



The Horned Lark

Kansas Ornithological Society

December, 2018

Vol. 45, No. 4

From the President's Pen

By Cheryl Miller

As the year draws to a close, I find myself reflecting on events of the last twelve months. Many of these memories include birders.

The KOS community lost a much loved member this fall. Dan Kilby, a retired architect and artist, died Nov. 15. A lifetime member of KOS, he spent much of his free time drawing birds. Several KOS members have one of his original works. Dan freely shared his illustrations for use in the Kansas Breeding Bird Atlas. He also was proud of his Purple Martin art being featured on the June 2002 cover of *Birding* magazine.

Dan's numerous artistic contributions were complemented by his enthusiasm for birds and friendly disposition. Many of us experienced Dan's exuberance on birding trips. He nearly knocked me overboard in his excitement to see his lifer Black-capped Petrel off the coast of North Carolina. Perhaps, though, his greatest kindness was taking two young boys into the birding community before they were old enough to drive: Kenn Kaufman and Jeff Cox.

Dan's contributions are important and long lasting. His love of life, and of birding, remind me of this quotation attributed to Sir Francis Bacon: "We are not living in eterni-

ty. We have only this moment, sparkling like a star in our hand, and melting like a snowflake."

How will you spend your moments in the birding community? I look forward to seeing you at a hotspot soon.

- Cheryl

Below - Dan Kilby (86) and Jeff Calhoun (25) on a 2013 Wichita Audubon pelagic trip off the coast of North Carolina. Not only did Dan celebrate life, he always looked to the horizon to see what was ahead.



From the Keyboard

By the Editor

Another year is drawing to a close leaving many of us scratching our heads and wondering where the time went! Every year seems to slip by faster and faster. The seasons are a carousel that keeps speeding up. It seems that we just finished spring migration and here we are getting ready for another round of Christmas Bird Counts.

First of all thank you to everyone who helped with the 70th Annual Meeting of KOS in Lawrence in October. There were 96 registered attendees. Then Vice President Cheryl Miller organized a far flung crew to make this meeting happen and we thank Cheryl and all her helpers including the folks at the Biodiversity Institute who hosted the Friday evening reception. Please note on page 16 (back page) of this newsletter dates and locations for the 2019 KOS meetings. Exact "headquarters" for the spring meeting is still being determined but get the dates on your calendar now and look for the details in the March *Horned Lark!* We will likely have field trips going where no KOS Field Trip has gone before!

We didn't have room in this issue for the minutes from the Annual Meeting. They will be in the March issue but if anyone wants to see these before then, just let me know and I can send them to you. Speaking of the March issue - make sure you get your dues sent in soon. IF you neglect to do that, the March issue of the *Horned Lark* and *Bulletin* will be the last that you receive and we wouldn't want that to happen. Membership form is on the last page, or go to the website http://ksbirds.org/kos/kos_member.html and you can renew online!

As I said at the start of this column, time gets away from us far too quickly. Cheryl wrote some very fine words about a very kind man, Dan Kilby in her column on page 1. On page 4 you'll read some very kind words about another KOSer, Pete Janzen (2018 Boyd Award recipient). Birders like this are all around us and one of the best ways to meet them, get to know them and learn from them is to go on a Christmas Bird Count (CBC).

If you've never participated in a CBC, make this season the time to start. You get the opportunity to bird with all sorts of different birders. You have the opportunity to learn some new birding locations. You may even see some new birds. But the friendships made while helping with a CBC can last the rest of your life. I have many good birding friends that I first met while on different CBCs over the years.

While I compile two CBCs myself, and encourage birders to participate, it's always fun to take part in one or two different CBCs where I can just bird and have some fun. CBCs can be like the birders who are on them. Some are very relaxed, some are go-go-go. But all are fun! There's a link to a listing on the KSBirds website, <http://ksbirds.org/>. In closing, have a wonderful holiday season, whichever holiday(s) you choose to celebrate!

- Chuck



Statement of non-profit status and copyright: The Kansas Ornithological Society is a 501(c)3 organization created for the study, conservation and enjoyment of wild birds. The Horned Lark is the membership newsletter of the society and all material contained herein is copyrighted.

KOS Board of Directors

http://ksbirds.org/kos/kos_officers.html

President

Cheryl Miller, Wichita, KS
avian67226@gmail.com

Vice-President

Jenn Rader, Galena, KS
jennrader34@gmail.com

Corresponding Secretary

Chuck Otte, Junction City, KS
otte2@cox.net

Membership Development Coordinator

Nic Allen, Parkville, MO
kcbirder@gmail.com

Treasurer

Max Thompson, Winfield, KS
maxt@cox.net

Business Manager

Malcolm Gold, Overland Park KS
malcolmgold@gmail.com

Editor, KOS Bulletin

Gene Young, Arkansas City, KS
eugene.young@noc.edu
youngg6264@yahoo.com

Editor, The Horned Lark

Chuck Otte, Junction City, KS
otte2@cox.net

Past-President

Nic Allen, Parkville, MO
kcbirder@gmail.com

Directors at Large:

Henry Armknecht, Hays, KS
armknecht@ruraltel.net

Rodney Wright, Gardner, KS
eaglerodney@yahoo.com

Dave Rintoul, Manhattan, KS
drintoul@ksu.edu

Nick Varvel, Hays, KS
nvarvel@gmail.com

KOS 2018 Fall Meeting Compiled Field Trip List

Field trips to Douglas County

with sightings also from Johnson, Franklin, Osage, Shawnee, Jefferson and Leavenworth counties
134 species

