



THE GOMPOU

The kori bustard SSP newsletter
December 2011 Vol. 9

2011 Kori Bustard Chick Hatchings



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Toldeo Zoo



Photos by Sara Vorpahl/Staci Bekker

National Zoological Park



Photos by Meghan Murphy

San Diego Zoo Safari Park



Photos by Jenny Tibbot

Kori Bustard International News

The National Zoo and Jacksonville Zoo sent kori bustards to Vogelpark Walsrode in 2011. Three females and one male arrived at Vogelpark Walsrode. All birds were from over-represented genetic lines within the United States but are unrelated to koris in Europe. The European population of kori bustards currently numbers 5.9.0 at four zoos.

The 2011 International Studbook for kori bustards reported the following:

The data reported in this studbook are current through 15 April 2011. As of that date, the historical population was 279.331.117 (727) animals and the living population was 44.51.1 (96) animals in 33 institutions. This number includes:

- 62 (29.32.1) birds in 20 institutions in North America and Mexico. This population is managed as a Species Survival Plan (SSP) under the auspices of AZA (Association of Zoos and Aquariums)
- 4 (2.2) birds in 2 institutions in the African region
- 14 (5.9) birds in 7 institutions in the European region
- 16 birds (8.8) in 4 institutions in the Middle East region



Photo by Lisa Barker

News of other Bustards

There are 25 species of bustards and many are poorly understood. News of a few species is as follows:

Great Indian bustard

Ardeotis nigriceps: recently listed as critically endangered by IUCN, the great Indian bustard now numbers less than 300 birds. BirdLife International 2011. *Ardeotis nigriceps*. In: IUCN 2011. IUCN Red List of Threatened Species. Version 2011.2. <www.iucnredlist.org>.

Bengal florican

Houbaropsis bengalensis: is critically endangered with a world population estimated at less than 1000 birds. BirdLife International 2010. *Houbaropsis bengalensis*. In: IUCN 2011. IUCN Red List of Threatened Species. Version 2011.2. <www.iucnredlist.org>.

Read about some of Niger's endemic bustards, the **Nubian bustard Neotis nuba** and the **Arabian bustard Ardeotis arabs** at <http://www.saharaconservation.org/?Nubian-Bustard> and <http://www.saharaconservation.org/?Arabian-Bustard>

Great bustard

Otis tarda: follow the exciting news of the species reintroduction into the United Kingdom at <http://greatbustard.org/>



South Africa's bustards and korhaans

are in trouble, with six of the country's ten species listed in "The Eskom Red Data Book for Birds of South Africa, Lesotho and Swaziland". Populations of Ludwig's Bustard and Denham's Bustard are in decline due collisions with the cables of power-lines. Another bustard in trouble is the South African endemic blue Korhaan. It is severely threatened by afforestation, crop farming, overgrazing, burning, urbanization and mining. The white-bellied Korhaan is threatened by human population pressure and inappropriate farm management. A Bustard Working Group has been formed under the auspices of BirdLife South Africa. The group has several aims, but will focus on disseminating information about bustards to the relevant authorities and stakeholders, prioritizing research needs, and determining urgent conservation interventions.

Kabelo Senyatso successfully defended his PhD Thesis: : "**Conserving widely distributed wildlife species in an African savanna: parks, livestock and community-managed -managed areas**". Kabelo has shared his adventures in this newsletter over the past few years. The kori bustard SSP financed a transponder to help Kabelo research kori bustard movement.

Kori Bustard Publications

Check out the July 2011 of AZA Connect. The kori SSP celebrated its 10th year! Read about all the great accomplishments the SSP has achieved including:

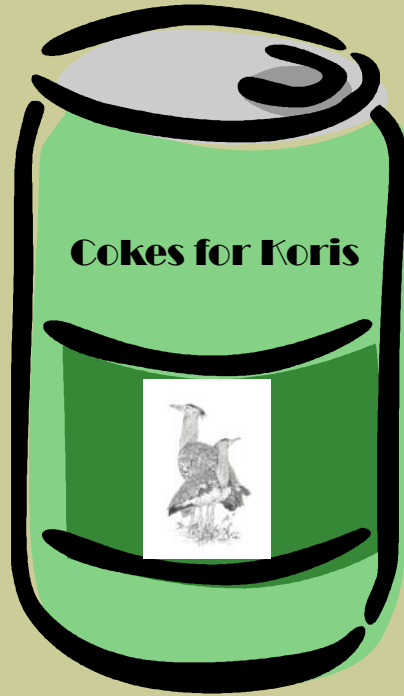


- Four years of hormonal assays provided endocrine confirmation of the seasonal nature of reproduction in the kori bustard in US zoos
- Participation by multiple zoos in Colonel Stanley R. McNeil's EthoTrak Observation System gathers behavioral information which will be used to examine institutional differences, seasonal patterns, and behavioral ontogeny at the conclusion of the study
- The establishment of the kori bustard feather donation which collects naturally molted feathers from holding institutions and sends them out *gratis* to fly tiers in the United States [AZA Connect Feb 2007]. This program has effectively flooded the U.S. market, which has apparently decreased the demand for feathers from wild birds
- The purchase of a satellite tag to monitor movements of a bird in the wild. This was part of a larger tracking study which followed the movements of several birds. The results were included in a PhD thesis
- Funding for the purchase of pins which are distributed in schools in Botswana to raise awareness of kori bustards
- An annual newsletter, edited by the SSP's keeper representative
- Development of an educational website <http://koribustardssp.org>



From Our Zoo to You

Zoo Atlanta's Cokes for Koris



The bird keepers at Zoo Atlanta have tried several different kori bustard fund-raising ideas over the years. We've organized garage sales, movie nights and now *Cokes for Koris*. The idea came from the kori bustard movie night last year. While we had a great time at the movie night, most of our money was made selling candy and sodas left over from the event. This fund-raiser could not be easier! We keep a cold supply of sodas handy in the bird dept. keeper fridge (about 40 cases of sodas was generously donated). Employees all over the zoo stop by the office, drop 50 cents in the designated jar and grab a soda. It's that easy! In 2 months we have raised around \$80 with virtually no effort or start-up costs. We strongly encourage giving this a try if your institution is looking for an easy, successful fund-raiser.

