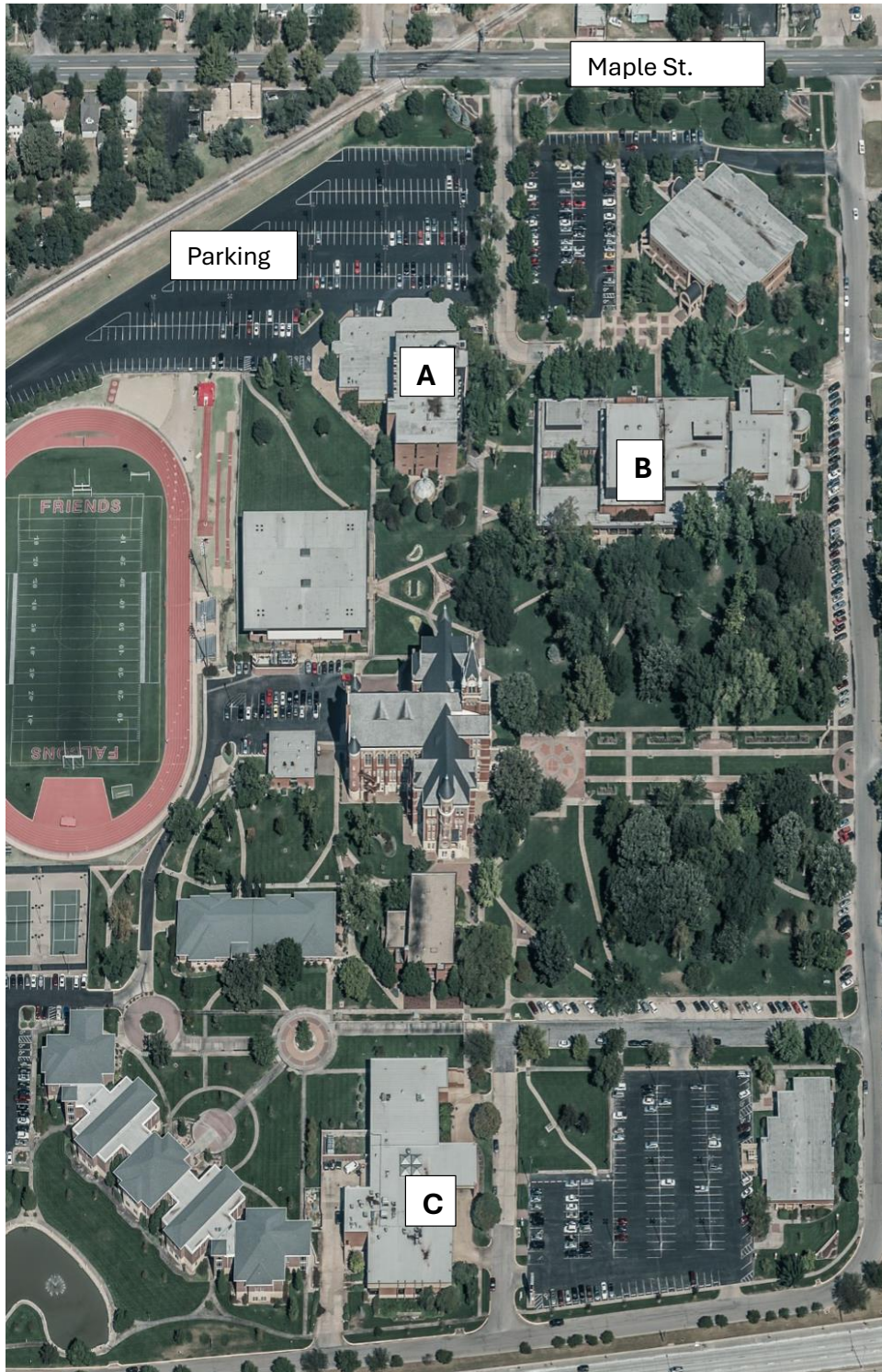


KAS Annual Meeting Itinerary

Friday	
6:00 pm to 8:30 pm	Sedgwick County Zoo for dinner and a guest speaker Meet in Cargill Learning Center - directly accessible from the main parking lot. Executive session for KAS officers immediately following.
Saturday	
8:00 am to 9:00 am	Registration in Riney Fine Arts building atrium. Continental breakfast sponsored by Central States Entomology Society.
9:00 am to 9:15 am	Opening Remarks in Sebitts Auditorium of Riney Fine Arts building
9:15 am to 10:15 am	Keynote Address inside Sebitts Auditorium of Riney Fine Arts Building: Eric Eaton - Insectpedia author, editor of BugGuide.net <i>From Participation to Impact: Empowering Citizen Access, Inclusion, and Advocacy in Science</i>
10:15 am – 11:35 am	First oral presentation session in Penn Science Hall
11:35 am to 12:00 pm	Poster set-up and head towards Casado Campus Center lower level for lunch
12:00 pm to 12:30 pm	Lunch in lower-level of Casado Campus Center
12:30 pm to 1:00 pm	General Business Meeting (KAS stays in same space as lunch, CSES moves to Casado Conference Room)
1:15 pm to 2:15 pm	Poster session in Penn Science Hall
2:20 pm to 3:40 pm	Second oral presentations session in Penn Science Hall
3:45 pm	Wrap up and student awards presentations in room 100 of Penn Science Hall