Greater White-fronted Goose	Osprey	American Robin
Canada Goose	Northern Harrier	Gray Catbird
Wood Duck	Sharp-shinned Hawk	Brown Thrasher
Blue-winged Teal	Cooper's Hawk	Northern Mockingbird
Northern Shoveler	Bald Eagle	European Starling
Gadwall	Red-shouldered Hawk	House Sparrow
American Wigeon	Broad-winged Hawk	House Finch
Mallard	Red-tailed Hawk	American Goldfinch
Northern Pintail	Great Horned Owl	Chipping Sparrow
Green-winged Teal	Barred Owl	Clay-colored Sparrow
Ruddy Duck	Belted Kingfisher	Field Sparrow
Wild Turkey	Red-headed Woodpecker	Vesper Sparrow
Pied-billed Grebe	Red-bellied Woodpecker	Savannah Sparrow
Rock Pigeon	Yellow-bellied Sapsucker	LeConte's Sparrow
Eurasian Collared-Dove	Downy Woodpecker	Nelson's Sparrow
Mourning Dove	Hairy Woodpecker	Song Sparrow
Common Nighthawk	Northern Flicker	Lincoln's Sparrow
Chimney Swift	Pileated Woodpecker	Swamp Sparrow
Ruby-throated Hummingbird	American Kestrel	White-throated Sparrow
Virginia Rail	Merlin	Harris's Sparrow
Sora	Peregrine Falcon	White-crowned Sparrow
American Coot	Scissor-tailed Flycatcher	Bobolink
Killdeer	Eastern Wood-Pewee	Eastern Meadowlark
Baird's Sandpiper	Willow Flycatcher	Red-winged Blackbird
Pectoral Sandpiper	Least Flycatcher	Brown-headed Cowbird
Long-billed Dowitcher	Eastern Phoebe	Common Grackle
Wilson's Snipe	Blue-headed Vireo	Great-tailed Grackle
Spotted Sandpiper	Red-eyed Vireo	Black-and-white Warbler
Solitary Sandpiper	Blue Jay	Tennessee Warbler
Lesser Yellowlegs	American Crow	Orange-crowned Warbler
Greater Yellowlegs	Horned Lark	Nashville Warbler
Bonaparte's Gull	Tree Swallow	Common Yellowthroat
Franklin's Gull	Northern Rough-winged Swallow	Yellow Warbler
Ring-billed Gull	Barn Swallow	Palm Warbler
Forster's Tern	Black-capped Chickadee	Yellow-rumped Warbler
Common Loon	Tufted Titmouse	Black-throated Green Warbler
Double-crested Cormorant	Red-breasted Nuthatch	Wilson's Warbler
American White Pelican	White-breasted Nuthatch	Summer Tanager
American Bittern	Brown Creeper	Northern Cardinal
Least Bittern	House Wren	Rose-breasted Grosbeak
Great Blue Heron	Sedge Wren	Indigo Bunting
Great Egret	Marsh Wren	Dickcissel
Little Blue Heron	Carolina Wren	
Black-crowned Night-Heron	Golden-crowned Kinglet	
White-faced Ibis	Ruby-crowned Kinglet	
Turkey Vulture	Eastern Bluebird	

Most of the field trips were in Douglas County so a county by county listing was not compiled for this meeting.

Have you considered including KOS in your estate? Contact Treasurer
Max Thompson for details on how to make this happen.

2017 Ivan L. Boyd Recognition Award

Pete Janzen

*Nominated by Kevin Groeneweg and Tom Shane
Presented by Kevin Groeneweg*

Pete Janzen is a life-long birder having an extensive history with the Kansas Ornithological Society. He joined in 1970 and is currently a life member.

Over the last 25 years Pete has been a driving force within KOS, and he remains a go-to guy willing to help the society wherever he can. Although he hasn't served as President, he has held the position of Business Manager (2003-2008) and Board member (1996-1998) and served as the Conservation Chair (1998). He served on the KBRC from 1995-2000. Of particular significance is his effort in leading and organizing various meetings of the society. He put his vast knowledge of the birding hotspots in Kansas to use in organizing spring meetings all over the state, including Norton (2013), the Ringneck Ranch in Mitchell County (2010), Yates Center (2006), the joint meeting with the Oklahoma Ornithological Society in Morton County/Black Mesa (2000) and Medicine Lodge (1998).

In addition to those meetings, he has helped with leading field trips on numerous others. His great skill in organizing and leading field trips has produced many fond birding memories and strengthened the camaraderie of birders statewide. He has contributed to the fall meetings as well, organizing the meetings in Wichita in 1997, 2001 and 2005. Never one to rest on his laurels, he volunteered to hold the 2019 fall meeting in Wichita and is currently putting together the team to ensure a successful outcome.

He was co-author of a paper on the distribution of the Yellow-throated Warbler presented at the 2006 fall meeting by John Shuckman. Pete is also a skilled author, which has benefitted KOS in many ways. He authored numerous articles in the Horned Lark over the years, including a regular column "Pete's Perspective" for several years, articles on the passing of various members of the society and compiling the Seasonal Roundup from 1998-2000. He authored two articles in the Bulletin pertaining to the status of the Rufous-crowned Sparrow in Kansas and new breeding records in the Red Hills.

Having assembled extensive records on local bird sightings, he authored the 2007 book "The

Birds of Sedgwick County and Cheney Reservoir", with the proceeds going to the KOS book royalty fund. He also co-authored with Bob Gress the 2008 book "A Guide to Kansas Birds and Birding Hotspots", passing along his extensive birding knowledge to countless birders in Kansas and beyond.

Another significant contribution is his participation in the Kansas Breeding Bird Atlas Project as the south-central regional coordinator. His efforts in coordinating data and performing field work in a large number of blocks are substantial. This effort was not limited to Kansas, having helped with the Oklahoma Breeding Bird Atlas Project and the Oklahoma Winter Bird Atlas Projects as well.

Pete's love of the Red Hills inspired him to start a Christmas Bird Count there in 1994, elevating it to a National Audubon count in 2002. He is still the compiler of that count. He also compiled the Wichita count from 1996-2007.

Pete has been very active with Wichita Audubon over the years, holding various positions on the board and leading several field trips each year without fail. Few people have Pete's depth of knowledge and understanding of the avifauna of Kansas. His knowledge of the birds and habitats of Kansas continues to grow through his epic county listing efforts. Many, including myself, consider Pete to be a birding mentor and look forward to gaining from his knowledge and skill in the field whenever possible. It is for these reasons that Tom Shane and I consider Pete Janzen deserving of the 2018 Dr. Ivan L. Boyd Award.



2017 KOS Avian Conservationist Award

Dr. Greg Farley

Nominated by Curtis Wolf

Presented by Mike Rader

Greg Farley's career has exemplified numerous characteristics of an avian conservationist in Kansas. Please accept his nomination for the KOS Avian Conservationist Award.

Academically and professionally, Greg received a B.S. in natural resources from New York's Cornell University in 1982, a M.S. in biology from Kansas State University in 1987, and a Ph.D. in biology from the University of New Mexico in 1995. Following his Ph.D., Greg held a post-doctoral research position with the USFWS and USGS. He also taught in the Department of Biology at the University of New Mexico before coming to Fort Hays State University in 1995 as an Assistant Professor in Biological Sciences. He was promoted to Associate Professor in 2001 and to full Professor in 2008. In 2014, he became Chair of the Biological Sciences, and then became Dean of the Werth College of Science, Technology, and Mathematics in 2015. During his time at FHSU, Greg received several major university awards, including the Pilot Award in 2007 for outstanding faculty member, Navigator Award in 2010 for outstanding faculty advisor, the 2010 President's Distinguished Scholar Award, and Outstanding Graduate Faculty Advisor Award in 2014. Greg also served as the Associate Curator of Ornithology at the Sternberg Museum of Natural History. Recently, after nearly 23 years serving at FHSU, Greg became the Dean of the College of Business and Natural Resources at Black Hills State University in South Dakota.