-Katie Bagley, Zoo Atlanta

Don't forget the kori bustard SSP sells many unique items not found anywhere else including key chains made in Zimbabwe.

Contact Sara Hallager
hallagers@si.edu
for more details



Kori Bustard Keeper Profile

Jenny Tibbot

I have been working at the Safari Park formerly Wild Animal Park for 6 years. I have been working with kori bustards directly for about 2 years. I have enjoyed working with a total of 7 individuals over that time period. I'm still new at it, but am crazy about koris already. The first chick I was ever involved in raising is now at National Zoo. We worked very closely with this bird and had to keep her tractable so that she could be clipped regularly. All of our kori enclosures are open top. This kori would run right up to you and eat at your feet. This made managing her free flight situation easy and painless. This year has had its highs and lows. We raised another chick this year from our breeding pair and she is doing well but sadly we lost our main breeding male. This was a heartbreaking loss as

this bird was also very friendly, easy to work with and compatible with his mate. We have a challenging older bird with some disabilities that we have trained to come to us for food and medication this year. She is now used as a mentor bird for young koris first going out onto exhibit. The Park has hatched 9 kori chicks since 2002 and I have hopes of receiving another male or female soon so we can continue our breeding success.

I always read about how passionate people feel about koris and how charismatic these birds are but didn't have a real understanding of that until I starting working with them myself. I love working with this species and hope we can be more involved in the future. I guess I've gone kori crazy like the rest of you!



Photo provided by Jenny Tibbot

Toledo Zoo hatches a Kori!

Toledo, OH – A Kori Bustard chick is the latest addition to the Toledo Zoo and a new first for the Zoo’s Avian Breeding Center (ABC), an off-exhibit facility dedicated to breeding rare and endangered birds. The male chick weighed 3.5 ounces when animal care staff assisted his hatching on June 27. Zoo animal care staff are hand-rearing him, which is the practice recommended for this species. Public exhibit plans have not been finalized at this time.



Photo by Sara Vorpahl/Staci Bekker

The Toledo Zoo is just the tenth zoo in the U.S. to successfully breed Kori Bustards, joining the National Zoo in Washington, D.C., Dallas Zoo (Texas), the Audubon Zoo in New Orleans, La., and a handful of others.

The chick’s parents – father, Kiva and mother, Kanoni -- are on exhibit at the Zoo near the Great Apes. Kiva (KEE-vah), 12 years old, came to the Zoo from the Smithsonian National Zoological Park in 2004; Kanoni (Kah-NO-nee), also 12, came to the Zoo from the Dallas Zoo in 2005. Their breeding was recommended by the AZA as part of a Species Survival Plan (SSP), a cooperative breeding management program.

“These are very challenging birds to manage, so it is extremely rewarding to have proof (in the form of this chick) that we’ve been doing it well!” said Robert Webster, the Toledo Zoo’s curator of birds. “Also, I think that what we’ve learned, **as the northernmost U.S. zoo to breed Kori bustards** will open new opportunities for this species in other zoos.”

Unusual kori bustard phenotype

A kori bustard hatched at San Diego Zoo’s Safari Park in 2011 has a most unusual crest. As can be seen in the picture below, the crest is extremely long. Her parents have crests of normal length. DNA sexed female [sex also verified by weight] this bird also has a dark throat, typically seen in males.



Photo provided by San Diego Zoo Safari Park

Kori Bustard Behavior

Female kori bustards Ignoring Displaying Male kori bustards

Does your female kori ignore your male kori when he is displaying! Does she run away barking in terror as he approaches her in full display? Well don't worry, it's perfectly normal! We don't know why, but female koris ignoring displaying male koris seems to be perfectly normal. Some think that the chasing of the female actually stimulates the female into being receptive to copulation. Regardless, it is the female that chooses the time and location of copulation. While copulation can occur at any time of the day, it is more common in the early morning and late afternoon/early evening. Although appearing to ignore the male, a receptive female is actually very attentive if she is interested in copulation and will often feed near the displaying male. As the male peaks in his display, the female will approach closer and closer, eventually sitting down very near to the displaying male. In full display, the male approaches the female and initiates 10-15 mins of head pecking before finally copulating. After copulation, the pair quickly separates and resumes normal activity. Time between copulation and egg laying is ~7 days. *Sara Hallager*



