

tions pertaining to wildlife and their habitat, and then listening for the answers. And, the vocabulary of this conversation—between the biologist and his favorite critter—is *numbers*: measurements on antler size, number of quail eggs in a nest, passage rate of migratory birds, parasite loads in turkeys...it's all about numbers.

That is what the field researcher is writing down all day long; at the end of the day, they will have another spread sheet added to the data base. And, they repeat the process tomorrow, too, and the next day. If it is a student, they may have 2–4 years of data collection when their field work is completed. And, then they are done, right? Not quite! All these spread sheets, all these columns and rows of numbers...well, they are just *data*. And data—these numbers—don't tell us much...*yet*. What we need to do is transform *data* into *information* that we can interpret.

Almost immediately the palms of a student get sweaty and the stomach knots up; most students

would rather spend another year in the field collecting more data than sit down at the computer and analyze what they have already gathered. Because that means only one thing: it is time to get out those dusty, neglected notes from that statistics class everyone is required to take, and make some sense out of all those obscure formulas. Or at least that is how many stu-

dents react to the prospect of data analysis...at least at first.

But, things usually get better because good data analysis breathes life into all those numbers! Students will exclaim, "Hey, that's exactly what I saw when I was in the field!" Of course, they say this while they are hunched over a computer screen looking at a graph with points, lines, and arrows. And, then they will smile because they realize what has happened. Yes, they saw something in the field. But, all they were doing back then was *recording* what they saw. It's that numbers thing again. When these numbers *get crunched*, they take on a whole new identity. They surrender their secrets, and when appropriately coaxed, the story they tell is full of surprises. As my boss once whispered to me during a student's thesis defense, "Whip those data, whip 'em until they confess!"

Yes, a thorough data analysis is, well, a thorough thing to go through; those spread sheets endure lots of

prodding and poking. But, all of this is administered in the spirit of getting at the facts. As Sgt. Joe Friday famously said on *Dragnet* years ago, "The facts, ma'am, just the facts."

This means that you ask a fair question of your data. And, then you accept the answer that comes from the analysis. It may be exactly what you expected, too—good results are often obvious (at least in hindsight) when experiments are well-planned. But, you also may be surprised by the answer. This can be good too because it makes one stop and think about all kinds of things: did I miss a step in my study? Is there some (less than obvious) data recording error? What kind of preconceived notions do I have about my study? And then, most important, one finally realizes that this surprising answer works too—this is something new!

Nature is full of counter-intuitive results. What about cowbird parasitism? It makes little sense in evolutionary ecology for an eastern phoebe to accept its own eggs as well as those of cowbirds. But, it happens. Another example: many regard wildfire as having devastating effects on native rangelands. Although this may be true in some woodlands, there is little scientific evidence of long-term harmful effects in mixed-grass prairies.

All of which is to say that the whole point of research is to learn something. What one learns is sometimes confirmatory, sometimes surprising. But, when it is the end product of a well-designed and conducted research project whose data are subjected to a thorough and appropriate analysis, it's a good idea to accept the results for what they are. After all, it's all in the numbers. That is what we do at the CKWRI. ~

Consider giving a tax-deductible donation to CKWRI

CKWRI NEWS

Quail Researchers Honored

The CKWRI quail program received the National Bobwhite



Courtesy NBTC

Dr. Fidel Hernández (right) with immediate past chair of the National Bobwhite Technical Committee steering committee, **Dan Figert**.

researchers **Drs. Leonard A. Brennan** and **Fidel Hernández** for their enduring track record in advancing bobwhite management through long-term research, public involvement, collaborative work, and a number of scientific and lay publications. Additional details about NBTC-NBCI can be found at <http://www.bringbackbobwhites.org/>.

Bart Ballard Receives Award

In October, **Dr. Bart Ballard**, CKWRI Research Scientist and Professor at Texas A&M University-



TAMUK file photo

Dr. Bart Ballard receiving the TAMUK Javelina Alumni Association's Distinguished Teacher of the Year Award from alumni director **Yvonne Trachta**.

the Year Award. The award is "presented to a deserving faculty member who has shown outstand-

ing service to the Javelina community through education and student activities." Bart teaches undergraduate and graduate courses in the Department of Animal, Rangeland, and Wildlife Sciences as part of his joint appointment at Texas A&M University-Kingsville.

ing service to the Javelina community through education and student activities." Bart teaches undergraduate and graduate courses in the Department of Animal, Rangeland, and Wildlife Sciences as part of his joint appointment at Texas A&M University-Kingsville.

ing service to the Javelina community through education and student activities." Bart teaches undergraduate and graduate courses in the Department of Animal, Rangeland, and Wildlife Sciences as part of his joint appointment at Texas A&M University-Kingsville.

Scott Mitchell Hired

We are pleased to announce that **Mr. Scott Mitchell** joined the CKWRI science team in August 2012. He is focusing on developing and implementing effective practices for the control of invasive grasses, as well as researching the ecological and physiological factors that allow for their establishment and spread throughout South Texas rangelands.



© Anne Thurwalker

Scott grew up on his families' farming and ranching operation near Lazbuddie, Texas. He has a Bachelor of Science degree and a Master's degree in Range Science from Texas Tech University. ~

WRAP-UP FOR 2012

by *Fred Bryant*

I don't need to tell you that another drought year descended upon us. The winter and early spring rains of 2012 gave us high hopes for wild things, but then it quit raining in several counties, most notably in the prime quail habitat of South Texas.

