Middle Tennessee State University’s Agribusiness and Agriscience program provides students with the knowledge and practices of a modern agricultural industry. Today, agriculture has expanded from managing a farm or ranch to opportunities in sales, research, quality assurance, marketing, engineering, food safety, law, banking, public health, energy development, and much more. MTSU faculty help prepare the students for a successful career in the agriculture industry.

Majors:
- **Agribusiness**: designed for students who are interested primarily in the business phases of agriculture.
- **Animal Science**: designed to offer preparation for careers in livestock and related industries, with opportunities to pursue industry, equine, or pre-veterinary medicine studies.
- **Plant and Soil Science**: designed for students interested in agronomy, horticulture, and/or soil sciences.
- An **Agricultural Education Certificate** is available for students seeking to teach agriculture in secondary schools (grades 7-12).
- A **minor in Agriculture** is available.
Agribusiness

A degree in Agribusiness will prepare you for an exciting career both on the farm and beyond. After graduation you may find yourself managing a cooperative, selling feed, fertilizer and seed to farmers, or working as a loan officer for a bank. You may even become a commodity broker or a lobbyist or manage a massive grain elevator.

Agribusiness students will learn about management, marketing, finance, futures markets, agricultural policy, and international trade. Students have the option to take classes in the Geoscience and Aerospace Departments, preparing them to do cutting-edge work in precision agriculture.

If you want to manage your family’s farm, explore value-added agriculture, become an entrepreneur, or work for one of the thousands of companies that sell to or buy from farms, then Agribusiness may be the best degree choice for you. A major in Agribusiness provides a strong foundation that will lead to a flexible career in a variety of environments.

Companies and agencies that recruit and hire Agribusiness graduates include: Archer Daniels Midland, Bunge, EFC Systems, Farm Credit of Mid-America, Monsanto, Pioneer Seed, Tennessee Farm Bureau, Tennessee Farmer’s Cooperative, Tractor Supply Co., Tyson, U.S. Department of Agriculture, and many more.
Animal Science

Animal Science explores the science, performance, and business of domestic food, fiber, and companion animal species, including beef cattle, dairy cattle, sheep, horses, goats, poultry, and companion animals. An Animal Science student will study such disciplines as nutrition, reproduction, genetics, behavior, meat science, health management, and biotechnology.

A degree in Animal Science affords students a wide array of career opportunities after graduation, or helps prepare them for continued study beyond the undergraduate level, including graduate-degree programs (M.S., Ph.D.) or professional programs in veterinary medicine (D.V.M.).

Some career opportunities with a degree in Animal Science from MTSU might include: animal feed manufacturer, animal health technician, animal laboratory technician, animal nutrition salesperson, animal product processing supervisor, animal shelter manager, cancer performance trainer, county extension agent, government regulatory specialist, livestock journalist, livestock marketer, livestock production manager, poultry production technician, pharmaceutical salesperson, quality assurance manager, veterinary technician, vocational agriculture teacher, wildlife technician, and zookeeper.

The School of Agribusiness and Agriscience (ABAS) at MTSU offers two paths of study for students interested in Animal Science. The industry pathway is designed for those students who desire to earn a Bachelor of Science degree and then pursue a career in Animal Science after graduation. A pre-veterinary medicine track is designed for those students interested in pursuing admission to a college of veterinary medicine or an advance degree program in animal science.

At MTSU we understand the importance of experiential (hands-on) learning. As an Animal Science student at MTSU, you will have the opportunity to “learn by doing” at our MTSU Farm Laboratories, and Horse Science Center, where we maintain herds of beef cattle, swine, dairy cattle, and horses to be used by our students.
Horse Science Center: Our state-of-the-art facility is home to our lesson horses, breeding herd, 60 stalls, equine clinic and reproduction laboratory, indoor and outdoor teaching arenas, jump course, and five internationally ranked Horse Science faculty who are available to you daily. The Horse Science Center shares 154 acres with the Tennessee Miller Coliseum, a $21 million, 220,000-square-foot venue for local, state, regional, national, and international equine events.

