

# NUTRITIONAL SCIENCES, BS NUTRITION AND DIETETICS

In this major, students explore nutrition through clinical and management courses and prepare for postgraduate training required to become registered dietitian nutritionists (RDN). With an increased emphasis on the role of food and nutrition in treating and preventing disease, employment of registered dietitians is projected to grow faster than other occupations.

Registered dietitian nutritionists work in a wide variety of settings, including health care, business and industry, community and public health, education, research, government agencies, and private practice. Many organizations, particularly those in medical and health care settings, require RDN credentials.

## LEARN THROUGH HANDS-ON, REAL-WORLD EXPERIENCES

Courses expose students to clinical problem-solving, assessing medical record data, evaluating food intake, planning modified diets, and reviewing medical and research literature related to certain diseases or conditions. This training develops critical thinking, teamwork, and communication skills needed by dietetic interns and registered dietitians.

## BUILD COMMUNITY AND NETWORKS

The Dietetics and Nutrition Club (<https://win.wisc.edu/organization/dnc/>) is an academic and professional registered student organization offering a variety of opportunities for members to participate in networking events, volunteer activities, and community outreach opportunities.

## CUSTOMIZE A PATH OF STUDY

Students in the program can pursue Honors in Research (<https://cals.wisc.edu/academics/undergraduate/current-students/honors-program/honors-research/>) through the College of Agricultural and Life Sciences.

Many students enhance their major by participating in a certificate program, including Global Health (<https://guide.wisc.edu/undergraduate/agricultural-life-sciences/nutritional-sciences/global-health-certificate/>).

## MAKE A STRONG START

First-year seminar courses (<https://guide.wisc.edu/undergraduate/agricultural-life-sciences/#requirements-text>) help students maximize their education, develop professional skills, and make informed decisions about their classes, internships, and career paths.

## GAIN GLOBAL PERSPECTIVE

Several courses emphasize global health and world nutrition, and UW–Madison offers more than a dozen study abroad and exchange programs that include a nutritional science component. Students can explore studying abroad utilizing the Nutrition and Dietetics Major Advising Page.

Students work with their advisor and the CALS study abroad office to identify appropriate programs.

## HOW TO GET IN

### HOW TO GET IN ADMISSION TO NUTRITIONAL SCIENCES BS NUTRITION AND DIETETICS DEGREE PROGRAM

Students will have Pre-Dietetics classification until admission to the nutrition and dietetics degree program (Dietetics classification) as defined by completion of prerequisite courses with a cumulative GPA of #2.0, as well as, an overall GPA of #2.0. Students must apply for and be admitted to the program no later than the end of the semester in which the student accumulates 86 credits, which is senior standing. Department approval is required for admission. Students who are not admitted to the program by the time they accumulate 86 credits will not be allowed to continue in the Pre-Dietetics classification.<sup>1</sup>

To be admitted to the BS Nutritional Sciences nutrition and dietetics program, the following requirements must be met effective fall 2019:

1. A minimum overall cumulative GPA of #2.0. Cumulative GPA will be based on UW–Madison courses only.
2. Students **must** have completed one semester at UW–Madison before applying.
3. A minimum mean GPA of #2.0 in the following required<sup>2</sup> prerequisite courses:

Code	Title	Credits
Select one of the following:		5–9
CHEM 103 & CHEM 104	General Chemistry I and General Chemistry II	
CHEM 109	Advanced General Chemistry	
Select one of the following:		5
ZOOLOGY/ BIOLOGY 101 & ZOOLOGY/ BIOLOGY 102	Animal Biology and Animal Biology Laboratory	
ZOOLOGY/ BIOLOGY/ BOTANY 151	Introductory Biology	
ANAT&PHY 335	Physiology	5
NUTR SCI 332	Human Nutritional Needs	3
Select one of the following:		3–4
PSYCH 202	Introduction to Psychology	
MICROBIO 101	General Microbiology	
PSYCH 210	Basic Statistics for Psychology	
SOC/ C&E SOC 360	Statistics for Sociologists I	
STAT 301	Introduction to Statistical Methods	
STAT 371	Introductory Applied Statistics for the Life Sciences	
GEN BUS 360	Workplace Writing and Communication	

<sup>1</sup> This policy is applicable to undergraduate students entering or transferring into Pre-Dietetics classification fall 2018 and beyond. Students who have already completed a college degree (BS or BA) may choose to pursue the Nutritional Sciences nutrition and dietetics program as either a second degree candidate, or as a Didactic Program in Dietetics (DPD) completer. Because they have already completed a bachelor's degree, second-degree candidates and DPD completers are not required to follow this progression policy. Progression for these students will be closely monitored by the program coordinator.