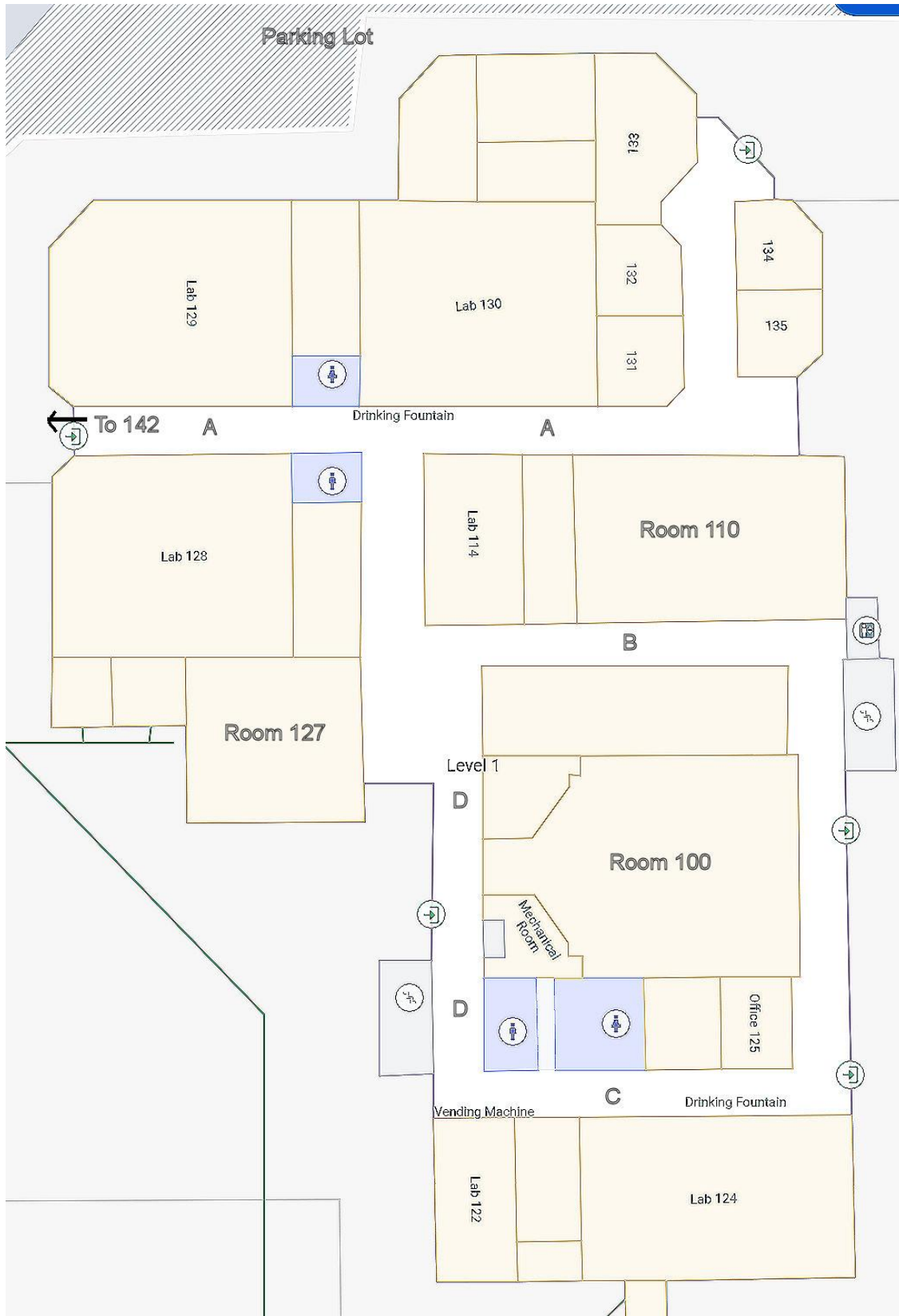


A – Penn Science Building (presentations/posters)

B – Riney Fine Arts (Registration, Keynote)

C – Casado Student Center (Lunch and business meeting)

Penn Science Hall floor plan



Presentations at a Glance

Room	Morning (10:15-11:35)	Afternoon (2:30-3:50)
100	Science Pedagogy	Paleontology + Soils
110	Entomology	Chemistry, Biochemistry, Engineering
127	Ecology	Plants + Genetics
142	Chemistry and Engineering	Astronomy/Physics

Posters at a Glance

Hall	Topic (mostly)
A	Physics, Paleontology, Engineering, Geology, Weather
B	Chemistry and Biochemistry
C	Entomology and Agriculture
D	Ecology and Biology

Oral Session 1:

Room 100 – Primary focus of Science Pedagogy

10:15 – 10:35	Emily Redding & Lorelei Patrick: Anything But Another Essay: Understanding Undergraduate STEM Student Perception of Creative, Project-Based Learning **
10:35 – 10:55	Jack Sytsma et al: Supporting Non-Major Biology Students: Making the Classroom YOUUnique **
10:55 – 11:15	Will Wiebe-Friesen: Teaching Beyond the Content in General Chemistry
11:15 – 11:35	John Richard Schrock: The Science of Transsexuality

Room 110 – Primary focus of Entomology

10:15 – 10:35	Anahi Quezada et al: Potential Areas of Distribution of the Butterflies of Kansas