At FHSU, Greg excelled as a teacher. He taught numerous lecture, laboratory, and field courses including Ornithology, Behavioral Ecology, Evolution, Zoology, Gulf Coast Migration, Rocky Mountain Ecology, Bird Banding, as well as Introductory Biology courses. Greg's enthusiastic teaching ability and his gift to connect with students in the classroom and in the field shaped most FHSU biology majors and many non-majors during his tenure. His courses were demanding, but fair, and his "hands-on"/"real-world-application" teaching style gave him a reputation as a favorite teacher on campus, and led many budding biologists into their careers. He led annual ornithology fieldtrips to Cheyenne Bottoms, Quivira NWR, the Platte River, and spring prairie chicken lek tours, and numerous campus birding walks.

He also advised 18 graduate thesis projects, all pertaining to a wide array of bird study (e.g. behavior, life history, habitat use, population trends, physiology, population ecology, breeding ecology, nesting ecology, virology, microbiology, etc.) and taxa (e.g. migratory birds,

warblers, wrens, passerines, prairie chickens, snowy plovers, black rails, West Nile Virus, etc.). Greg also mentored seven undergraduate students on bird-related field projects and supervised over 130 student volunteers with the long-term bird banding project on the FHSU campus. Additionally, it is noteworthy that he served on 110 Master's committees in Biological Sciences, Geosciences, English, Psychology, and Fine Arts while at FHSU. Greg has received numerous grants for ornithological research from 1986 through today.

Greg has authored, or co-authored, numerous ornithology articles in various publications, such as *Wilson Journal of Ornithology*, *Journal of Wildlife Management*, *Prairie Naturalist*, *Southwest Naturalist*, *Condor*, and *Conservation Biology*. He also has been an active manuscript reviewer for a number of publications.

Greg has held various positions within the Wilson Ornithological Society, including Publications Committee Chair, Student Research Awards, and Elected Councilor. He has served as an Associate Editor for the *Transactions of the Kansas Academy of Science* since 2002. And, Greg was a Board Member for Kansas Ornithological Society from 1998-2000 and 2011-2013, served on the Bird Records Committee from 2003-2009, and was President/Vice President of KOS from 2000-2002. Greg has given numerous professional presentations, including several invited seminars on bird topics as well as others at numerous professional meetings and conferences.

Greg also has been a part of numerous community birding events, including coordinating the Hays Christmas Bird Count for many years, conducting breeding bird surveys, and guiding for the Wings 'N' Wetlands Birding Festival.

Being one of the many students that was mentored (and greatly influenced) by Greg at FHSU, I am very sad to see him leave FHSU and Kansas. Although many of his professional duties have become more administrative in the last few years, his core interest has remained with students, and specifically with field ornithology students. His dedication and passion to furthering the careers of young biologists has been exemplary and awarded with the legacy of a huge progeny of professional biologists (in numerous fields) in Kansas and beyond. Although this award is titled "Avian Conservationist of the Year", Greg's commitment to ornithology in Kansas has extended to nearly 25 years. For these reasons, and probably many more that I have not listed but are inherent just by knowing and working with Greg for nearly 20 years, I confidently submit Greg's nomination for this award.

Kansas Birding Roundup, Summer 2018, (June – July) Chuck Otte, compiler

This is the report of the summer birding season in Kansas, June and July. Both months were hotter than normal and while eastern parts of the state suffered through drought, parts of the west were reeling in more than abundant moisture. Many towns in western Kansas suffered through thunderstorms that were causing street flooding and closing roads with flood waters. Such events, while creating their own problems and damage, left birders thinking of full playas with lots of shorebirds and waterfowl!

An ongoing situation is one of over-summering shorebirds. Late migrating species can easily be in the state into early June. Early migrants can be arriving by or before mid-July. But what do we do with those non-breeding shorebird species present in the state from June 15 to July 15? We have gotten to the point that we expect some at Cheyenne Bottoms Wildlife Area and Quivira National Wildlife Refuge annually. But it appears that we need to include several other wetlands as well. Not all shorebirds seen in the mid-June to mid-July timeframe are included but an attempt to include notable numbers or unexpected summering birds is shown.

Increasing reports of Mississippi Kites in southeast Kansas are further testament to the ongoing expansion of this species in the state. This species is now reported in all but five Kansas counties (mostly along the Nebraska border) and a confirmed breeder in 49 counties. In the late 1980's, Thompson and Ely showed confirmed sightings in 65 counties. This species was documented nesting in the state already in 1906 but really didn't become a regular nesting species north of the Arkansas River until the 1960s. We have no reason to believe it won't continue to expand its summer and nesting range.

Pine Siskins were being reported well into June. June reports from at least eight counties indicate likely breeding in several locations around the state. Most reports ended by late June with one July report out of Douglas County. Reports of Pine Siskins seen in Cheyenne, Cowley, Douglas, Ellis, Ford, Geary, Logan and Sherman counties well into June are consistent with past breeding records in Kansas with eggs and incubation in April and May and recently fledged young April to early June (Birds of Kansas, Thompson, et. al, 2011) Virtually all birds reported were at residential feeders in neighborhoods with known stands of coniferous trees.

After the winter irruption of Red Crossbills they were reported into mid-June. While they were likely stragglers from the winter irruption one cannot rule out the possibility that some were breeding birds. One other interesting report of a usual winter species was the June 21st report of a Brown Creeper from Scott Lake. Summer records of this species in Kansas are quite rare.

The highlight of the season was the Bronzed Cowbirds found at Arkalon Park northeast of Liberal in Seward County in very early June. While this sighting was well documented and accepted by the Kansas Bird Records Committee (KBRC) officially placing this species on the Kansas list, this is likely not the first record of this species in Kansas. A report of Bronzed Cowbird was filed with the Kansas Bird Records Committee in July 2009 from Reno County. While convincingly written up, lack of photographic evidence likely kept the KBRC from accepting this report and the KBRC should be encouraged to reconsider the previous record.

Any report marked as having been turned in to the Kansas Bird Records Committee (KBRC) should be considered tentative until review by the Committee is completed. Thank you to everyone who reports and contributes sightings for this report. Please forward any noteworthy sightings to me at cotte@ksu.edu or mailed to 613 Tamerisk Dr., Junction City, KS 66441.