Editor's Note: Dr. Fred Bryant is CKWRI's Leroy G. Denman, Jr. Endowed Director of Wildlife Research.

Antler growth of wild deer seemed to respond to the winter rains with good racks being reported across South Texas. All in all it wasn't a great year for wild things, but we never lose hope as another year starts and spring approaches.

Last year was phenomenal though, for CKWRI. Our *Caesar Kleberg Partner Program* has been a huge success. Coupled with our *Sustaining Contributor* gifts, we have the underpinning now to move forward without being devastated by another recession.

We are excited to be blessed with 5 new named endowments. By now, you all should know about the endowment to honor **Grady Cage** who passed away last spring. I wrote about Grady in my **Foreword** of the *Current Research Annual Report*.

You might also know that we are raising funds for a new endowment, the *Boone and Crockett Fellowship in Ungulate Research* (ungulates are all the cloven-hoofed mammals like those of the deer family). Presently, we have \$150,000 committed toward this \$400,000 endowment, so we are actively seeking donations for this new endowment.

We also boast with pride regarding our 3 newest endowments. They carry the names of **Dan L Duncan**, **Tim and Karen Hixon**, and **Berdon and Rolanette Lawrence**. These new gifts, when completed, will total \$4.2 million in new endowed positions and fellowships. The Duncan Family has pledged \$2 million to endow the position of *Endowed Director of South Texas Natives and Texas Native Seeds* in memory and honor of their late father, **Dan L Duncan** of Houston.

Did You Know?

All 15 species of deer mice (*Peromyscus* spp.) that occur in the U.S. have white feet. (White-Footed and Deer Mice Leaflet, R.M. Timm and W.E. Howard)

Aransas National Wildlife Refuge, located along the Texas Coast, was created in 1937 to protect the wintering area of whooping cranes. (Whooping Crane (*Grus americana*) Bioloque Series; U.S. Fish & Wildlife Service)

Tim and Karen Hixon from San Antonio and Cotulla will endow 1 Fellowship each for deer research, quail research, and range restoration research for a total of \$1.2 million. Last, but not least, **Berdon and Rolanette Lawrence** from Houston and Falfurrias will fund an *Endowed Chair in Waterfowl Research* at \$1 million. These are our “game-changers” to be sure.

Also under the category of “game-changer,” because of our work and the support of 2 commercial seed dealers, **King Seed Company** and **Pogue Agri-Partners**, the *Texas Department of Transportation* has rewritten their specifications for most of South Texas and now include only native plants developed by *South Texas Natives*. So now and into the future, new highway projects in South Texas will be using native seeds released by CKWRI with our partners, the *USDA Kika de la Garza Plant Materials Center* and *Rio Farms*.

Advisory Board

The Advisory Board of the Caesar Kleberg Wildlife Research Institute provides leadership in all aspects of our work. We are indebted to them for their commitment to CKWRI and its mission.

Gus T. Canales	A. C. Jones, IV	Barry Coates Roberts
T. Dan Friedkin	David Winfield Killam	Stuart W. Stedman
Henry R. Hamman	Tio Kleberg	Buddy Temple
(Chairman)	C. Berdon Lawrence	Ben F. Vaughan, III
George C. “Tim” Hixon	Kenneth E. Leonard	Bryan Wagner
Karen Hunke	James A. McAllen	Charles A. Williams

We hired **Scott Mitchell** from Texas Tech University to tackle the tanglehead invasion that is occurring in many parts of South Texas. His work will hopefully provide solid control alternatives for tanglehead in the next couple of years. He also will be heavily involved in other research on the continuing challenge of invasive, non-native grasses.

We are planning to have a person stationed in San Antonio by May or June of 2013 to support quail research and outreach, particularly for the region within 80 miles or so of San Antonio. This position was made possible by lead commit-

ments and gifts from the *San Antonio Chapter of Quail Forever*, *South Texas Chapter of the Quail Coalition*, and a generous commitment from **Alfred Glassell, III** of Houston. With \$75,000 per year secured, we still need 1 more commitment of \$20,000 per year to make this occur (if you know of anyone...).

We have so much to be thankful for, especially the terrific support from many individuals and private foundations across Texas that believe in our work at the CKWRI. And, we are so thankful for the energy companies, state agencies like the *Texas Department of Transportation*, and *Rio Farms* who are there for us as partners as well.

We wish the best to you for the coming year. May 2013 bring rain and more rain, or at least rain at the right time for wild things. ~

What Do They Eat?

Orange sulfur caterpillars prefer to feed on plants in the legume family, including various species of vetch, clover, and alfalfa. (<http://www.dallasbutterflies.com/Butterflies/html/eurytheme.html>)

The Mediterranean gecko is an insectivore, often foraging on pill bugs, moths, crickets, and spiders. (D. Saenz, Overview of *Hemidactylus turcicus* with possible implications of food partitioning, *Journal of Herpetology* 30: 461-466)

Visit our web page at
<http://www.ckwri.tamuk.edu>



TEXAS A&M
UNIVERSITY
KINGSVILLE

Caesar Kleberg Wildlife
Research Institute
700 University Boulevard
MSC 218
Kingsville, Texas 78363-8202

Editor: Alan Fedynich, Ph.D.

SOUTH TEXAS WILDLIFE is printed on recycled paper