<sup>2</sup> Any transfer course from another university that will be used to meet the above required courses **cannot** be included in the GPA calculation. If the same course is taken more than once, only the grade from the last time the course was taken will be used in the GPA calculation.

**Note:** Admission to the DPD program is competitive, as enrollment is limited by accreditation standards; students meeting the minimum criteria are not guaranteed admission.

## REQUIREMENTS

### UNIVERSITY GENERAL EDUCATION REQUIREMENTS

All undergraduate students at the University of Wisconsin-Madison are required to fulfill a minimum set of common university general education requirements to ensure that every graduate acquires the essential core of an undergraduate education. This core establishes a foundation for living a productive life, being a citizen of the world, appreciating aesthetic values, and engaging in lifelong learning in a continually changing world. Various schools and colleges will have requirements in addition to the requirements listed below. Consult your advisor for assistance, as needed. For additional information, see the university Undergraduate General Education Requirements (<https://guide.wisc.edu/undergraduate/#requirementsforundergraduatestudytext>) section of the Guide.

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|-------------------|--|
| General Education | <ul style="list-style-type: none"> <li>• Breadth—Humanities/Literature/Arts: 6 credits</li> <li>• Breadth—Natural Science: 4 to 6 credits, consisting of one 4- or 5-credit course with a laboratory component; or two courses providing a total of 6 credits</li> <li>• Breadth—Social Studies: 3 credits</li> <li>• Communication Part A &amp; Part B *</li> <li>• Ethnic Studies *</li> <li>• Quantitative Reasoning Part A &amp; Part B *</li> </ul> |
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\* The mortarboard symbol appears before the title of any course that fulfills one of the Communication Part A or Part B, Ethnic Studies, or Quantitative Reasoning Part A or Part B requirements.

### COLLEGE OF AGRICULTURAL AND LIFE SCIENCES REQUIREMENTS

In addition to the University General Education Requirements, all undergraduate students in CALS must satisfy a set of college and major requirements. Courses may not double count within university requirements (General Education and Breadth) or within college

requirements (First-Year Seminar, International Studies, Science, and Capstone), but courses counted toward university requirements may also be used to satisfy a college and/or a major requirement; similarly, courses counted toward college requirements may also be used to satisfy a university and/or a major requirement.

### COLLEGE REQUIREMENTS FOR ALL CALS BS DEGREE PROGRAMS

Code	Title	Credits
Quality of Work: Students must maintain a minimum cumulative grade point average of 2.000 to remain in good standing and be eligible for graduation.		
Residency: Students must complete 30 degree credits in residence at UW-Madison after earning 86 credits toward their undergraduate degree.		
	First year seminar ( <a href="https://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSThirdYearSeminarCourses">https://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSThirdYearSeminarCourses</a> )	1
	International studies ( <a href="https://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSThirdYearSeminarCourses">https://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSThirdYearSeminarCourses</a> )	3
	Physical science fundamentals	4-5
	CHEM 103 General Chemistry I or CHEM 108 Chemistry in Our World or CHEM 109 Advanced General Chemistry	
	Biological science	5
	Additional science (biological, physical, or natural)	3
	Science breadth (biological, physical, natural, or social)	3
CALS Capstone Learning Experience: included in the requirements for each CALS major (see "major requirements") ( <a href="https://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSCapstoneRequirement">https://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSCapstoneRequirement</a> )		

### MAJOR REQUIREMENTS

Code	Title	Credits
<b>Mathematics and Statistics</b>		
Complete one of the following (or may be satisfied by placement exam):		3-5
MATH 112	College Algebra	
MATH 114	Precalculus <sup>1</sup>	
Complete one of the following:		3-4
PSYCH 210	Basic Statistics for Psychology	
SOC/ C&E SOC 360	Statistics for Sociologists I	
STAT 301	Introduction to Statistical Methods	
STAT 371	Introductory Applied Statistics for the Life Sciences	
<b>Chemistry</b>		
Complete one of the following:		5-9
CHEM 103 & CHEM 104	General Chemistry I and General Chemistry II	
CHEM 109	Advanced General Chemistry	
Complete one of the following:		3
CHEM 341	Elementary Organic Chemistry	
CHEM 343	Organic Chemistry I	