Photo by Clyde Nishimura



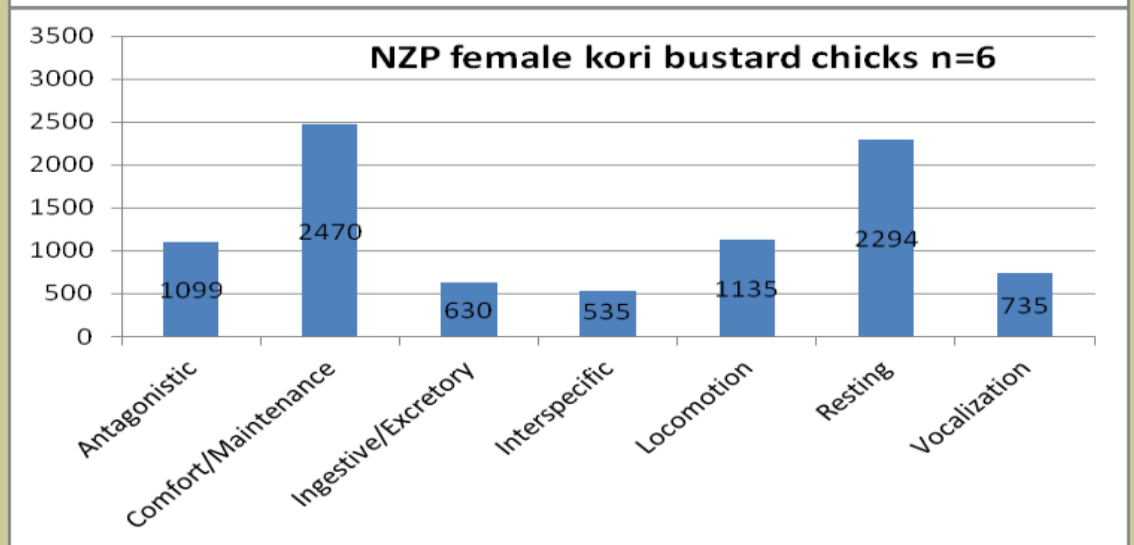
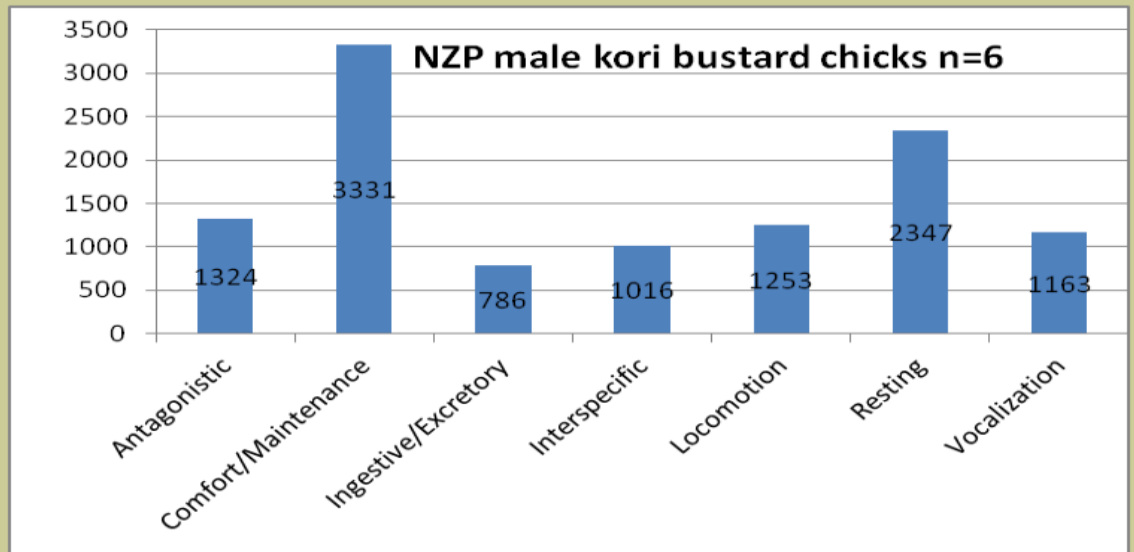
*Kori bustard holiday
light display at the
National Zoo. Photo
by Lisa Barker*

Kori Bustard Behavior

National Zoo kori bustard Chick Watch

Kori bustard behavior watchers at the National Zoo have been recording data on kori chicks for 3 years. The goal of the watch is to determine if behavior during the first two months of life can be used to determine the sex of the chick. The second goal of the watch is to develop a chick ethogram. Observations begin when the chicks are 1 week old and continue until they are 2 months old at which point they are moved to an area inaccessible to the volunteers. Since 2008, data has been collected on 6 males and 6 females in group sizes ranging from two individuals to four individuals. Similar to the adult watch, observers record data at different times during the day for one hour. The chick ethogram consists of 43 different behaviors and is nearly identical to the adult ethogram [Lichtenberg, E.M. and Hallager, S. 2007. A description of commonly observed behaviors for the kori bustard (*Ardeotis kori*). Journal of Ethology 26(10: 17-34.) but does not include reproductive displays. Since chicks are very vocal for the first year of life, the chick ethogram includes several vocal behaviors [barking, cooing and crying].

Early data suggests that male chicks perform more comfort behaviors, vocalize more and perform more interspecific behaviors [skyward looking, predator defense and neck fluff] than females. -Sara Hallager, National Zoological Park



It's 6am, Do You Know Where YOUR Sub-Adult Kori is?

Jenna Curtis, 2011 National Zoo Kori Bustard Intern

My earliest Kori Watch began at 6:00am, just in time for the summer sunrise. During the training period I had been told “You can get there earlier if you want; they’ll be awake.” Sure enough, my day was just starting, but our three sub-adult Koris at the National Zoo were already awake and active. There were “the girls”, three year old sisters Chasi and Tatu, side by side as they made their morning rounds. Standing off on his own was Maliki, who arrived from Dallas Zoo six months earlier. Throughout the day, volunteer observers and I would have our hands full keeping track of the various activities – and mischief – these three koris got up to.

