



2024 Discover the Scientist Within

Monday, April 22
8:00 am - 12:00 pm

Come to explore the exciting science happening at the University! There will be multiple activities for students to engage with throughout the morning. Stay in the North Star Ballroom to examine the bug room, try out hosting a podcast, and complete nature-themed art. Meet in the Ballroom to join a tour of the field plants and pilot plant, participate in a demonstration to stop fertilizer leakage or use a dissection microscope – and more! Sign up for tours at [this link](#). Space is limited.

If you are NOT interested in any of the tours, but would like to go to the North Star Ballroom to interact with the displays, just show up the day of! There is no need to register.

Hands-on activities and displays in the North Star Ballroom

Commodity Training: Experience the Trading Floor

Learn about the role of commodity traders and play Pit, a fast-paced card game. Experience the excitement of open outcry bidding simulation, gaining practical insights into commodities trading in a fun and interactive way. Sign up to play Pit using the [tour link](#)!

Presented by Edward Usset, Grain Marketing Economist for the Center for Farm Financial Management and Applied Economics students

Explore the Bed Bug Room!

Why are bed bugs so hard to control? Can you find them in this room? Learn about the complexity of how bed bugs communicate with each other and use it to their advantage!

Presented by Stephen Kells, Department of Entomology

Button Making!

Choose from pre-created CFANS templates or design your own button to showcase your agricultural and natural resource pride. Unleash your creativity and wear your CFANS spirit with a personalized touch!

Enteric Methane: Degassing cow burps

Come evaluate different types of cow feed that impact the amount of methane a cow burps.

Researchers are evaluating different types of plant extracts that can be added to cow feed that reduce the production of enteric methane.

Presented by Deborah Heuschele, Department of Agronomy and Plant Genetics / USDA

Flocculants: Making Water Clear

It looks like magic, but it's science! This hands-on activity will demonstrate how flocculants are used to speed up the rate at which dirt falls out of water.

Presented by Rebecca Forman, Bioproducts and Biosystems Engineering, Erosion and Stormwater Management Certification Program

Explore Podcasting with AgriCast

Put on a pair of headphones, talk into the microphone, and experience what it is like to host a podcast! Check out our library of videos, podcasts, and virtual field trips produced by CFANS students.

Presented by Dr. Troy McKay, Agricultural Education, Communication & Marketing program, and Greta Tank, AgriCast Outreach Coordinator

Bell Museum: Connection between art, nature & science

Take a moment to observe and engage with nature through hands-on activities featuring art and wildlife specimens.

Presented by Nehwoen Luogon-Bojkov, Bell Museum, and Alyssa Gregory, Bell Museum

Bug Appétit! Why eat bugs? Why not?

While you and some others think of insects as creepy crawly and yukky, they are good, nutritious sources of food for humans, delicious food too! They are rich in proteins and don't produce a lot of greenhouse gasses, and thus benefit the environment too! Food items made with insects will be available to taste. Stop by and check them out.

Presented by Dr. Sujaya Rao, Department of Entomology

What Minnesota Plant Disease Are You?

Did you know that plants can get sick, too? Learn about what plant diseases can commonly be found in Minnesota and what we can do to help stop their destruction.

Presented by Becca Hall, Department of Plant Pathology

Fruity Finds: Extracting DNA from Common Fruits

Extract DNA from everyday fruits such as strawberries, bananas, and grapes. We'll use household items to create the perfect chemical components for extracting and visualizing DNA -- yes, you'll even get to see it with your own eyes!

Presented by Zoe Hansen, Empowering Women in Science; Plant Pathology

Hunger Fighters Unite! Feeding the Future

The Minnesota Youth Institute (MNYI) challenges high school students to solve local and global food security issues by connecting science, economics, agriculture, social justice, and more. MNYI is an interactive half-day program hosted on the St. Paul campus of the University of Minnesota-Twin Cities. High school students from across the state will participate in immersive experiences while having the opportunity to network with research and industry leaders and gain hands-on exposure in a variety of fields. Participation earns eligibility for a \$1,000 scholarship, domestic & international internships, and more!

Presented by Priscilla Trinh and the Minnesota Youth Institute

Learn about sorority and fraternity life on the St. Paul campus

[Alpha Gamma Rho](#)

[Beta of Clovia Sorority](#)

[Delta Theta Sigma Fraternity](#)

[FarmHouse Fraternity](#)

[Lambda Delta Phi Sorority](#)

Sensory Explosion: How we experience food

Activities and samples that show participants how our various senses help us experience food.

