Food Science

Department Information

· Department Web Site:

www.ag.ndsu.edu/plantsciences/ (http://www.ag.ndsu.edu/plantsciences/)

· Credential Offered:

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· Sample Program Guide:

catalog.ndsu.edu/programs-study/undergraduate/food-science/#planofstudytext (http://catalog.ndsu.edu/programs-study/undergraduate/food-science/#planofstudytext)

Major Requirements

Major: Food Science

Degree Type: B.S.

Minimum Degree Credits to Graduate: 120

University Degree Requirements

- 1. Satisfactory completion of all requirements of the curriculum in which one is enrolled.
- 2. Earn a minimum total of 120 credits in approved coursework. Some academic programs exceed this minimum.
- 3. Satisfactory completion of the general education requirements as specified by the university.
- 4. A minimum institutional GPA of 2.00 based on work taken at NDSU.
- 5. At least 30 credits must be NDSU resident credits. Resident credits include credits registered and paid for at NDSU.
- 6. At least 36 credits presented for graduation must be in courses numbered 300 or higher.
- 7. Students presenting transfer credit must meet the NDSU residence credits and the minimum upper level credit. Of the 30 credits earned in residence, a minimum of 15 semester credits must be in courses numbered 300 or above, and 15 semester credits must be in the student's curricula for their declared major.

For complete information, please refer to the Degree and Graduation Requirements (http://catalog.ndsu.edu/past-bulletin-archive/2023-24/academic-policies/undergraduate-policies/degree-and-graduation/) section of this Bulletin.

University General Education Requirements

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Code	Title	Credits
Communication (C)		12
ENGL 110	College Composition I	
ENGL 120	College Composition II	
COMM 110	Fundamentals of Public Speaking	
Upper Division Writing [†]		
Quantitative Reasoning (R) [†]		3
Science and Technology (S) [†]		10
Humanities and Fine Arts (A) †		6
Social and Behavioral Sciences (B) [†]		6
Wellness (W) [†]		2
Cultural Diversity (D) *†		
Global Perspectives (G) *†		
Total Credits		39

May be satisfied by completing courses in another General Education category.

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General education courses may be used to satisfy requirements for both general education and the major, minor, and program emphases, where applicable. Students should carefully review major requirements to determine if specific courses can also satisfy these general education categories.

2 Food Science

• A list of university approved general education courses and administrative policies are available here (http://catalog.ndsu.edu/past-bulletin-archive/2023-24/academic-policies/undergraduate-policies/general-education/#genedcoursestext).

Major Requirements

Code	Title	Credits
Required Core Courses for F	ood Science	
PLSC 189	Skills for Academic Success	1
ANSC 340	Principles of Meat Science	3
CFS 210	Introduction to Food Science and Technology	3
CFS 370	Food Processing I	3
CFS 430	Food Unit Operations	3
CFS 450	Cereal Technology	3
CFS 452	Food Laws and Regulations	3
MICR 453	Food Microbiology	3
CFS 460	Food Chemistry	3
CFS 461	Food Chemistry Laboratory	1
CFS 464	Food Analysis	3
CFS 470	Food Processing II	3
CFS 471	Food Processing Laboratory	1
CFS 473	Food Safety	3
CFS 474	Sensory Science of Foods	3
CFS 480	Food Product Development (Capstone)	3
Select one of the following:		3-4
BIOC 260	Elements of Biochemistry	
BIOC 460	Foundations of Biochemistry and Molecular Biology I	
& 460L	and Foundations of Biochemistry I Laboratory	
BIOL 150	General Biology I	3
BIOL 151	General Biology II	3
CHEM 121	General Chemistry I charatary (May estiafy general education estagery S)	4
& 121L	and General Chemistry I Laboratory (May satisfy general education category S)	4
CHEM 122 & 122L	General Chemistry II and General Chemistry II Laboratory (May satisfy general education category S)	4
CHEM 341	Organic Chemistry I	4
& 341L	and Organic Chemistry I Laboratory	
CSCI 114	Computer Applications (May satisfy general education category S)	3
or TL 116	Business Software Applications	
ECON 201	Principles of Microeconomics (May satisfy general education category B and G)	3
HNES 250	Nutrition Science (May satisfy general education category W)	3
MATH 146	Applied Calculus I (May satisfy general education category R)	4
or MATH 165	Calculus I	
MICR 350	General Microbiology	5
& 350L	and General Microbiology Lab	
PHYS 211 & 211L	College Physics I and College Physics I Laboratory (May satisfy general education category S)	4
STAT 330	Introductory Statistics (May satisfy general education category S)	3
	introductory statistics (way satisfy general education category K)	
Total Credits		88-89

PLSC189 is only required for first-time, first-year students—A first-time, first-year student is defined as a student who has not yet completed a college course as a college student. Students that are not first-time, first-year students that either transfer into the university or change their major are not required to take PLSC189.

Degree Requirements and Notes:

- $\bullet\,$ A 2.00 cumulative GPA is required for graduation and to remain in program.
- The department would highly recommend students consider taking CFS 462 Food Ingredient Technology and CFS 472 Cereal and Food Fermentation as electives courses for the degree.