When I began working with Sara Hallager to launch a study on the sub-adult kori bustards, we weren’t sure what we would find. Nobody had performed a behavior watch on young birds before. We had a few goals: determine if Maliki showed early display behaviors, clarify what sort of social relationship existed between the birds, and establish a baseline activity budget to compare against future years. However, neither of us expected to discover so many unique, fascinating, and often puzzling behaviors that had never been observed in adult birds. It was these new and unusual activities performed by “the kids” that made them truly rewarding to watch.

We started with the same ethogram used in adult Kori Watches, but almost immediately added new behaviors. The first was “Allopreening.” Just before the watch commenced, one volunteer snapped photos of the two girls

preening each other, so we added the behavior. Though this rarely occurred for extended periods, and was never seen involving Maliki, there were a several instances when one sister appeared content to let the other pluck at tail feathers, brush through neck feathers, or even give several hearty pulls to feathers on the back.

The second activity added was “People Watching.” This behavior was particularly common in the females. They would stand near the fence and give zoo patrons an unnerving, “spooky” stare. The adult birds rarely, if ever, paid attention to visitors in front of their enclosure, but the sub-adults gazed at stroller wheels, camera lenses, or anything else that caught their fancy. It appears this behavior is not reserved to our three sub-adults, because two year old Tufani has been spotted “People Watching” from the adult enclosure.

The third, most puzzling behavior exhibited by the sub-adults was “Item Manipulation”. This behavior started as “Item Carrying”. Observers saw the girls pick up and ferry sticks, feathers, leaves, and grass around the yard before depositing them in a new location. We could never establish what caused the birds to gain or lose interest in a particular object, or why it needed to be moved from one place to another. A month later another volunteer and I watched Tatu sit down and begin placing twigs on her back. This activity, previously only documented in nesting females, was listed as “Nest Building” on the adult ethogram. However, Tatu was not sexually mature. After fifteen minutes of cas-

Kori Bustard Research

ual “Nest Building” Tatu stood up, gave a vigorous feather shake, and walked away. The next week Chasi was observed doing the exact same thing. Again, the behavior was noted as inexplicable “Nest Building”. But the strangest incident was yet to come. One day, near the end of a watch, I observed Maliki sit down under a shady tree. After some casual preening he picked up a nearby twig and, much to my surprise, laid it across his back! Now if it was unlikely for the young girls to be building a nest, it was even more so for the male. Sara and I were stumped. We could no longer keep recording the behavior as “Nest Building” if that wasn’t the real behavior. So we changed “Item Carrying” to “Item Manipulation” to encompass any more unusual actions the birds might do with objects in the yard. There’s still the question of why they began manipulating sticks and whether or not Maliki picked up the behavior from the girls.

Watchers were kept on their toes by a number of other “silly” behaviors. For instance, the day Maliki stood too close to a resting Chasi and received several hearty pecks. There had never before been a recorded instance of a female aggressively displacing a male Kori. At other times behaviors would blend into each other (e.g. “stretch-flap-run-jump-

feather shaking”) making it difficult for observers to record. I look forward to watching these activities gradually settle into the well-defined routine exhibited by adult birds.

We did observe Maliki performing a few rudimentary display behaviors. Some mornings we would catch him standing at full height, listening to the adult male kori booming about 200 feet away. This was followed by partial booming and some head tossing. Later in the summer he began strutting the yard with tail erect, and once directly pursued the females. It will be interesting to see if Maliki begins formally displaying in the next breeding season, and how the girls will react. The sisters remain nearly indistinguishable in both appearance and behavior, and I look forward to seeing if this continues into adulthood. Thanks to the hard work of our volunteers we now have a great start at documenting the behaviors of sub-adult individuals.

Watching the koris has been at once entertaining, puzzling, and thoroughly enjoyable. I have no doubt that a continued watch of these sub-adults will yield even more amusing observations for us to smile and shake our heads at.

Kori websites of interest [check these out—they are very cool!]



<http://siwild.si.edu/index.cfm>

<http://www.arkive.org/kori-bustard/ardeotis-kori/video-06.html>

<http://ibc.lynxeds.com/species/kori-bustard-ardeotis-kori?>

Causes of morbidity and mortality in captive kori bustards (*Ardeotis kori*) in the United States between 1988 and 2008

Rhea Hanselmann, DVM

ABSTRACT

Objectives – To describe demographics, husbandry practices, and causes of morbidity and mortality of captive kori bustard (*Ardeotis kori*) in United States zoos between 1988 and 2008.

Design – Retrospective survey (observational).

Animals – 198 captive kori bustards (*Ardeotis kori*).

Procedure – Information on captive kori bustards was collected from eligible zoos throughout the United States using a survey. Demographic (age, age at death, sex, and hatch location) and husbandry (exhibit, diet) variables, and causes of morbidity and mortality, were analyzed descriptively. For deceased individuals, general linear model selection identified potential predictor variables for age at death (in years). Analysis of variance was used to compare differences in median age at death for birds based on their sex, hatch location, flight restriction method, and exhibit type.

Results – Information was obtained for 94.3% of the target population, although detail and data quality were highly variable among birds. The most common clinical and pathologic findings observed were lameness (48 cases), GI parasitism (45 cases), and wing integumentary trauma (32 cases). Trauma was a common cause of morbidity (65 cases) and the single most common cause of mortality (48 individuals, 36.4% of deceased animals). Wild-caught birds were significantly older at death than those that hatched in captivity ($P < 0.0001$). Kori bustards that were flight-restricted by means other than pinioning were significantly older at death than pinioned birds ($P=0.0009$).