10:35 – 10:55	Chad Zerr & Lorelei Patrick: Species-Specific Counts of Insects On and Off Prairie Dog Colonies
10:55 – 11:15	Natalie Herbison et al: Bees Display Limited Acclimation Capacity for Heat Tolerance
11:15 – 11:35	Mary Liz Jameson & Bryanna Woodard: Keystone Bison and Keystone Beetles? What Happened to Dung Beetles After the Near Extinction of America's Native Bison?

Room 127 – Primary focus of Ecology

10:15 – 10:35	Kylee Fillinger & Scott Kimball: Flower Color Preferences of the Rufous-tailed Hummingbird (<i>Amazilia tzacatl</i>) and Fawn-breasted Brilliant (<i>Heliodoxa rubinoides</i>) in the Subtropical Cloud Forest of Northern Ecuador. **
10:35 – 10:55	Jalynn Murry & Scott Kimball: Red Nape Patch in Downy Woodpeckers (<i>Dryobates pubescens</i>) May Communicate Mate Quality Through Patch Size, But Not Color **
10:55 – 11:15	Mason Moore: The Influence of Above Ground Resources Versus Below Ground Resources in Limiting Post Oak Seedling Growth in Kansas Cross Timbers Woodlands
11:15 – 11:35	Tiffany Bass: Browsed and Confused: Relationships Between Deer Browsing Intensity, Slope Aspect and Understory Plant Communities in the Kansas Cross Timbers Woodlands **