<u>Species</u>	<u>Number and Location</u>	<u>County</u>	<u>Date</u>	<u>Observer(s)</u>
Black-bellied Whistling-Duck	11 at Frontenac community lake	<u>Crawford</u>	6/09	AG
Black-bellied Whistling-Duck	4 at two locations in Larned	Pawnee	6/30	DSn
Black-bellied Whistling-Duck	1 just north of US81/US24 junction	<u>Cloud</u>	7/07	PW
Black-bellied Whistling-Duck	1 at turnpike service area ponds	<u>Leavenworth</u>	7/28	EG, m.ob.
Common Merganser	1 at Perry Lake, uncommon summer record	Jefferson	7/04	KC, DP

<u>Species</u>	<u>Number and Location</u>	<u>County</u>	<u>Date</u>	<u>Observer(s)</u>
Western Grebe	1 at Wellington Lake, easterly	Sumner	6/28	FSQ
Inca Dove	1 near Partridge	Reno	7/06	JMi
Calliope Hummingbird	First of season in Garden City	Finney	7/20	SSh
Calliope Hummingbird	1 at residential feeder	Ford	7/29	JC
Black-necked Stilt	Westerly at Elkhart WTP	Morton	6/16	WJW
Black-necked Stilt	8 at playa near Deerfield	Kearny	6/19	KM
Killdeer	<u>91</u> on Baker Wetlands weekly survey	Douglas	7/17	RB, et. al.
Whimbrel	1 lingering at QNWR	Stafford	6/11	DP
Long-billed Curlew	1 easterly at Carey Park, Hutchinson	Reno	6/17	JMi
Marbled Godwit	6 at QNWR	Stafford	6/20	BJ
Marbled Godwit	1 at Wellington Lake, late	Sumner	6/28	FSQ
Sanderling	1 at Heritage Park/Heritage Lake	Johnson	7/14	CE
Dunlin	1 at QNWR	Stafford	7/05	MR
Dunlin	1 at Heritage Park/Heritage Lake	Johnson	7/14	CE
Least Sandpiper	4 at Baker Wetlands	Douglas	7/01	RB
White-rumped Sandpiper	“a couple dozen” at QNWR 7 still present on 6/30, 1 present on 7/12	Stafford	6/20	BJ
Short-billed Dowitcher	1 at CBWA, calling 2 present on 7/12	Barton	7/06	MR
Short-billed Dowitcher	1 at Heritage Park/Heritage Lake	Johnson	7/14	ML
Lesser Yellowlegs	1 at wetland near Protection	Comanche	6/18	DPa
Willet	1 at Cedar Bluff Res.	Trego	6/20	AN
Willet	1 at Baker Wetlands	Douglas	7/01	MC
Greater Yellowlegs	1 at Cedar Bluff Res.	Trego	6/20	AN
Common Loon	3 at Bonecreek Lake	Crawford	7/01	AG
Common Loon	1 at Perry Lake Still present 7/31	Jefferson	7/07	RC
Tricolored Heron	1 at Neosho WA	<u>Neosho</u>	7/21	ABu
White Ibis	1 immature at Baker Wetlands Last reported 7/23	Douglas	7/12	RWs, m.ob.
Roseate Spoonbill	1 photographed along Ark River in Wichita	Sedgwick	7/02	TG
Black Vulture	1 adult in vicinity of Lee Richardson Zoo	<u>Finney</u>	7/14	ZS
Osprey	1 flying over residence in Salina	Saline	6/02	KK
Pileated Woodpecker	1 at Kingman SFL	Kingman	7/26	JC, HA
Eastern Wood-Pewee	1 at Scott Lake vocalizing, quite westerly	Scott	7/27	SSh
Willow Flycatcher	1 at Marion SP	Marion	7/03	LH
Red-breasted Nuthatch	1 at back yard feeder in Dodge City	Ford	7/28	CMM
Brown Creeper	1 at Scott SP, a rare summer record	Scott	6/21	WJW
Red-Crossbill	Individual birds still being seen in Ulysses	Grant	6/01	SG
Red Crossbill	Calling and flying over residence	Douglas	6/09	MRo
Red Crossbill	1 at rural residence	Ellsworth	6/13	DK
Red Crossbill	1 female in Garden City at feeders	Finney	6/17	SSh
Pine Siskin	1 in Lawrence	Douglas	7/23	PW

Species	Number and Location	County	Date	Observer(s)
White-crowned Sparrow	1 at birdbath at Lawrence residence	Douglas	6/16	KS
Golden-crowned Sparrow	1 at Geary SFL	<u>Geary</u>	6/03	JRo
Bronzed Cowbird	Male and female in Arkalon Park, KBRC As many as 7 birds were seen. Last reported July 25.	Seward	6/02	EK, BK, m.ob.
Brewer's Blackbird	2 males and 1 female near feedlot Interesting summer record	Logan	6/18	AY
Ovenbird	1 at Boicourt Area	Linn	6/23	MMH
American Redstart	1 adult male south of Russell Springs	<u>Logan</u>	6/05	AY
Prairie Warbler	1 adult male at Wilson WA Still present on 6/12	Russell	6/02	MR

Locations and notes: CBWA – Cheyenne Bottoms Wildlife Area, KBRC – Kansas Bird Records Committee report filed, QNWR – Quivira National Wildlife Refuge, Res. – Reservoir, SFL – State Fishing Lake, SP – State Park, WA – Wildlife Area, WTP – Water Treatment Ponds. *Underlined county name indicates new county record. Underlined number indicates an exceptionally high count.*

Observers - Individuals: Henry Armknecht, Roger Boyd, Andrew Burnett (ABu), Jeff Calhoun, Randy Carman, Kathy Carroll, Marcia Clouser, Corey Entriken, Andy George, Tyler Griffith, Sam Guy, Ethan Gyllenhaal, Lisa Hoffman, Will Jaremko-Wright (WJW), Barry Jones, Ethan Kistler, Dave Klema, Bill Krochuk, Kaleb Kroeker, Mark Land, Mick McHugh (MMH), Christi McMillen (CMM), Kurtis Meier, Joseph Miller (JMi), Alan Neal, Daron Patterson (DPa), Diane Persons, Mike Rader, Mark Robbins (MRo), John Row (JRo), Kim Sain, David Schneider (DSn), Sara Shane (SSh), Faith Shapley-Queen (FSQ), Phil Wedge, Ric Westman (RWs), Austin Young. **Observers - Groups:** Lee Richardson Zoo staff (ZS), m.ob. – multiple observers.



KOS members attending the 70th Annual Meeting at KU on October 6, 2018 pose in front of Dyche Hall just as the attendees did at the first annual meeting in May of 1949.