Conclusions and Clinical Relevance – Considering the high prevalence of traumatic injury and death noted in captive kori bustards, it is essential that captive management of this species focus on developing strategies that minimize opportunity for injury. To this end, we suggest investigation of alternative flight restriction methods to pinioning and exploration of methods to decrease stress associated with handling and transport. To address the high incidence of developmental deformities reported in these birds, investigation into controlled dietary trials is recommended. To counteract the high prevalence of gastrointestinal parasitism, anthelmintic therapy specifically tailored to each bird's environment is critical. Finally, if we are to continue successfully breeding this species in captivity, it is essential that the high mortality rate in young kori bustards is investigated more thoroughly and mitigation thereof made a management priority.

Kori Bustard Husbandry

Kori Bustard Husbandry Video Underway

Kori bustards present some unique challenges when it comes to husbandry. Keepers that work with koris should be aware of what is required to be successful in managing this species. One of the goals of the Kori Bustard SSP is to organize a kori bustard husbandry video. This video would provide an accessible resource for institutions that house kori bustards.

The Kori Bustard SSP recently distributed digital camcorders to all institutions that exhibit this species. These institutions have volunteered to record video on several topics related to the husbandry of kori bustards. Example topics are listed below:

Nutrition

Preparing meatballs
Diet presentation
Hopper feeding
Food items as enrichment
Grain feeder prototypes
Ideas to encourage koris to consumer more grain

Transport

Crate designs including dimensions and padding
Loading/Removing a kori from a crate
Crate training

Behavioral Husbandry

Training (scale, shifting, voluntary feather trims)
Enrichment

Enclosure

Footage of:
enclosures/exhibits holding
fencing materials
use of heat pads

Capture techniques

Catching
Various restraint methods
Things to watch for

Medical Care

Wing trimming
Broken blood feathers
Collecting fecal samples
Procedures
Setting up stalls for sick koris

Reproduction

Breeding
Nesting
Incubation
Hatching
Kori introductions
Behaviors to note
Taping of angel wing
Hand-rearing

Managing imprinted males

Training
Crating
Shifting
Stationing

This list covers the major topics but is not comprehensive. Institutions that received a camera are encouraged to record

anything they feel is relevant to kori bustard husbandry.

Please contact Sara Hallager (hallagers@si.edu) for further instructions on husbandry topics and how to send video.

-Katie Bagley
Lead Keeper, Bird dept.
Zoo Atlanta



Kori Bustard Husbandry

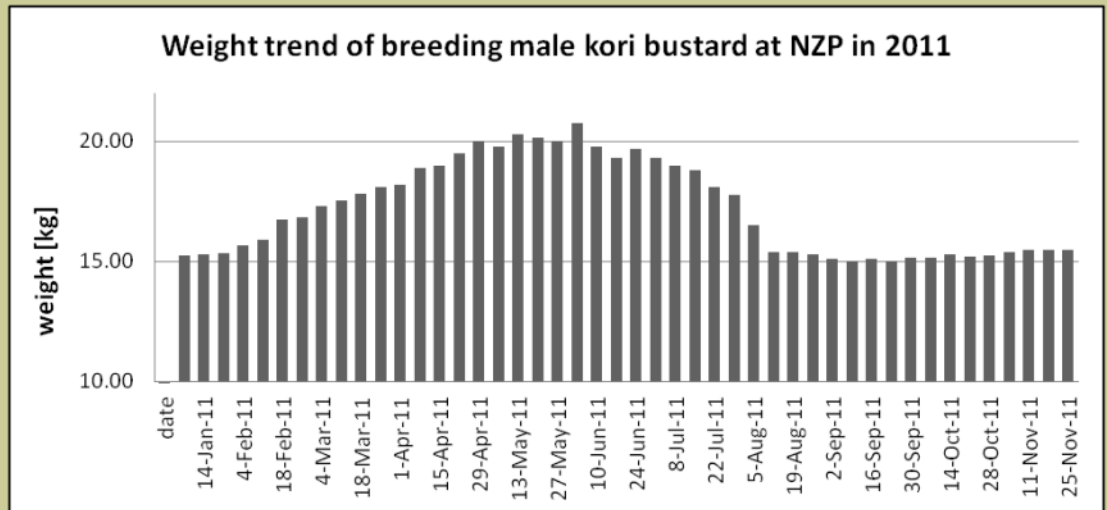
Correlation Between Male Kori

Bustard Weights and Breeding Season

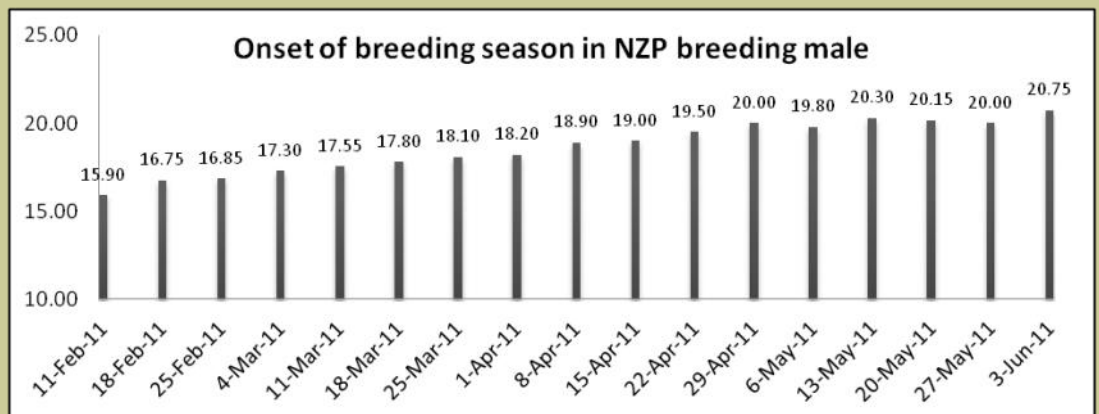
Sara Hallager, Biologist, National Zoological Park

Since 2000, the breeding male at the National Zoo has been weighed on a monthly basis. Koris are fairly easy to encourage onto a scale with sprinkling of mealworms. A 4 foot x 4 foot scale was used. Regular monitoring of weights is useful to detect early signs of illness in either sex but also to monitor breeding activity of a male.

