AGRICULTURAL SCIENCE, B.S.

Begin Campus: Any Penn State Campus
End Campus: University Park

Degree Requirements
For the Bachelor of Science degree in Agricultural Science, a minimum of 123 credits is required:

<table>
<thead>
<tr>
<th>Requirement</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>General Education</td>
<td>45</td>
</tr>
<tr>
<td>Electives</td>
<td>6-26</td>
</tr>
<tr>
<td>Requirements for the Major</td>
<td>82-90</td>
</tr>
</tbody>
</table>

18-30 of the 45 credits for General Education are included in the Requirements for the Major. This includes: 0-3 credits of GA courses; 0-3 credits of GHW courses; 9 credits of GN courses; 0-6 credits of GS courses; 9 credits of GWS courses.

Requirements for the Major
To graduate, a student enrolled in the major must earn a grade of C or better in each course designated by the major as a C-required course, as specified by Senate Policy 82-44 (https://senate.psu.edu/policies-and-rules-for-undergraduate-students/82-00-and-83-00-degree-requirements/#82-44).

<table>
<thead>
<tr>
<th>Code</th>
<th>Title</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>AEE 360</td>
<td>Leadership Development for Small Groups</td>
<td>3</td>
</tr>
<tr>
<td>AEE 460</td>
<td>Foundations in Leadership Development</td>
<td>3</td>
</tr>
<tr>
<td>CAS 100</td>
<td>Effective Speech</td>
<td>3</td>
</tr>
<tr>
<td>ENGL 15</td>
<td>Rhetoric and Composition</td>
<td>3</td>
</tr>
<tr>
<td>AEE 330W</td>
<td>Communication in Agricultural and Natural Resource Careers</td>
<td>3</td>
</tr>
<tr>
<td>or AEE 440</td>
<td>Communication Methods and Media</td>
<td></td>
</tr>
<tr>
<td>CHEM 101</td>
<td>Introductory Chemistry</td>
<td>3</td>
</tr>
<tr>
<td>or CHEM 110</td>
<td>Chemical Principles I</td>
<td></td>
</tr>
<tr>
<td>ENGL 202C</td>
<td>Effective Writing: Technical Writing</td>
<td>3</td>
</tr>
<tr>
<td>or ENGL 202D</td>
<td>Effective Writing: Business Writing</td>
<td></td>
</tr>
<tr>
<td>Select one of the following options:</td>
<td>3-4</td>
<td></td>
</tr>
<tr>
<td>BIOL 11 &amp; BIOL 12</td>
<td>Introductory Biology I and Introductory Biology II</td>
<td></td>
</tr>
<tr>
<td>BIOL 110</td>
<td>Biology: Basic Concepts and Biodiversity</td>
<td></td>
</tr>
<tr>
<td>BISC 3</td>
<td>Environmental Science</td>
<td></td>
</tr>
<tr>
<td>Select 3-4 credits in Crop Management</td>
<td>3-4</td>
<td></td>
</tr>
<tr>
<td>Select 3 credits in any HORT except X95, X96</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>Select 3 credits in Agricultural Economics and Rural Sociology</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>Select 3 credits in International Agriculture of the following:</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>AEE 400</td>
<td>Global Agriculture Education</td>
<td></td>
</tr>
<tr>
<td>CED 450</td>
<td>International Development, Renewable Resources, and the Environment</td>
<td></td>
</tr>
</tbody>
</table>