Photo by Cheryl Miller

Kansas Ornithological Society - Top 10 Birds

October 2017 - September 2018

Compiled by Eugene Young

This is an annual, mainly for fun, listing. Some of these are records are yet to be acted on by the Kansas Bird Records Committee and this list should not be construed to indicate confirmed records. In the meantime, enjoy!

1. Little Stint: 30 August 2018, Cheyenne Bottoms, The Nature Conservancy land, by Rob Penner. Second record for Kansas; first record was accepted by Kansas Bird Records Committee (KBRC) last year.

2. Bronzed Cowbird: 2 June 2018 – at least end of July 2018, Arkalon Park, Liberal, Seward County, by Ethan Kistler and Bill Krochuk. Subsequently seen by many Kansas birders. Second state record, first was accepted by Thompson et al. (2011), this is first record accepted record by KBRC.

3. Pacific Wren: 19 November 2017 at Scott Lake State Park, by Kevin Groeneweg, Henry Armknecht, Jeff Calhoun, Tom Ewert, and Pete Janzen. Second state record, ironically from the same location as the first state record in 2015.

4. White-tailed Kite: 15 December 2017, two birds on Fort Riley, present for several days, found by Thomas Duckworth and Brian Monser. Sixth state record, late seasonal record.

5. Painted Redstart: 10 - 12 November 2017 at Lee Richardson Zoo, Garden City, Finney County, by Sara Shane. Seventh state record, latest seasonal record, previous was October in 2014.

6. Canyon Wren: 12 May 2018, Stevens County, Jeff Calhoun and Henry Armknecht. Fourth county it's been recorded in, usually a sedentary species.

7. Pyrrhuloxia: 1 or 2 February 2018 through extended period, near Anthony Lake, by Elsie Fisher, Eighth state record, first since 2000.

8. Harris's Hawk: 27 November - 12 December 2017, near Gardner, Johnson County, by Rodney Wright. A species that often shows up in area and stays for extended periods.

9. Swainson's Warbler: Shawnee Mission Park 15 - 16 May 2018, by Terry Swope. Ninth state record.

10. Tie: Clark's Nutcracker: 12 November 2017 west of Anthony by Corey and Theresa Entriken;

Eurasian Wigeon: 1 - 2 December 2017, LaFarge Sandpit, Wichita, by Pete Janzen. This species is still on the hypothetical list, though reported in at least ten counties.

Honorable Mentions:

Four Swallow-tailed Kite records: 22 April 2018 near Reading by Debby McKee; 26 July 2018 Sedgwick County Park by Allan Volkmann; 11 August 2018, Sandhills State Park, Reno County, Beth Wiechman; and first reported on 29 August 2018 at Governor's Mansion Trails and MacLennan Park, Topeka by Sue Newland, seen by many others, this bird stayed for some time.

Western Hummingbirds: Black-chinned, Broad-tailed, Calliope by Don Kazmaier, Jeff Calhoun, Tom and Sara Shane, Erikson's and Gidden's residences among others in western and central Kansas.

Connecticut Warbler: Shawnee Mission Park, Johnson County, 15 - 18 May 2018, by Kathy Carroll, Melissa Bruce, and Malcolm Gold. Most records are from northeast Kansas, but relatively few documented records for state.

Black-legged Kittiwake: John Redmond Reservoir 28 January - 4 February 2018 found by Aaron Batterbee and Malcolm Gold. One at Clinton Lake 12 February - 8 March 2018 found by Jennifer Hammett (possibly same bird as at John Redmond Reservoir).

(Eugene wishes to thank Malcolm Gold and Chuck Otte, for their assistance and input in compiling this list.)

Support
Kansas Ornithological
Society Inc.

When you shop at smile.amazon.com,
Amazon donates.

[Go to smile.amazon.com](https://smile.amazon.com)

amazonsmile

Fall KOS meeting paper abstracts

(Presenter indicated by * following name)

Cast It In, Kansas Edition

Lynnea M. Nelson*, *Nelson Nook of Knowledge*

The purpose of my project is to educate Kansans on the dangers to wildlife of fishing line left in the environment. Additional goals include raising money for, building and distributing monofilament recycling bins around Kansas at all Lakes and Waterways. To accomplish the goals of my project I have raised money, built, installed, and monitored bins. A journal of my work is available upon request. I have had 10 meetings with individuals or organizations interested in supporting Cast It In, Kansas Edition. I have obtained grants from Burroughs Audubon, Sperry-Gallager Audubon, Wichita Audubon, Topeka Audubon, PIG Difference and Chickadee Checkoff funds. I have installed and/or given bins to be installed at 6 NE Kansas area lakes. Permission has been granted for bins to be installed at an additional 3 NE Kansas area lakes. I have been interviewed 6 times with articles being published in 3 different publications and air time on WIBW TV. As of the presentation of this abstract, over 1.2 miles of fishing line has been collected for recycling. Much work remains to be done, but a start has been made.

Modelling the niche of a traveler: present and past climatic scenarios for the Great Tit

Fernando Machado-Stredel*, *Biodiversity Institute and Department of Ecology and Evolutionary Biology, University of Kansas; Gang Song, Key Laboratory of Zoological Systematics and Evolution, Institute of Zoology, Chinese Academy of Sciences; Ruiying Zhang, Key Laboratory of Zoological Systematics and Evolution, Institute of Zoology, Chinese Academy of Sciences; Per Alström, Department of Ecology and Genetics, Animal Ecology, Evolutionary Biology Centre, Uppsala University, Sweden and Key Laboratory of Zoological Systematics and Evolution, Institute of Zoology, Chinese Academy of Sciences; Yanhua Qu, Key Laboratory of Zoological Systematics and Evolution, Institute of Zoology, Chinese Academy of Sciences; Huijie Qiao, Key Laboratory of Zoological Systematics and Evolution, Institute of Zoology, Chinese Academy of Sciences; Herman Mays, Department of Biological Sciences, Marshall*

University; Per G. Ericson, Department of Bioinformatics and Genetics, Swedish Museum of Natural History; Jon Fjeldså Center for Macroecology, Evolution and Climate at the Natural History Museum of Denmark, University of Copenhagen; A. Townsend Peterson, Biodiversity Institute and Department of Ecology and Evolutionary Biology, University of Kansas; Fumin Lei, Key Laboratory of Zoological Systematics and Evolution, Institute of Zoology, Chinese Academy of Sciences