Starting in Jan 2011, the NZP male was weighed weekly to monitor the onset and cessation of breeding season.

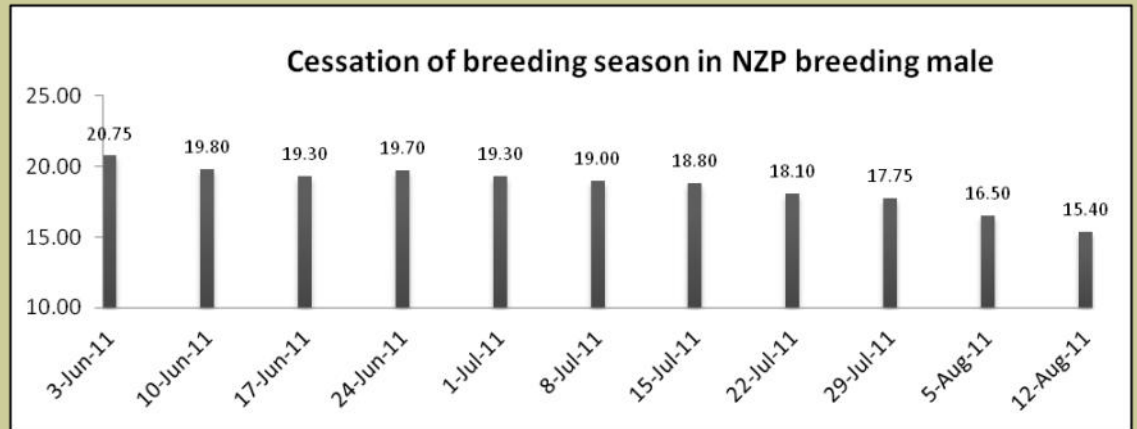


Reproductively active male kori bustards increase in weight prior to the onset of display. The male at NZP was first observed displaying in early March 2011 following a 2kg weight gain. Booming during the month of March was visible but not audible. This is consistent with previous observations from previous years. By mid April, the male had gained 3kg and audible booming could now be heard.



Kori Bustard Husbandry

Weight was slowly accumulated over the course of four months until it reached its peak in early June. Copulation and egg laying were observed in May and June when the male was at his peak weight of 21kg and display was at its most intense. A total of 4.85kg [30%] was gained by the male during these four months. In mid June, he began to lose weight. Weight loss was more rapid than weight gain and occurred over a two month period. An initial weight loss of 1kg occurred over 7 days. By the middle of August 2011, the male was back to his pre-breeding weight of 15.5kg and displaying had ceased.



Why is my kori pink?



Have you ever noticed pink tinges at the base of kori feathers? Especially prominent from koris who have quickly lost feathers under stress, the pink tinge is a pigment called porphyrin. Porphyrins are easily destroyed by exposure to sunlight, and are most abundant in new or quickly shed feathers. Although the exact chemical structure of each porphyrin differs, they all fluoresce a bright red when exposed to ultraviolet light. Porphyrins produce a range of colors, including pink, browns, reds, and greens. Thirteen orders of birds, including bustards, use porphyrins as a plumage pigment. Porphyrins were first isolated from bird feathers in the early 20th century, but their role in feather structure and function, and their synthesis with regards to plumage formation, remain unknown (McGraw 2006).

West Nile Virus in a Kori Bustard

Liza Dadone, VMD

Cheyenne Mountain Zoo, Colorado

When a 6-year-old male kori bustard first stumbled and fell over in his yard, we weren't overly concerned. Zubi's wings had been amputated several years ago after complications from fracture repairs. From time to time, Zubi seemed to forget that he could no longer fly and would leap high into the air, only to stumble upon landing.

But when Zubi fell over a few days in a row in August 2011, we started to wonder if something else was wrong. Multiple bloodwork checks and x-rays remained normal. He was started on antibiotics in case there was an underlying infection, and given Vitamin E periodically to help prevent capture myopathy from the stress of falling over repeatedly. Despite these treatments, Zubi got weaker and would only eat when food was placed in his mouth. After finding him on his back one morning, we worried Zubi would die of capture myopathy from struggling to stand before we could figure out what had made him sick.

Keepers designed a custom-fit padded body sling for Zubi and placed him in the sling. Zubi was now so weak he would only occasionally struggle to get out of the sling and could barely lift his own head. Hay bales with towel pillows were placed under his chin to keep his head elevated. Multiple times daily keepers would check for pressure sores and do range of motion exercises on his legs to help maintain circulation.



Photo submitted by Liz Dadone

Six days after he first stumbled, Zubi developed a loud heart murmur. By the next morning, we realized Zubi couldn't blink and was going blind; he could now only see shadows and had severe inflammation in both retinas. Repeat bloodwork showed dehydration and early kidney failure. He was started on subcutaneous and later intravenous fluids to try to manage the dehydration and kidney disease.