Room 142 – Primary focus of Chemistry and Engineering

10:15 – 10:35	Tasmin Binty & Belinda Sturm: Advanced Oxidation Pretreatment (AOP) of Industrial Wastewater for Alleviating Nitrification Inhibition
10:35 – 10:55	Quoc Bao Le et al: Application of Ternary Oxides Conjugated with MXene and CFx for Lithium Batteries
10:55 – 11:15	Mayankkumar Chaudhary et al: Anticorrosive, Bio-Based Polyurethane Coatings: Optimized for Superior Mechanical Strength and Hydrophobic Properties
11:15 – 11:35	D. Narsimulu & R. Gupta: Sulfur Incorporated Magnesium Vanadate Composite as a High-Capacity Cathode for Zinc-Ion Batteries

Oral Session 2:

Room 100 – Primary focus of Paleontology, Geology, and Soils

2:20 – 2:40	Scott Hageman et al: Preliminary Analysis of Ostracoda in the Lower Shale of the Florissant Formation (Eocene) Colorado
2:40 – 3:00	Parker Rhinehart et al: A Diverse Anachronistic Assemblage of Omomyid Primates from the Early Eocene Wasatch Formation of the Great Divide Basin, Wyoming
3:00 – 3:20	Kevin Mulcahy & Christopher Beard: Were Extinct Mammals Sexually Dimorphic? What We Can (and can't) Learn From Fossils
3:20 – 3:40	Jonathan Paul Frye: A Preliminary Description of Soil Properties and Biodiversity Across a Prairie Restoration Chronosequence in McPherson County, Kansas

Room 110 – Primary focus of Chemistry, Biochemistry, and Engineering

2:20 – 2:40	Heather Forster et al: A UDP-N-acetylglucosamine Transporter is Involved in Amino Acid Breakdown in the Fungus <i>Aspergillus nidulans</i> **
2:40 – 3:00	Chandan Bodhak et al: Sustainable Soybean Oil Acrylate for Boronic Ester Vitramer: Self-Healing, Reprocessable and Extensive Elongation Performance
3:00 – 3:20	Rutu Patel et al: Bio-Base Polyurethane Adhesives: Incorporation of Crosslinkers for Enhancement in Mechanical and Thermal Properties
3:20 – 3:40	Chenrayan Senthil & Ram Gupta: Realization of Lithium-ion Battery Pouch Cell: From Lab-Scale to Prototype

Room 127 – Primary focus of Plants and Genetics

2:20 – 2:40	Rebecca Keeler & Wai-Foong Hong: Case Study – Inheritance of Celiac Disease in Four Generations of a Family
2:40 – 3:00	Madison Moriello et al: Virtual Fencing: Impacts on Riparian Zones and their Adjacent Streams **
3:00 – 3:20	Jack Sytsma et al: Taking Genomics Outdoors in the Great Plains: Linking Local Adaptation, Trait Variation, and Gene Expression of Perennial Grass Ecotypes Across a Natural and Experimental Precipitation Gradient **
3:20 – 3:40	Trias Delilah & Conard Jonathan: The Impact of Urban Tree Canopy on Crime Rates for Communities in Kansas

Room 142 – Primary focus of Astronomy and Physics

2:20 – 2:40	Allanur Ansari: Constraints on Λ CDM and XCDM Cosmological Models Using Pantheon+ SN Type Ia, Hubble Parameter, and BAO Datasets **
2:40 – 3:00	Nickolas Solomey: The Origins of the Postulates of Modern Physics
3:00 – 3:20	Brooks Hartsock: Designing a Low-Background Solar Neutrino Detector **
3:20 – 3:40	Jonathan Folkerts: Neutrino Solar Orbiting Laboratory: From Underground to the Stars

Posters

A1	THE POWER OF PUBLIC DATA: MAPPING MISSISSIPPIAN ROCKS (~345 MA) IN SW & SC KANSAS USING PUBLIC GEOLOGIC DATA Eliot Manning, Diana Ortega-Ariza, Alan Peterson, and Kolbe Andrzejewski University of Kansas **
A2	ADDITIONAL MICROFOSSILS FROM THE WHITE RIVER FORMATION OF COLORADO Lauren K. Thompson, Kevin D. Mulcahy, and K. Christopher Beard The University of Kansas
A3	SIMULATING THE SHIELDING NEEDED FOR A DARK MATTER DETECTOR INSIDE OF AN ASTEROID Ethan Higginbotham Wichita State University
A4	PARTICLE TRAJECTORY NEAR A ROTATING BLACK HOLE Allanur Ansari, and Dr. Karen Camarda Washburn University **
A5	SIMULATION OF SOLAR WIND CHARGED PARTICLE ENERGY DEPOSITED AND PARTICLE IDENTIFICATION BY DELTA-E DISCRIMINATION IN SNAPPY CUBSAT DETECTOR Daniel Reichart and Nickolas Solomey Wichita State University **