The Great Tit (*Parus major*) is a charismatic bird found in most of the Old World. This widespread species is well known by birdwatchers and has been the subject of a plethora of research studies; however, its evolutionary history and systematics are still in debate. To understand some of the differentiation patterns recovered in a newly well-resolved multi-locus phylogeny, we undertook an ecological niche modeling approach, exploring climatic changes during the Pleistocene. We identified 66 genotyped populations across Eurasia and generated an area of calibration (M) based on spatial buffers per location. Inside M, we reduced a dataset of 121,041 records (GBIF) through spatial filters to avoid autocorrelation (1,112 records). Moreover, as explanatory factors we used the PCA scores of 15 bioclimatic variables for present climate (WorldClim), and their projections in a Last Glacial Maximum scenario (i.e., 22,000 years into the past). Our model selection criteria were the omission rate, a test of significance (partial ROC), and the Akaike Information Criterion. From 6,902 explored models, we obtained a subset of 13 best models, all of which showed consistency in losing environmental continuity and suitable areas from the Last Glacial Maximum to the present. These climatic changes might explain the observed patterns of phylogenetic diversification and genetic diversity in Great Tits. Considering our preliminary results, we expect the present work to represent a step forward in the understanding of the evolutionary history of other widespread Eurasian bird species.

Assessing Habitat Characteristics for Long-Term Grassland Breeding Bird Monitoring: Traditional Methods vs. Multi-Spectral Imaging

*Kyle W. Schumacher**, Mitchell J. Greer, William J. Stark, and Rob Channell, Department of Biological Sciences, Fort Hays State University

Quivira National Wildlife Refuge partnered with Fort Hays State University to begin a collaborative research project that investigated a long-term monitoring protocol guided by the comprehensive conservation plan for the refuge. The plan identified specific avian taxa underrepresented in management impact assessments on the property, and surveys were established to monitor interactions between grassland breeding bird and vegetation communities. Sixteen point count surveys were conducted 18 May to 13 July 2017 for 122 observation points across four transects, and 17 vegetation variables were measured at each observation point in June 2017. Single-season occupancy analysis was completed on species encountered for 2017. Species with estimated occupancy between 0.300 and 0.800 were deemed potentially amenable for advanced occupancy analysis using vegetation measurements as covariates that could affect the occupancy probability. Multi-spectral imagery was obtained during that same time period from GeoEye-1 satellite operated by Satellite Imaging Corporation to compare the 17 vegetation variables with remotely sensed vegetation data. Cover class variables were created from five unique signatures of vegetation reflectance. Single-season occupancy modeling using traditional and remote-sensed vegetation variables/cover types as covariates, was performed for five of the bird species amenable to advanced occupancy analysis. Covariates derived from multi-spectral imagery consistently performed equal to or better than comparable on-the-ground assessment covariates for four of the five species. These techniques provide the opportunity for annual assessments that promote an adaptive management approach to plant community dynamics and how they may influence the avian fauna on federal properties.

Does nestling condition respond to arthropod biomass in CRP fields?

*Heather M. Kraus**, Department of Biological Sciences, Emporia State University; William E. Jensen, Department of Biological Sciences, Emporia State University; Mary Liz Jameson, Department of Biological Sciences, Wichita State University; Greg R. Houseman, Department of Biological Sciences, Wichita State University; Molly M. Reichenborn, De

partment of Biological Sciences, Wichita State University; and W. Alice Boyle, Division of Biology, Kansas State University

Grassland bird populations have experienced declines in recent decades that have coincided with fragmentation and loss of prairie habitat. The Conservation Reserve Program (CRP) has benefitted grassland birds through grassland restoration. However, variation in CRP management (grazing, diversity of plants seeded) might impact food for grassland birds by affecting the diversity and abundance of plants and arthropods. Higher arthropod abundance might allow greater parental provisioning of nestlings and, consequently, improved nestling growth and survival. We investigated nestling condition of Dickcissels (*Spiza americana*) in response to arthropod biomass across CRP fields in central Kansas in 2017. Arthropod biomass was similar among management treatments (grazing, planting practice). All measures of nestling condition (mass-age residuals, mass-tarsus residuals, standard deviation of tarsus length, and plasma triglycerides) showed no clear relationships with either orthopteran biomass (primary food source) or total arthropod biomass. Instead, brood size explained some variation in nestling condition with nestlings in larger broods having generally poorer condition than those in smaller broods. Arthropod biomass within CRP fields was not a strong predictor of nestling condition, perhaps because parents can compensate for food limitation in their nesting territories. However, parents might be limited in the number of nestlings they can adequately feed within a given nesting attempt.

Establishing Long-Term Monitoring of Birds and Vegetation in Mined Land Wildlife Areas in Crawford and Cherokee Counties

*Rachel Styers-Wood**, Christine Rega-Brodsky, and Andrew George, Department of Biology, Pittsburg State University

Recovery efforts on reclaimed mined lands have been ongoing for many years, but because of data gaps it is uncertain whether these efforts are productive and effective. The objective of this pilot season was to establish long-term bird point count and vegetation sampling plots on five reclaimed mined land properties in southeast Kansas. Two survey locations were placed within each property to assess activity levels in forest edge and grassland communities. Bird communities were surveyed by performing three, five-minute unlimited radius point counts during the breeding season. Vegetative structure and community

variables included canopy closure, horizontal cover, tree and shrub community, and vertical structure. A total of eleven locations were surveyed. Preliminary findings that show of the 354 birds observed, which included 47 species. On average we found 15.7 species per site. Within one research site, the total numbers of species were relatively similar across grassland and forested regions. Overall, six species of greatest need of conservation were detected; including the Eastern Meadowlark, Dickcissel, Northern Bobwhite, Bell's Vireo, Baltimore Oriole, and Eastern Wood-Pewee. We are currently evaluating the differences of site vegetation on the bird community. Our goal is to continue sampling and monitoring these locations over the long-term to assess impacts of restoration efforts and provide recommendations for management of reclaimed mined lands.

Effects of vegetative structure and experimental forest management on densities of breeding birds in upland hardwood forests

Michael W. Barnes and Andrew D. George, Department of Biology, Pittsburg State University*

Forest bird populations in North America have undergone declines since at least the 1960s. However, few studies have examined the long-term effects of forest management practices on bird population demographics. We analyzed the effects of vegetative structure and experimental forest management practices on the densities of 11 bird species, using 14 years of monitoring data from 9 landscape-scale experimental forest plots in the Missouri Ozarks. Vegetative variables included basal area, stem density, and structural heterogeneity. Management variables included years since harvest and treatment type. Densities of Acadian Flycatcher, Black-and-white Warbler, Eastern Wood-Pewee, Indigo Bunting, Ovenbird, Worm-eating Warbler and Wood Thrush, showed significant responses to a combination of vegetative and management effects. Densities of Hooded Warbler, Kentucky Warbler, Prairie Warbler, and Yellow-breasted Chat, showed significant responses to management effects alone. Conservation of bird populations in forested landscapes will require consideration of long-term, stand-level effects of forest management practices on specific species.