Master of Science in Horse Science: The MTSU Horse Science program offers a Master of Science in Horse Science, with concentrations in Equine Physiology, Equine Industry Management, or Equine Education that includes a thesis project. Equine Physiology offers students preparation for admission into a Ph.D program after graduation. Equine Industry Management students complete interdisciplinary courses in business, marketing, and sports management to tailor their curriculum for specific horse industry-related careers. Equine Education students take interdisciplinary courses in coaching and sports management to support them as collegiate riding instructors, equestrian team coaches, horse judging team coaches, or agents for the cooperative extension service. Whether pursuing an undergraduate Bachelor of Science or graduate Master of Science in Horse Science, our students receive training to find their niche in the multibillion dollar horse industry. A list of horse-related careers are available on our website, [http://www.mtsu.edu/programs/horse-science/](http://www.mtsu.edu/programs/horse-science/). Like us on Facebook to keep up with our latest events: [http://www.facebook.com/horsescience](http://www.facebook.com/horsescience).

Horse Science: The MTSU Horse Science program provides a comprehensive undergraduate horse science education, including horse care, four levels of horsemanship equitation (hunter seat and western), horse judging, behavior and training, techniques of teaching horsemanship, equine health, stable management, event and facility management, equine assisted therapy, horse genetics, equine nutrition, equine reproductive physiology, and equine exercise physiology. Students earn a Bachelor of Science in Animal Science with a concentration in Horse Science. While most Horse Science students pursue a career in the horse industry after graduation, a few complete pre-veterinary medicine requirements and seek admission into a college of veterinary medicine.

Horse Science students may compete at the collegiate level in our nationally recognized teams: the MTSU Equestrian Team, the MTSU Stock Horse Team, and the MTSU Horse Judging Team. All levels are welcome, from beginner to world champion we’ll teach you, one stride at a time.

Whether pursuing an undergraduate Bachelor of Science or graduate Master of Science in Horse Science, our students receive training to find their niche in the multibillion dollar horse industry. A list of horse-related careers are available on our website, [http://www.mtsu.edu/programs/horse-science/](http://www.mtsu.edu/programs/horse-science/). Like us on Facebook to keep up with our latest events: [http://www.facebook.com/horsescience](http://www.facebook.com/horsescience).
Plant and Soil Science

The Plant and Soil Science major in the School of Agribusiness and Agriscience offers students the opportunity to gain knowledge and experience in soil and water conservation, horticulture, and agronomy. The degree allows students to focus their coursework in the plant or soil area that interests them. The experiential farm laboratory and greenhouse facilities are available for conducting faculty-directed field and greenhouse trials, teaching farm operations, and hosting outreach activities. A soil scientist, a horticulturist, and an agronomist are among the ABAS faculty. Their expertise and instruction offer students a wide range of learning opportunities. ABAS offers new educational opportunities in Unmanned Aerial Systems controlling, application, and remote sensing.

Plant and Soil Science majors have worked as interns with Cheekwood Botanical Garden, Gaylord Opryland Resort, the National Park Service, Natural Resources Conservation Service (NRCS), and Tennessee Farmer’s Cooperative. Because of their intern experiences and academic record, over two dozen students are now working as soil conservationists, park rangers, extension agents for state and federal agencies. Former students with soil and geology emphasis are private soil consultants working through the Tennessee Department of Environment and Conservation. Horticultural internship possibilities include work with vegetable and fruit production, public gardens, and landscaping firms. Graduates have gone to work as extension horticulturists, nursery managers, head propagators, landscapers, and other careers in the green industry.
MTSU faculty and students are active in research involving livestock management, row and forage crop production, dairy production, milk processing and marketing, and horticulture and garden production. We are a “grass to glass” operation where students feed the cows, milk the cows, pick up and haul the milk, process the milk, and deliver it to campus for other students to consume.

Undergraduate students are encouraged to use the Farm Laboratories in their undergraduate research. We think of our students as the future of modern agriculture. Through experiential learning in modern facilities, they have the opportunity to develop an excellent work ethic, attention to detail, knowledge of sanitary and regulatory practices, and systematic approaches to manufacturing milk products, breeding and raising beef cattle and swine, growing feed crops to support other ABAS units, and maintaining a robust garden.

MTSU Farm Laboratories provide the hands-on element of the School of Agribusiness and Agriscience. Students farm 750 acres including a state-of-the-art dairy and milk processing plant, two beef herds, and a famous-to-finish swine operation. We raise several crops such as corn, soybeans, and hemp, plus have a student garden, greenhouses and a student farmers market. The Farm Labs exist to complement and enhance classroom training to make for a complete undergraduate education, helping prepare students for successful careers in agriculture and science. The ABAS program’s goal is to turn students into workforce/career-ready graduates.