A6	<p>SURVIVAL OF BACTERIA FROM SPACECRAFT ASSEMBLY FACILITIES IN BRINES AT EUTECTIC CONDITIONS RELEVANT TO MARS</p> <p>Theophilus K. Eshun and Mark A. Schneegurt</p> <p>Wichita State University</p>
A7	<p>APPLICATIONS OF KITE AERIAL PHOTOGRAPHY: CEMETERIES</p> <p>James S. Aber, and Susan E. W. Aber</p> <p>Emporia State University</p>
A8	<p>ESTABLISHING STUDENT-MADE RF ANTENNA STATION FOR LEO SATELLITE AND ISS COMMUNICATION</p> <p>Elijah Resano, Pete Sias, and Mazen Nairat</p> <p>Kansas Wesleyan University</p>
A9	<p>MEASURING LIGHT INTENSITY THROUGH VARIOUS MEDIUMS: A STUDY OF TRANSMISSION AND REFLECTION</p> <p>Austin Kofford, Benjamin Joy, Michael Taylor, and Dorcas Nsmire</p> <p>Friends University **</p>
A10	<p>IMPROVING WEATHER AWARENESS: A MOBILE APP FOR REAL-TIME, HISTORICAL, AND FORECASTED WEATHER DATA</p> <p>Cooper Crockett and Robert Schukei</p> <p>Baker University</p>
A11	<p>ARDUINO WEATHER SENSOR CIRCUIT</p> <p>Cameron Chase, Jack Franklin, Mason Grillot, Niquan Benjamin, and Pablo Sanz Rillo</p> <p>Friends University **</p>
B1	<p>DELETION OF BOTH TRANSPORTERS OF EXTRACELLULAR N-ACETYLGLUCOSAMINE IS LETHAL IN THE FUNGUS <i>ASPERGILLUS NIDULANS</i></p> <p>Heather D. Forster, Sara M. Hopkins, Joel T. Steyer, and Richard B.Todd,</p> <p>Kansas State University **</p>
B2	<p>NOVEL WHOLE ORGANISM TECHNIQUE FOR IDENTIFICATION OF ANTINEOPLASTICS: PROOF OF PRINCIPLE AND CHARACTERIZATION OF HYDROBERBERUBIN</p> <p>Kassie Kinniburgh, Sadie Hopman, and Prince N Agbedanu</p> <p>Friends University **</p>

B3	<p>SCREENING CANDIDATE CANCER DRUGS WITH WHOLE ORGANISMS' SYSTEMS FOR OFF-TARGET EFFECTS</p> <p>Ashlynn Fairall, Sadie Hopman, Russell A. Fox, and Prince N. Agbedanu</p> <p>Friends University **</p>
B4	<p>EVALUATING 4-ETHYL-4-HEXADECYLMORPHOLINE AND ANTIBIOTIC X 146 AS ANTINEOPLASTICS USING DROSOPHILA</p> <p>MD Zudaan, Karim Sandid and Prince N. Agbedanu</p> <p>Friends University **</p>
B5	<p>THE NITROUS OXIDE REDUCTASE OF NEISSERIA GONORRHOEAE IS A TRANSCRIPTIONALLY ACTIVE YET TRANSLATIONALLY SILENT POTOGENE</p> <p>Dr. Jack Bolton</p> <p>Sterling College</p>
B6	<p>SYNTHESIS OF IMINOSTILBENE DERIVATIVES VIA ELECTROPHILIC AROMATIC SUBSTITUTION</p> <p>Yesenia Arellano, Shi'Amber Boyer, et al.</p> <p>Friends University **</p>
B7	<p>SYNTHESIS OF DERIVATIVES OF IMINOSTILBENE AND CARBAMAZEPINE VIA ELECTROPHILIC ADDITION REACTIONS OF ALKENES</p> <p>Rayne Bossier, Wade Bright, et al.</p> <p>Friends University **</p>
B8	<p>SYNTHESIS OF NOVEL NNSN MOLECULES WITH EDARAVONE DERIVATIVES</p> <p>Jocelyn Cardona and Lucero Cuevas</p> <p>Friends University</p>
B9	<p>CATION INTERACTION WITH ACETYLCHOLINESTERASE</p> <p>Dylan Price and Dr. Jackie Dillon</p> <p>Baker University</p>
B10	<p>SYNTHESIS OF PORPHYRINS WITH β-AZO LINKAGE TO OTHER CONJUGATED SYSTEMS</p> <p>Elizabeth Shanafelt, Price Kramer, and Sam Leung</p> <p>Washburn University</p>
C1	<p>BROWN RECLUSE SPIDER IN RURAL KANSAS PUBLIC BUILDINGS</p> <p>Karlee Jacobs, and Wai-Foong Hong</p> <p>Sterling College</p>
C2	<p>FEMALE <i>DROSOPHILA. SUZUKII</i> DO NOT FIGHT OVER FOOD</p> <p>Kiley Peterson, Jacob Shipman, and Jennifer M. Gleason,</p> <p>University of Kansas **</p>