Reappraising biodiversity in Aphelocoma jays

Devon A. DeRaad, Biodiversity Institute and Department of Ecology and Evolutionary Biology, University of Kansas; Margaret E. Schedl, Biology Department, University of Rhode Island; James M. Ma-*

ley, Moore Laboratory of Zoology, Occidental College; Whitney L.E. Tsai, Moore Laboratory of Zoology, Occidental College; John E. McCormack, Moore Laboratory of Zoology, Occidental College

The *Aphelocoma* jays of North America and Mesoamerica have become a model genus for studying evolution. Recent work at the Moore Laboratory of Zoology at Occidental College has helped reconsider variation in this genus across multiple axes like genetics, the phenotype, and niche preferences. The result of this work is a rewriting of the taxonomy of the genus, allowing us to accurately recognize its complex evolutionary history and better recognize and protect the unique evolutionary lineages it encompasses. I summarize the foundational systematics work on *Aphelocoma* over the past century and emphasize how this research underlies exciting new evolutionary questions. I discuss how studies have revealed ancient, cryptic evolutionary lineages within the three major groups of *Aphelocoma* jays, including ongoing work on a previously unstudied hybrid zone in the scrub-jays of Mexico. Finally, I detail how we are using the newly increased taxonomic understanding of the genus to make inferences about the evolutionary forces that shaped genus-wide diversity of phenotype and genotype.

Effect of cattle grazing, plant diversity, and landscape composition on bird densities in CRP grasslands

Benjamin S. Wilson, Department of Biological Sciences, Emporia State University; William E. Jensen, Department of Biological Sciences, Emporia State University; Greg R. Houseman, Department of Biological Sciences, Wichita State University; Mary Liz Jameson, Department of Biological Sciences, Wichita State University and Molly M. Reichenborn, Department of Biological Sciences, Wichita State University*

Shortgrass prairies have been reduced to 52 percent of their historical extent (Samson et al. 2004), contributing to reduced habitat for several species. One such species is the Burrowing Owl (*Athene cunicularia*). The Western Burrowing Owl subspecies (*A. c. hypugaea*) has been listed as a Species of Special Concern in nearly every western and midwestern state (Sheffield 1997), including Kansas where it is a Tier II Species of Greatest Conservation Need (Rohweder 2015). Habitat destruction due to anthropogenic activities, increasing use of pesticides, and reduction in burrowing mammal abundance are the primary threats that have led to this status (Klute et

al. 2003). The objective of this study was to determine if remote sensing technology aboard an unmanned aerial system can effectively classify the vertical structure of vegetation, while providing a conservation plan to Smoky Valley Ranch (Logan County, KS) for their migratory population of Western Burrowing Owl. To determine the effectiveness of remote sensing technology, it was necessary to collect on-the-ground data to provide a comparison. Once a Burrowing Owl nest was found, a random non-nest burrow was selected. Vegetation surrounding all burrows was classified by establishing four 20m transects, one at each cardinal direction and centered at the burrow opening. On each transect, a 1m x 1m Daubenmire frame was used to classify vegetation at 2m, 5m, 10m, and 20m away from the burrow. An unmanned aerial system was also flown over each burrow to collect imagery to which Daubenmire data was compared.

New World Toucans and Barbets: Understanding the Biogeographic History of the Neotropics

*Emily N. Ostrow**, University of Kansas and Drexel University; *Therese A. Catanach*, Drexel University; *John M. Bates*, Field Museum of Natural History, Chicago ; *Alexandre Aleixo*, Museu Paraense Emilio Goeldi, Belém Brazil; and *Jason D. Weckstein*, Drexel University

This study focuses on the phylogenomic relationships of a monophyletic clade of birds including the toucans (Aves: Ramphastidae) and their relatives, the New World barbets (Aves: Capitonidae) and toucan-barbets (Aves: Semnornithidae). Toucans and their relatives have been models for reconstructing the biogeographic history of the Neotropics. Multiple genera of toucans and their relatives co-occur across the Neotropics and thus these taxa can serve as replicates for testing biogeographic hypotheses. I used both UCE and mitochondrial genome sequences to reconstruct phylogenetic trees then used BioGeoBEARS to map highland/lowland and cis/trans-Andean and Atlantic Forest areas onto these trees. I confirmed previous studies indicating that (1) lowland *Selenidera* toucanets may be paraphyletic with respect to *Andigena* mountain-toucans and (2) the toucan barbets (Semnornithidae) are sister to the toucans (Ramphastidae). This ancestral state reconstruction confirmed that the Andes were important in the diversification of both lowland and highland taxa in this group and that lowland taxa dispersed into the Andes seven times. For lowland taxa, there were 8 transitions from the cis-Andean or highland regions to

trans-Andean regions and Amazonian taxa likely colonized the Atlantic Forest relatively recently during Pleistocene climatic oscillations. Overall, a combination of data on timing and reconstruction of ancestral areas suggests that although Andean uplift may have been a factor in diversification, the primary driver for both highland and lowland toucan and barbet taxa was dispersal into the Andes from the lowlands, dispersal from the cis-Andean to the Trans-Andean region, and dispersal into the Atlantic Forest from Amazonia.

Effects of climate change on distributional potential of three restricted-range West African bird species

*Julia Sunnarborg**, *A. Townsend Peterson*, *Benedictus Freeman*, Biodiversity Institute, University of Kansas

A detailed understanding of species' responses to global climate change provides an informative baseline for designing conservation strategies to optimize protection of biodiversity against impacts of climate change. However, such information is either scanty or not available for many tropical species, making it difficult to incorporate climate change into conservation planning for most tropical species. Here, we used correlative ecological niche models to assess potential distributional responses of three restricted-range West African birds (Timneh Parrot *Psittacus timneh*, Gola Malimbe *Malimbus ballmanni*, and White-necked Picathartes *Picathartes gymnocephalus*) to global climate change. We used primary biodiversity occurrence records for each species, obtained from the Global Biodiversity Information Facility, eBird, and VertNet; for environmental data, we used climatic variables for the present and future, the latter characterized by two IPCC representative concentration pathways (4.5, 8.5) future emissions scenarios and 27 general circulation models for a 2050 time horizon. We found broad present-day potential distributions with respect to climate for all three species. Future potential distributions for Gola Malimbe and White-necked Picathartes tended to be stable and closely similar to their present-day distributions; on the contrary, we found marked climate-change-driven potential range loss across the range of Timneh Parrot. Our results suggest that impacts of climate change on the present distributions of many West African birds will be minimal, but that individual species may respond differently to future conditions. Thus, to optimize the conservation of these species and of bird diversity in general, we recommend that regional-to-national

species conservation action plans incorporate climate change adaptation strategies for individual species; ecological niche models could provide an informative baseline information for this planning and prioritization.