Farm Laboratories
MTSU Farm Laboratories provide the hands-on element of the School of Agribusiness and Agriscience. Students farm 750 acres including a state-of-the-art dairy and milk processing plant, two beef herds, and a famous-to-finish swine operation. We raise several crops such as corn, soybeans, and hemp, plus have a student garden, greenhouses and a student farmers market. The Farm Labs exist to complement and enhance classroom training to make for a complete undergraduate education, helping prepare students for successful careers in agriculture and science. The ABAS program’s goal is to turn students into workforce/career-ready graduates.

Experiential Learning and Research Center (ELRC)
The Experiential Learning and Research Center on Guy James Road is the newest of the Farm Laboratories. With 435 acres of pristine Tennessee rolling-hill farm country, the center includes a $2.7 million state-of-the-art dairy, a registered Angus herd, student gardens that include horticulture hoop houses, and an apiary. The dairy was completed in September 2011 as a part of a $4.4 million farm improvement project.
Study Abroad

Study abroad as a component of education in agriculture has fully taken root at MTSU. Our program continues to grow and expand to places all over the world. The importing and exporting of food products is a multi-billion dollar business. Agribusiness students have the opportunity to travel abroad and study this business firsthand. Students have traveled to Honduras, Argentina, Canada, France, Belgium, Holland, Germany, and Italy.

For students interested in the equine industry and would like to study abroad, MTSU provides students the opportunity to travel to places such as Ireland, Sweden, Denmark, and Great Britain.

photo courtesy of Federico Garcia
Organizations

- **Student Agriculture Government Association:** Membership consists of two elected class representatives and the president; plus a representative from each of the student organizations. Serves as a liaison between students and faculty. Plans and conducts the annual Agricultural Awards Banquet.

- **Alpha Gamma Rho:** A social-professional fraternity. Recognizes the annual outstanding Agriculture teacher at MTSU. Sponsors scholarship programs.

- **Block and Bridle Club:** Open to any college student with an interest in agricultural animals. Hosts several activities at the Tennessee Livestock Center. Supports travel and activities of the Livestock Judging Team and Academic Quadrathlon team. Hosts the Preview Steer and Heifer Show. Active at the national level.

- **Dairy Science Club:** Activities are designed to help students become involved in the dairy industry. Conducts dairy farm and milk processing tours. Supports travel and activities of the MTSU Diary Product Judging Team.

- **Delta Tau Alpha Honor Society:** An honorary student organization. Conducts student recruitment programs in high schools. Honors outstanding freshmen. Promotes the School of Agribusiness and Agriscience. Sponsors a needy child at Christmas. Active at the national level.

- **Collegiate FFA:** Assists in conducting clinics and workshops for agricultural education teachers. Works closely with local high school agricultural education programs. Assists in many high school FFA leadership and skill activities.

- **Horseman’s Association:** Conducts programs for students interested in horse science. Supports MTSU’s Equestrian Team and Horse Judging Team.

- **Plant and Soil Science Club:** Schedules speakers who relate to career areas in plant and soil science. Promotes plant and soil science activities.

- **Pre-Veterinary Society:** A professional organization for students interested in veterinary medicine and planning to pursue admission to a college of veterinary medicine. Active in community outreach and service to the veterinary profession in Middle Tennessee.

- **Sigma Alpha:** Departmental professional sorority for students majoring in Agribusiness and Agriscience areas.
Extracurricular activities
• Academic Quadrathlon Team
• Dairy Product Judging Team
• Equestrian Team
• Horse Judging Team
• Livestock Judging Team
• Soil Judging Team
• Horticulture Commodities Judging Team
• Research Poster Presentations

Scholarships, Awards, and Honors
• The School of Agribusiness and Agriscience awards nearly $50,000 in scholarships to agriculture majors annually.
• Scholarships in the School of Agribusiness and Agriscience are available to students majoring in some phase of agriculture. Scholarships are awarded on the basis of specific requirements of the donor, academic performance (grade point average), financial need, and student involvement in extracurricular activities.
• Students routinely perform well above the national average in the national agriculture achievement exams.
• Nationally ranked Horse Judging, Equestrian and Dairy Products Judging teams.
• One of the top Agricultural Education programs in the Southeast.
• To apply online for freshman, sophomore, junior, and senior scholarships, visit our web page at www.mtsu.edu/abas/scholarships.php.