Based on the combination of clinical signs, we now suspected that Zubi had a West Nile virus infection. We submitted for analysis serum from both Zubi and our healthy female kori bustard. While both bustards had been vaccinated every spring for West Nile virus, only Zubi's antibody titer was consistent with infection. In fact, his antibody level was 40 times higher than that of the healthy bustard! Over the course of his illness we tested several additional serum samples to track that antibody levels were slowly dropping following the initial exposure. Over the next few days Zubi worsened to the point that we strongly considered euthanizing him, but he rallied slightly the day we were planning to do it, and so the consensus was to give him more time. In discussions with the kori SSP vet advisor, Dr. Suzan Murray, we learned that Zubi's case was unusual as there was only one other known kori bustard that may have been clinical for West Nile virus, and fortunately that bird had lived. This gave us hope that with aggressive supportive care, Zubi might still recover.

After about 10 days of IV fluids and living in the sling, Zubi was lifting his head and seemed stronger. He could now blink again and seemed more responsive to people moving around him. Kidney values had improved so we could finally stop the IV fluid treatments. Keepers were hand-feeding him four times daily with bison meat, and Zubi's weight started to stabilize.

Zubi was still too weak to stand on his own. To help him relearn balance and regain leg strength, keepers took Zubi out of his sling and supported him standing for three to five minutes, three times daily. We saw gradual improvement

West Nile Virus in a Kori Bustard

Continued from page 15

in strength, and eventually Zubi started to fight being in the sling as a normal kori bustard should. Soon we were leaving him standing in a small padded stall twice each day for an hour, but back in the sling at nights. We suspected that if he had wings he would have been strong enough to balance through the day, but without that additional stability, Zubi sometimes stumbled.

One warm, sunny morning, we took Zubi into an outside yard for some fresh air. By now Zubi's vision appeared to be back to normal and the retinal inflammation had resolved. Going outside was the motivation Zubi needed, and he was up and walking for over an hour with minimal assistance. He stumbled a few times but seemed very happy to be outside in the fresh air after six weeks of illness. From then on, Zubi would have an hour of supervised outside yard access each day, and started to regain strength, balance, and appetite. After a labor-intensive total of nine weeks in the sling, Zubi was finally strong enough to leave the sling for good and return to his normal routine.

I don't know why Zubi had such a severe West Nile virus infection, but I do know that this case taught me a lot about resilience. Despite all his trials and challenges, I never saw Zubi give up. He was a bird with no wings, legs too weak to stand on, and blind, and yet he always had fight left in him. I'm so grateful our team had the perseverance and dedication to get him through this ordeal. Every time I walk past his exhibit and see Zubi standing outside with his head held high, I smile and think we are lucky to know such an amazing bird.

Acknowledgements: A special thanks to the vet staff and African Rift Valley keepers for many hours of intensive patient care, to the vet tech student volunteers from the Colorado Academy of Veterinary Technicians who assisted with Zubi's care, and to Dr. Matt Johnson from the Colorado State University Veterinary School for consulting on this case.



Photo submitted by Liz Dadone





Photo by Katie Bagley

Kori Bustard Trivia

They say an elephant never forgets but a kori may not forget either. In 2010, Former Curator of Birds at NZP, Paul Tomassoni carried out an informal study at the request of Sara Hallager. Paul and the breeding male kori at NZP "Noname" had a unique relationship. Noname disliked Paul because it was Paul who always held Noname for feather trimming or medical exams. During his tenure at the Zoo, any time Paul walked by the kori bustard exhibit, regardless of what he was wearing, Noname would bark and run. **Six months** after Paul left the Zoo, Noname still remembered Paul, reacting as he did when Paul worked at the Zoo. **Twelve months** after retiring, Noname retained his memory of Paul as evidenced by a response of fleeing into the exhibit at the sight of Paul. **Two years** after his departure from the Zoo, Paul walked by the kori enclosure in Dec 2011. Noname spotted him and promptly moved deeper into the yard.

Looks like a kori can remember for at least two years! We'll check in Dec 2012 and see if we get the same reaction.