C3	<p>ADVANCING THE USE OF EDNA TO MONITOR PLANT-POLLINATOR COMMUNITIES</p> <p>Anna Hovious, Laura Budke, Nadia Valdez Saravia, Rachel Bowes, and Rebar, Darren</p> <p>Emporia State University **</p>
C4	<p>UPDATES TO GEOGRAPHIC DISTRIBUTION OF MEDICALLY IMPORTANT TICKS IN KANSAS: RESULTS FROM THE FIRST YEAR OF SURVEILLANCE ACTIVITY BY A NEW STATE PROGRAM</p> <p>Elizabeth Smith, PhD; Stephanie E Lindemann, MPH; and Erin M Petro, DVM, MPH</p> <p>Kansas Department of Health and Environment</p>
C5	<p>RECONSTRUCTING THE EVOLUTIONARY HISTORY OF A NEOTROPICAL AQUATIC BEETLE SPECIES COMPLEX USING PHYLOGENOMIC INFERENCE METHODS</p> <p>Liam Wrixon¹, Stephen Baca²</p> <p>¹Haskell Indian Nations University, ²University of Kansas **</p>
C6	<p>REVIEW OF <i>LYCHNOCOLAX</i> (STREPSIPTERA: LYCHNOCOLACIDAE) WITH DESCRIPTIONS OF TWO NEW SPECIES</p> <p>Wyatt J. Zabinski¹ and Jerry L. Cook²</p> <p>¹University of Kansas, ²Sam Houston State University</p>
C7	<p>ANTENNAE UP! CAN NITROGEN ADDITION HELP REVERSE INSECT HERBIVORE DECLINES?</p> <p>Virginia Disbro, Sydney Downey, Melissa Hernandez, Leónidas S. Reyes, and M. L. Jameson</p> <p>Wichita State University Dept. of Biology **</p>
C8	<p>STOMATAL ARCHITECTURE AND GAS EXCHANGE IN A DOMINANT PRAIRIE GRASS <i>ANDROPOGON GERARDI</i>: INTRASPECIFIC VARIATIONS OF POPULATIONS AND ADAPTIVE RESPONSES TO DROUGHT</p> <p>Allison Ricker, Jack Sytsma, Helen Winters, Ryann Patterson, Kian Fogarty, and Loretta Johnson</p> <p>Kansas State University</p>
C9	<p>THE EFFECT OF <i>BACILLUS AMYLOLIQUEFACIENS</i> (AW) AND <i>BACILLUS MOJAVENSIS</i> (BM) ON GERMINATION RATE AND EARLY GROWTH ON CORN AND SOYBEAN</p> <p>Gracie Kirchhoff and Wai-Foong Hong</p> <p>Sterling College</p>

