



## 2018 ACES Family Academies Educational Sessions

ACES Family Academies offer a variety of activities that give youth a glimpse into a college classroom setting. Participating departments from the College of ACES facilitate the classes.

The list of classes and their descriptions are grouped by department. During registration, you will select which classes you would like to attend by session. While we make every effort to enroll families in students' preferred classes, classes have maximum capacities and requirements that will have to be considered. Enrollment in specific classes cannot be guaranteed, and alternative classes will be assigned if all of your student's preferred classes are full by the time you register.

Enrollment is on a first-come, first-served basis by family, not by the individual student. Families are expected to attend classes as a family unit. We will notify you of your schedule prior to attending ACES Family Academies.

### Tips for Selecting Classes

Remember that the College of ACES is educationally diverse; a variety of classes are offered during ACES Family Academies. Students who choose a diverse set of preferred classes have a better chance of getting into the classes they desire and will get a broader outlook of the possibilities in ACES for their future.

***Classes marked with an asterisk (\*) will be offered during two time slots.***

#### **Department of Agricultural and Consumer Economics**

##### **Maybe Money Can Grow (Not on Trees)**

Learn how quickly your money can grow when you start saving! Paint piggy banks, discuss simple financial planning principles, and gain understanding of programs of study in the Department of Agricultural and Consumer Economics.

##### **Tragedy of the Commons: Goldfish Cracker Edition**

The tragedy of the commons is a theory of a situation within a community where individuals acting according to their own self-interest hurt the community by depleting a shared resource. Will your team fare better? Join us for a snack and some economics!

#### **What Goes on the Your Plate? Food Around the World**

What does a typical family eat for dinner in Zambia? We'll investigate what goes on the dinner plate for many cultures, from Africa to Central America to the United States. Contrast your typical meals with those of other kids around the world.

**Department of Agricultural and Biological Engineering**

**Fun with LEGO Mindstorms Robots! \***

Learn how to program LEGO Mindstorms robots and work with them to complete different challenges. Program your robot to pick up various objects and avoid obstacles in its path. No previous experience is necessary.

**Virtual Reality with Google Expeditions\***

You will take a virtual tour of different environment using Google Expeditions. In addition, you will learn how you can use your own phones to access Virtual content including videos and experiences.

**Department of Animal Sciences**

**Humane Investigator**

Join us for a session all about humane investigation. Our instructor will talk all about what it is like to be a human investigator.

**Where's the Beef?: Getting to Know Cows Inside and Out \***

Join us at the University of Illinois Beef Research Center for a tour and the opportunity to learn more about beef cattle. Stick your arm in a cow, and discover all of the cool things we do at our research center to advance the beef industry!

**Dog Training & Agility**

Do you love dogs? If so, join us for a session where you can discover some of the secrets of man's best friend. Spend time learning about dog behavior, training tips, and humane education.

**The Secrets of Sausage \***

Explore the yummy herbs and spices that make sausage so delicious. You will make your own secret recipe and compete against the class to determine who is the best sausage maker.

**Small Critter Care**

Join us to learn all about small critters and special care they take when we keep them as pets. Be prepared to see, touch and hold as you learn about the awesome creatures.

**Agricultural Education Program**

**Restaurant 101: Make it, Take it, Teach it!\***

Go behind the scenes of restaurants to experience what it takes to prepare safe and delicious food in a beautiful setting. The session will include hands-on activities in areas like recipe development, food safety, and garnishing, and you'll have a chance to teach what you've learned!

**Department of Crop Sciences**

**Paper Airplanes and Drones in Ag \***

Small unmanned aerial vehicles (UAV's) may change the way farmers monitor their crops. Learn about ACES research using UAVs for monitoring crops, and get up close with several UAVs. Discover how you can turn a paper airplane into a tiny smartphone-controlled UAV.

**Designing Crops of the Future\***

Making crop plants of the future requires sophisticated molecular biology, cutting edge technology, and in-field testing. Learn about how ACES researchers are studying crop efficient and productivity with hands-on activities and demonstrations at a research field site.

**Eating Dirt\***

Learn about soil, soil profiles, and why soil is so important in our world. We will build our own soil profiles that can be eaten!

### **Container Gardens for Pollinators\***

What are pollinators and why are they so important? Can container gardens be both beautiful and provide food for humans and pollinators? Learn plant and pollinator names and build your own garden to take home.

### **Department of Food Science and Human Nutrition**

#### **4-H Food Challenge \***

Are you up for the challenge? Working as a team, use "mystery ingredients" to develop the most delicious and nutritious dish.... in 30 minutes! Learn about food nutrition, safety, and preparation as you create your edible masterpiece. Finish by presenting your dish to a panel of judges to determine the winner!

#### **For the Love of Food! An introduction to the Science of the Foods We Eat**

George Bernard Shaw said "There is no sincerer love than the love of food." This course will introduce you to the chemical, microbiological, physical, and sensorial exploration of food - in particular, chocolate chip cookies. Explore the science, and stay for the home-baked goodness!

### **Department of Human and Community Development**

#### **From Virtual Reality to Chutes and Ladders: Video Games vs. Board Games—How We Learn Through Play\***

Fun for gaming novices and experts alike! Play video and virtual reality games as well as board games, and we'll discuss advantages of both types of game for cognitive learning, motor skills, social skills, and more.

### **Department of Natural Resources and Environmental Sciences**

#### **“Bird’s the Word”: Exploring Avian Ecology and Conservation**

This outdoor session will introduce you to the natural history of birds and research techniques used to protect wild bird populations. Get up close and personal looks at wild birds with mist-netting and banding demonstrations.

### **University of Illinois Extension**

#### **Building a Better Brain\***

Do you know what it takes to build a healthy brain? Life experiences play a huge role in how the brain develops. Come play the Brain Architecture Game and learn about brain development and what you can do to have a better brain!

#### **Monarch on the Move Challenge\***

Monarchs represent fauna and flora that contribute to the health of our planet, such as pollinators, wildlife and native plants - collectively called biodiversity. Engage in a model that simulates caterpillar need, biological challenges and ways to support Monarch habitat.