Taste, see, touch, and smell samples in an interactive adventure.

Presented by Drew Carter and the Department of Food Science and Nutrition

Sustainable Crops: The Future of Agriculture

Learn about the development of sustainable crops and enjoy a kernza cookie!

Presented by the Sustainable Plant Systems Club

Exploring Minnesota Viticulture

Learn about growing grapes in Minnesota! Check out some grape seedlings, try your hand at smelling common flaws we see in wine, and learn about the grape breeding program at UMN. Presented by Natalie Slinger, Plant Science, Sustainable Agriculture and Food Systems.

Pre-Bioproducts and Biosystems Engineering

Discover the future of materials at the BBE table! Join us for an interactive experience where we test the strength of plastics—comparing traditional versus bio-made options. Additionally, indulge your taste buds in a kombucha-tasting session. BBE invites you to explore innovation, sustainability, and flavor in this engaging showcase!

Building a Balanced Plate with SOND

Fueling our bodies well is one of the best ways to fuel our brains! Work with nutrition students to learn how to incorporate foods you enjoy into a balanced meal to fuel yourself for success. Presented by the Student Organization of Nutrition and Dietetics (SOND)

Test a Compostable Bag for Elongation

Students will compare a shopping bag to a compostable bag for strengths and elongation. They put the samples of a tensile tester and measure the elongation. Presented by Koray Sekeroglu and the Bioproducts and Biosystems Engineering department

Hands on activities around campus

Note that FFA members may sign up for activities in advance at [this link](#) or sign up on site. Those who sign up in advance will be given priority. All activities will start from the North Star Ballroom.

Biofuels and Bioproducts (8:45am)

We will demonstrate the reaction of making biodiesel from soybean oil. We will show the different combustion properties of biodiesel, petroleum-based diesel, and soybean oil. Next, the students will have the opportunity to make biobased plastic. Presented by Dr. Ulrike Tschirner, Department of Bioproducts and Biosystems Engineering

A Tour of Food Technology (9:00am)

Participants will get to tour the UMN pilot plant, where they'll see first-hand how food is made. They'll also get to sample award-winning dairy and meat products made in the facility. Presented by the Department of Food Science and Nutrition

New Crops to Clean our Drinking Water (10:30am)

Did you know that fertilizers and pesticides can leak from farm fields into the groundwater, which is where we get our drinking water? The University of MN is developing new crops that reduce fertilizer leakage. In this activity you will use equipment to collect water samples from experiments with new crops in the research fields. Presented by Dr. Jake Jungers, Department of Agronomy and Plant Genetics, Field Plts

Tree Cores: The Stories Trees Tell (11:15am)

Tree cores can provide a huge amount of knowledge about how a tree is living. We'll look at the different steps to core a tree (with the option to demo it yourself), what happens after a tree is cored, and how we're using open source software to measure trees. Presented by Marcella Windmuller-Campione and the Department of Forest Resources

Tours

Note that FFA members may sign up for tours in advance at [this link](#) or sign up on site. Those who sign up in advance will be given priority. All tours will leave from the North Star Ballroom.

CBS Conservatory Tour (9:00am, 10:00am)

Explore plant biodiversity through the Conservatory's four biomes - temperate, tropical, Mediterranean and arid biomes. The living collection is among the most diverse in the Upper Midwest with more than 1,600 unique taxa.
Plant Growth Facility, St. Paul Campus

St. Paul Campus Tours (9:30am, 10:30am)

Sign up for this tour to learn about the University of Minnesota's St. Paul Campus and all that it has to offer. Visit classrooms, the Beef Barn, Display Garden, Plath Growth Facility, the St. Paul Gym and more. Presented by the CFANS Ambassadors

St. Paul Campus Sorority and Fraternity House Tours (10:00am)

Learn about the St. Paul Fraternities and Sororities off campus. The tour will be starting at Farmhouse Fraternity and will go to Delta Theta Sigma, Lambda Delta Phi, Beta of Clovia, and end at Alpha Gamma Rho. Tour the outside and inside of the houses and meet members of each chapter. This tour will provide insight to the community that surrounds the University of Minnesota's - St. Paul Campus.