Complete one of the following: 3

BIOCHEM 301	Survey of Biochemistry	
BIOCHEM 501	Introduction to Biochemistry	

#### Biology

Complete one of the following: 5

ZOOLOGY/ BIOLOGY 101 & ZOOLOGY/ BIOLOGY 102	Animal Biology and Animal Biology Laboratory	
ZOOLOGY/ BIOLOGY/ BOTANY 151	Introductory Biology	

Complete one of the following: <sup>2</sup> 5

MICROBIO 101 & MICROBIO 102	General Microbiology and General Microbiology Laboratory	
MICROBIO 303 & MICROBIO 304	Biology of Microorganisms and Biology of Microorganisms Laboratory	

#### Foundation

ANAT&PHY 335	Physiology	5
PSYCH 202	Introduction to Psychology	3
GEN BUS 310	Fundamentals of Accounting and Finance for Non-Business Majors	3
GEN BUS 360	Workplace Writing and Communication	3

#### Core

FOOD SCI 301	Introduction to the Science and Technology of Food	3
FOOD SCI 437	Food Service Operations	4
NUTR SCI 200	Professional Skills in Dietetics	1
NUTR SCI 332	Human Nutritional Needs	3
NUTR SCI 431	Nutrition in the Life Span	3
BIOCHEM/NUTR SCI 510	Nutritional Biochemistry and Metabolism	3
NUTR SCI 540	Community Nutrition and Health Equity	3
NUTR SCI 631	Clinical Nutrition I	3
NUTR SCI 632	Clinical Nutrition II	3

#### Capstone

NUTR SCI 500	Undergraduate Capstone Seminar Laboratory	1
NUTR SCI 641	Applications in Clinical Nutrition I	1
NUTR SCI 642	Applications in Clinical Nutrition II	1

**Total Credits** 70-77

<sup>1</sup> Note that placement into MATH 114 does not guarantee that credit has been earned for MATH 112.

<sup>2</sup> Consult advisor about combining MICROBIO 303 with MICROBIO 102.

## UNIVERSITY DEGREE REQUIREMENTS

**Total Degree** To receive a bachelor's degree from UW–Madison, students must earn a minimum of 120 degree credits. The requirements for some programs may exceed 120 degree credits. Students should consult with their college or department advisor for information on specific credit requirements.

**Residency** Degree candidates are required to earn a minimum of 30 credits in residence at UW–Madison. "In residence" means on the UW–Madison campus with an undergraduate degree classification. "In residence" credit also includes UW–Madison courses offered in distance or online formats and credits earned in UW–Madison Study Abroad/Study Away programs.

**Quality of Work** Undergraduate students must maintain the minimum grade point average specified by the school, college, or academic program to remain in good academic standing. Students whose academic performance drops below these minimum thresholds will be placed on academic probation.

## LEARNING OUTCOMES

### LEARNING OUTCOMES

1. Obtains and can articulate specialized knowledge in the field of nutritional sciences and dietetics along with an education broad enough to meet the challenges of future careers and opportunities.
2. Obtains and can articulate foundational knowledge in areas relevant to the field of nutrition and dietetics.
3. Communicates complex ideas in a clear and understandable manner through both written and oral presentations.
4. Demonstrates quantitative literacy in math and statistics relevant to nutritional sciences and dietetics.
5. Demonstrates the ability to think critically and creatively, to synthesize, analyze, and integrate ideas for decision making and problem solving.
6. Develops the skills for life-long learning and is capable of locating, interpreting, and critically evaluating professional literature and current research.
7. Develops a global perspective and an appreciation for the interdependencies among individuals and their workplaces, communities, environments, and world; and an understanding of the interrelationships between science and society.
8. Develops a respect for truth, a tolerance for diverse views, and a strong sense of personal and professional ethics.

## FOUR-YEAR PLAN

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#### SAMPLE FOUR-YEAR PLAN–NUTRITIONAL SCIENCES NUTRITION AND DIETETICS DEGREE

Students must complete at least 120 total credits to be eligible for graduation.