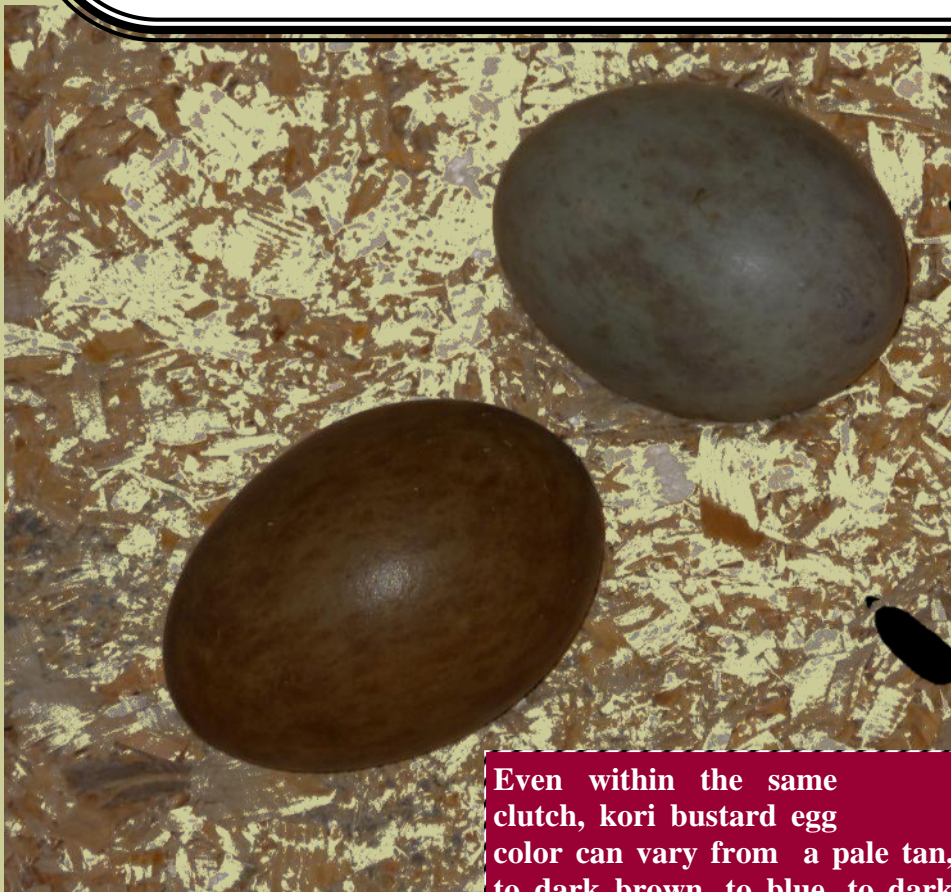


Photo submitted by Sara Vorpahl

Even within the same clutch, kori bustard egg color can vary from a pale tan, to dark brown, to blue, to dark green and all the shades in between.



Kori Bustards of the Year

Kori Bustards of the Year 2011



Photo by Erin Black

“Barbie”

Since coming to the Kansas City Zoo, Barbie has become very sociable. She was introduced to our male Kori Bustard in one building and shortly after introduced to 1.1 Secretary Birds in a mixed species exhibit. Not only has she gotten along with contraspecifics, but she has become less flighty around keepers. A training program was implemented with her and she now can be hand fed as a result. Barbie continues to progress with target training. She is always eager to train. So eager even when she spots her trainer from her exhibit she follows them hoping its time to train.

Barbie doesn't seem phased by change. For the winter she was moved to a different exhibit with only our male Kori Bustard. After moving around three times since arriving at the zoo, her attitude seems to only improve. Her eagerness to train is very rewarding being as she used to be very cautious of keepers. Barbie is a delight to work with and deserves to be Kori Bustard of the year

*-Lindsay Jaquier, Keeper II
Kansas City Zoo*

Kori Bustards of the Year

Kori Bustards of the Year 2011

“Caldwell”



Photo courtesy of Dallas Zoo

Caldwell, a female believed to be wild caught, came to the Dallas Zoo in 1994 on breeding loan from the Caldwell Zoo in Tyler, Texas. She began laying eggs soon after and became our main breeding hen. To date, she has produced 22 chicks (10 surviving) with 3 different males. She is a great mom, rearing the majority of her chicks, and has given us a lot of the information the SSP has about how koris interact with their chicks during rearing. One of her chicks was recently transferred back to the Dallas Zoo after a time at White Oak Plantation and began laying eggs this year.

In addition, she has an incredible personality. Most wild-caught kori bustards we have worked with have been nervous and try to get as far from keepers as possible. Caldwell likes to be in the middle of things and loves insects of any type or form. When keeper staff is mowing her pen she often comes and walks behind the keeper picking up the insects that are hit by the mower, as well as digging through the leaf piles that were raked up for removal. In addition, her love of insects causes a lot of interference with weekly weights of our males. If not kept adequately supplied herself, she will come and stand on the scale and steal the insects used to entice the male.

Jocelyn Womack, Bird Supervisor, Dallas Zoo

For the Love of all things Kori!

Everyone Loves a Kori!

At the National Zoo, volunteers have been collecting kori bustard behavioral data for 11 years. Some volunteers have been with the program for many years. Like the keepers who care for the birds, the volunteers find they develop deep bonds with the birds they watch.

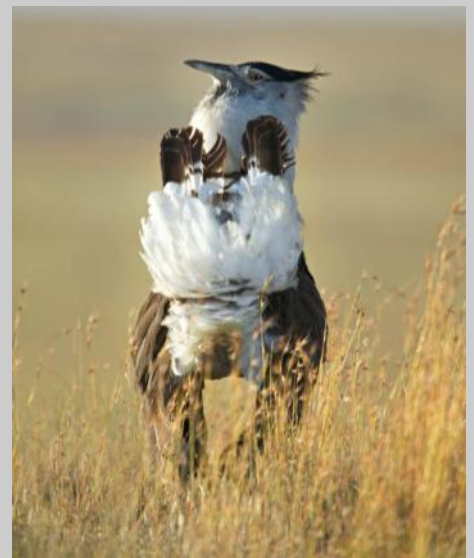
Lisa Barker, a volunteer with the kori watch since 2008 shares her thoughts following the loss of two older adult females.

“Thank you for the Neema update. I know this has been really hard on you as well. I wanted to share my special Neema story before I forget. It was late last summer, and I’d just done the first 45 minutes of my 4-5PM watch in the light rain. It finally looked to be clearing up, and, during that transition period, the sun was shining at the same time as the remainder of the rain was falling. I was so happy the weather was improving I impulsively blurted out something to the effect of “what do you think birdies, ‘ya think we’ll see a rainbow” at which point Neema pointed her bill skyward, nearly straight up, as if in response! Now, I’d love to say there was, indeed, a rainbow for her and I to look at, but with so many leafed-out trees blocking the line of sight, well...it was impossible to say. I swear she understood me, and I felt one of those ‘moment out of time’ connections to her. Neema and Miadi have become very special to me over the past three years. As I’ve said regarding Miadi, I can barely look in those portions of the yard where she used to hang out. What a distinct honor it has always been (and will continue to be!) to have kori bustards be my teachers and friends.”

-Lisa Barker



“Neema” Photo by Sara Hallager



That’s “the end” for Volume 9 of The Gompou. We are already accepting submissions for next year’s edition. Email

kbagley@zoatlanta.org

or hallagers@si.edu

for submissions or more information.