D1	<p>VALIDATION OF A PROTEOLIPOSOME γ-SECRETASE ASSAY TO INVESTIGATE THE LIPID MEMBRANE'S EFFECT ON γ-SECRETASE FUNCTION</p> <p>Tristan Sprague¹ and Michael Wolfe²</p> <p>¹Department of Molecular Biosciences, The University of Kansas, Lawrence, KS, USA; ²Department of Medicinal Chemistry, The University of Kansas, Lawrence, KS, USA **</p>
D2	<p>ROUND GOBY DIET RELATIVE TO REPRODUCTIVE AND ENVIRONMENTAL FACTORS AROUND BEAVER ISLAND, MICHIGAN</p> <p>Annika Fagerstrom, Talia Mayo, Peyton Schuring, and Kevin Pangle</p> <p>Friends University STEM Division **</p>
D3	<p>COMMON GARDEN STUDY OF LOCAL ADAPTATION IN A DOMINANT PRAIRIE GRASS: CHARACTERIZING CLIMATE ADAPTATION FOR CONSERVATION AND RESTORATION</p> <p>Helen Winters¹ and Ryann Patterson¹, Jack Sytsma¹, Makay Davis¹, Adam Smith², and Loretta Johnson¹</p> <p>¹Kansas State University; ²Missouri Botanical Garden</p>
D4	<p>PERENNIAL GRASS ECOTYPE RESPONSE TO LOCAL AND NON-LOCAL MICROBIAL INOCULUM REFLECTED IN VARIATION IN PHENOTYPE AND GENE EXPRESSION</p> <p>Kian Fogarty, Eli Hartung, et al.</p> <p>Kansas State University</p>
D5	<p>THE EFFECTS OF SOCIAL EXPERIENCE ON AGGRESSION AND COURTSHIP BEHAVIOR IN MALE-MALE INTERACTIONS</p> <p>Jacob McGehee, Oluwafifeyemi Babatope-Ojo, and Jennifer M. Gleason</p> <p>Department of Ecology and Evolutionary Biology, University of Kansas</p>
D6	<p>ENVIRONMENTAL RESTORATION IN ZOO LANDSCAPES: ENHANCING EXHIBITS WITH NATIVE PLANTS</p> <p>Michael Conroy and Patrick Mathews</p> <p>Friends University **</p>
D7	<p>FROM CAVES TO CROPS: BRAZILIAN FREE-TAILED BATS IN KANSAS</p> <p>Patrick Geyer and Lorelei Patrick</p> <p>Fort Hays State University</p>
D8	<p>EFFECT OF <i>BACILLUS AMYLOLIQUEFACIENS</i> (AF AND AW) AND <i>BACILLUS MOJAVENSIS</i> (BM) ON PLANT FUNGAL PATHOGENS</p> <p>Phoebi Waller and Wai-Foong Hong</p> <p>Sterling College</p>

D9	<p>STUDYING MODERN BEACH SEDIMENTS FROM LAKE SUPERIOR: GRAIN SIZE, SORTING, AND MINERALOGY</p> <p>Xayden Cromedy, Diana Ortega-Ariza, and Justin M. Fairchild</p> <p>University of Kansas</p>
D10	<p>EVALUATION OF HOW THE DEPTH AT WHICH AN ORGANISM IS BURIED AFFECTS ITS DECOMPOSITION RATE.</p> <p>Rodell Jones</p> <p>Tabor College</p>
D11	<p>BIVALVES IN THE CITY: A RESEARCH STUDY OF FRESHWATER BIVALVES IN COWSKIN CREEK IN WICHITA KANSAS</p> <p>Emma Bloemhof, Matthew Bryant, et al.</p> <p>Friends University **</p>
D12	<p>DISTRIBUTION AND HABITAT PREFERENCES OF THE LONGNOSE GAR IN THE UPPER ARKANSAS RIVER.</p> <p>J. Godina, and J.M. Conard</p> <p>Sterling College Natural Science Department</p>
D13	<p>USE OF TEMPERATURE DATA LOGGERS IN ASSESSING NEST SURVIVAL FOR A GRASSLAND-NESTING BIRD</p> <p>Sarah Biesemier, William E. Jensen, Greg Houseman, and Evalynn Trumbo</p> <p>Emporia State University **</p>
D14	<p>AVIAN ABUNDANCE AND SEASONAL DYNAMICS OF THE MARION COUNTY RESERVOIR</p> <p>Allison Wiens</p> <p>Tabor College</p>