AGECO 144 | Principles and Practices of Organic Agriculture | 3       |
AGECO 457 | Principles of Integrated Pest Management | 3       |
ANSC 207 | Animal Products Technology                |         |
& ANSC 208 | Animal Products Technology Laboratory |         |
ERM 210 | Environmental Factors and Their Effect on Your Food Supply | 3       |
FDSC 200 | Introductory Food Science                 |         |
PLANT 217 | Landscape Soil and Water Management      |         |
Select 6 credits in Natural Resources/Ecology of the following: | 6       |
AGECO 122 | Atmospheric Environment: Growing in the Wind |         |
AGECO 201 | Introductory Agroecology                 |         |
EGEE 101 | Energy and the Environment               |         |
FOR 470 | Watershed Management                     |         |
SOILS 71 | Environmental Sustainability             |         |
SOILS 101 | Introductory Soil Science                |         |
SOILS 412W | Soil Ecology                             |         |
WFS 209N | Wildlife and Fisheries Conservation      |         |
Select 3 credits in Agricultural and Environmental Policy of the following: | 3       |
AG 160 | Introduction into Ethics and Issues in Agriculture |         |
AGECO 134 |                                                  |         |
CED 201 | Introductory Environmental and Resource Economics |         |
FDSC 105 | Food Facts and Fads                      |         |

Supporting Courses and Related Areas
Select 9 credits in Agriculture | 9
Supporting Courses and Related Areas Courses: Require a grade of C or better
Select 18-21 credits for College of Agricultural Sciences Minor | 18-21

General Education
Connecting career and curiosity, the General Education curriculum provides the opportunity for students to acquire transferable skills necessary to be successful in the future and to thrive while living in interconnected contexts. General Education aids students in developing intellectual curiosity, a strengthened ability to think, and a deeper sense of aesthetic appreciation. These are requirements for all baccalaureate students and are often partially incorporated into the requirements of a program. For additional information, see the General Education
Requirements (https://bulletins.psu.edu/undergraduate/general-education/baccalaureate-degree-general-education-program/) section of the Bulletin and consult your academic adviser.

The keystone symbol appears next to the title of any course that is designated as a General Education course. Program requirements may also satisfy General Education requirements and vary for each program.

**Foundations** (grade of C or better is required and Inter-Domain courses do not meet this requirement.)
- Quantification (GQ): 6 credits
- Writing and Speaking (GWS): 9 credits

**Breadth in the Knowledge Domains** (Inter-Domain courses do not meet this requirement.)
- Arts (GA): 3 credits
- Health and Wellness (GHW): 3 credits
- Humanities (GH): 3 credits
- Social and Behavioral Sciences (GS): 3 credits
- Natural Sciences (GN): 3 credits

**Integrative Studies**
- Inter-Domain Courses (Inter-Domain): 6 credits

**Exploration**
- GN, may be completed with Inter-Domain courses: 3 credits
- GA, GH, GN, GS, Inter-Domain courses. This may include 3 credits of World Language course work beyond the 12th credit level or the requirements for the student’s degree program, whichever is higher: 6 credits

**University Degree Requirements**

**First Year Engagement**
All students enrolled in a college or the Division of Undergraduate Studies at University Park, and the World Campus are required to take 1 to 3 credits of the First-Year Seminar, as specified by their college First-Year Engagement Plan.

Other Penn State colleges and campuses may require the First-Year Seminar; colleges and campuses that do not require a First-Year Seminar provide students with a first-year engagement experience.

First-year baccalaureate students entering Penn State should consult their academic adviser for these requirements.

**Cultures Requirement**
6 credits are required and may satisfy other requirements
- United States Cultures: 3 credits
- International Cultures: 3 credits

**Writing Across the Curriculum**
3 credits required from the college of graduation and likely prescribed as part of major requirements.

**Total Minimum Credits**
A minimum of 120 degree credits must be earned for a baccalaureate degree. The requirements for some programs may exceed 120 credits. Students should consult with their college or department adviser for information on specific credit requirements.

**Quality of Work**
Candidates must complete the degree requirements for their major and earn at least a 2.00 grade-point average for all courses completed within their degree program.

**Limitations on Source and Time for Credit Acquisition**
The college dean or campus chancellor and program faculty may require up to 24 credits of course work in the major to be taken at the location or in the college or program where the degree is earned. Credit used toward degree programs may need to be earned from a particular source or within time constraints (see Senate Policy 83-80 (https://senate.psu.edu/policies-and-rules-for-undergraduate-students/82-00-and-83-00-degree-requirements/#83-80)). For more information, check the Suggested Academic Plan for your intended program.