Patterns and trophic drivers of reproductive responses to drought in grassland songbirds.

Dylan Smith, Sarah Winnicki, Emily Williams, Andrew Hope, and W. Alice Boyle, Kansas State University*

Severe climatic events can be major sources of selection, and demographic consequences of those events can have cascading effects across trophic levels. In the Great Plains, climate change is increasing the frequency of droughts, but droughts are notoriously difficult to study due to their unpredictability in space and time. We took advantage of up to five years pre-drought data, ongoing population-level studies, and a regional drought in 2018 that affected the Flint Hills of Kansas to document differences in bird reproductive behavior in three species of declining songbirds. We also bring evidence to bear on potential direct and indirect trophic mechanisms by which the drought could lead to the avian responses we documented. Using 5 years of temperature, humidity, and precipitation data, we document the intensity of the drought and nature of other climatic stressors on birds. We compared the timing and success in Grasshopper Sparrows (*Ammodramus savannarum*) in 2018 with the previous four years, and those same metrics in Dickcissels (*Spiza americana*) and Eastern Meadowlarks (*Sturnella magna*) with data from 2017. Additionally, we used two years of nest camera data to document changes in nest predators between years. To link drought to birds via trophic interactions, we also trapped small mammals in 2016-2018. In 2018, nest initiation dates were concentrated in a single bimodal peak early in the season with very few nests initiated during June and July, indicating that birds mainly did not re-nest or raise second broods in the drought year. The number of nests we found (given similar search effort in all years) also declined in the drought year, with only approximately 60% as many nests in 2018 compared to 2017. However, nest success was higher than in non-drought years for Grasshopper sparrows (but lower for Dickcissels and meadowlarks) and all three species fledged more young per nest in 2018. We documented a dramatic shift in nest predators between 2017 and 2018: in 2017, all predation events captured on camera were due to 3 species of snakes, but in 2018, only 44% of

predation events were attributed to snakes, and we recorded a total of 9 predator species, comprising mammals, birds, and snakes. This shift is consistent with mammalian predators seeking alternate prey when small mammal populations are reduced. Our results suggest that in a drought year, reductions in productivity occur mainly due to changes in nesting propensity. The difference in nest success in a drought year between species could be due to different effects of prey or vegetation on predation risk, or differential consequences of shifts in predator community. Understanding the effects of droughts in a variable system such as tallgrass prairie can provide insight into how populations might be affected by future environmental conditions.

Lesser Prairie-Chicken Response to Intensive Wildfire: One Year Post Wildfire

Matthias Sirch, Kansas Cooperative Fish and Wildlife Research Unit, Department of Biology, Kansas State University; Dan S. Sullins, Kansas Cooperative Fish and Wildlife Research Unit, Department of Biology, Kansas State University; David A. Haukos, U.S. Geological Survey, Kansas Cooperative Fish and Wildlife Research Unit, Department of Biology, Kansas State University; John D. Kraft, Kansas Cooperative Fish and Wildlife Research Unit, Department of Biology, Kansas State University*

The largest fire in Kansas history burned 2,521 km² (623,000 acres) of mostly grassland and encroaching woodland within the Lesser Prairie-Chicken range from 6 March to 12 March 2017. Fire is an ecological disturbance that plays an important role in maintaining grassland habitat for wildlife. However, response of Lesser Prairie-Chickens and their habitat to extreme wildfires are unknown. In spring 2018, we revisited a site in Clark County, KS that burned in the wildfire and where data were collected before the wildfire (2014–2016). We followed the same monitoring and vegetation protocols as used before the fire to compare habitat characteristics, habitat use, and vital rates of Lesser Prairie-Chickens. Although the height of vegetation did not change substantially before and one year after the fire, grassland thatch and basal vegetation was much more sparse after the fire. The decrease in thatch was apparent in 100% visual obstruction readings which decreased 50% and in litter depth readings that decreased 20% throughout the study area. The reduction in thatch may have influenced the use of the study area after the wildfire. Lek counts indicated a 66% decrease in males and Lesser Prairie-Chickens marked with GPS transmit-

ters avoided the burned area during the 2018 breeding season. The short term impacts of the fire indicate that the extreme nature and extent of the fire has had a homogenizing effect on the grasslands as compared to small less intensive fires that typically increase grassland heterogeneity that can be beneficial for Lesser Prairie-Chickens.

Direct effects of Brown-headed Cowbird (*Molothrus ater*) brood parasitism on the growth and development of grassland songbirds

Sarah K. Winnicki and W. Alice Boyle, Kansas State University*

Patterns of animal growth and development vary widely, both among and within species, yet the drivers of variation are often unclear. In altricial birds, nestling developmental patterns have been linked to differences in food availability and predation risk, but in some systems such as grassland songbirds, brood parasitism presents a unique set of selective pressures potentially influencing host development. We hy-

pothesized that costly Brown-headed Cowbird (*Molothrus ater*) brood parasitism influences host nestling growth and development strategies through direct sibling competition for parental care and space in ways that are dependent on the relative size of hosts and parasites. At the Konza Prairie in Northeast Kansas, we located and monitored 148 nestling-stage nests of three grassland-obligate songbirds ranging in size from 40% to 270% of the cowbirds' mass: Grasshopper Sparrows (*Ammodramus savannarum*), Dickcissels (*Spiza americana*) and Eastern Meadowlarks (*Sturnella magna*). We measured the growth of 316 nestlings' tarsi, wings, mass, bills, and feathers every two days. Nestling growth rates varied widely between and within species, with some growing as much as 50% faster than conspecifics in nearby nests. The effects of cowbird parasitism varied between species and was not obviously linked to host size as we had predicted. We plan to relate these direct effects of parasitism to indirect effects of parasitism on food availability and predation risk using data from cryptic nest cameras.



KOS Members enjoy examining study skins of birds during the Friday evening reception hosted by the Biodiversity Institute, University of Kansas at the KOS Annual Meeting.

photo by Cheryl Miller



Bob Gress, KOS Member, retired director of the Great Plains Nature Center, Wichita and wildlife photographer entertained those attending the Annual meeting banquet with photos from Wild Peru.

photo by Cheryl Miller