**First Year**

<b>Fall</b>	<b>Credits Spring</b>	<b>Credits</b>
CHEM 103 or MATH 112	3-4 CHEM 104	5
COMM A	3 PSYCH 202	3-4
CALS First Year Seminar	1 BIOLOGY/ ZOOLOGY 101	3
Ethnic Studies	3-4 BIOLOGY/ ZOOLOGY 102	2
Elective (NUTR SCI 132 recommended)	3 Elective	3
<b>13-15</b>		<b>16-17</b>

**Second Year**

<b>Fall</b>	<b>Credits Spring</b>	<b>Credits</b>
CHEM 341 <sup>1</sup>	3 NUTR SCI 332	3
MICROBIO 101 or 303	3 ANAT&PHY 335	5
MICROBIO 102 or 304	2 GEN BUS 360 or 310	3
Humanities	3 Statistics Requirement	3-4
Electives	3-4	
<b>14-15</b>		<b>14-15</b>

**Third Year**

<b>Fall</b>	<b>Credits Spring</b>	<b>Credits</b>
FOOD SCI 301	3 NUTR SCI 431 <sup>2</sup>	3
GEN BUS 310 or 360	3 NUTR SCI/ BIOCHEM 510	3
BIOCHEM 501 or 301 <sup>5</sup>	3 NUTR SCI 540 <sup>3, 4</sup>	3
Electives	6-7 CALS International Studies	3
	Humanities	3-4
<b>15-16</b>		<b>15-16</b>

**Fourth Year**

<b>Fall</b>	<b>Credits Spring</b>	<b>Credits</b>
NUTR SCI 200 <sup>1</sup>	1 NUTR SCI 632 <sup>3</sup>	3
NUTR SCI 631 <sup>1</sup>	3 NUTR SCI 642 <sup>3</sup>	1
NUTR SCI 641 <sup>1</sup>	1 Electives	11
FOOD SCI 437 <sup>1</sup>	4	
NUTR SCI 500	1	
Electives	6	
<b>16</b>		<b>15</b>

**Total Credits 118-125**<sup>1</sup> Offered only fall semester.<sup>2</sup> Offered only spring and summer semesters.<sup>3</sup> Offered only spring semester.<sup>4</sup> May be taken spring of third year or spring of fourth year.<sup>5</sup> BIOCHEM 501 is offered fall and spring. BIOCHEM 301 is offered spring only.

curriculum to match student interests – and provides advising on career paths including graduate school or pursuing advanced degrees in the health sciences.

Professors provide mentorship to students in the program through work on faculty-led research, including learning research paper- and grant-writing skills, communicating about scientific concepts, and presenting research results to different audiences.

**CAREER OPPORTUNITIES**

Alumni of the program are working as Registered Dietitian Nutritionists (RDNs), clinical nutritionists, physician assistants, nutrition directors and counselors, and health coaches. RDNs work in hospitals, outpatient clinics, schools, colleges, wellness programs, and nursing homes, as well as in public health agencies, the food industry, and research labs. See the Certification/Licensure tab to learn more about the requirements to become an RDN.

The Academy of Nutrition and Dietetics offers more information on career paths (<https://www.eatrightpro.org/about-us/become-an-rdn-or-dtr/high-school-students/exploring-a-career-in-dietetics/>) in dietetics.

Students can connect with CALS Career Services (<https://cals.wisc.edu/academics/undergraduate/current-students/career-services/>) to explore various career paths and opportunities.

**WISCONSIN EXPERIENCE****WISCONSIN EXPERIENCE  
STUDENT ORGANIZATIONS**

The Dietetics and Nutrition Club (DNC) (<https://nutrisci.wisc.edu/undergraduate/dietetics-and-nutrition-club/>), open to undergraduate and graduate students, hosts biweekly evening meetings featuring speakers on many topics related to nutrition. The group also assists students in finding volunteer and job opportunities in the field of nutrition.

Students can join the Academy of Nutrition and Dietetics (<http://eatright.org/>), the world's largest organization of food and nutrition professionals, providing public information on advocacy, leadership, career development, dietetics resources, position, and practice papers.

**COMMUNITY ENGAGEMENT AND  
VOLUNTEERING**

Students in the program volunteer throughout the community on projects related to nutrition and food through student organizations like Slow Food UW (<https://win.wisc.edu/organization/slowfood-uw/>) or the Campus Food Shed (<https://goldman.horticulture.wisc.edu/outreach-and-program-resources/uw-campus-food-shed/>). Several students have developed their own community projects to educate people about nutrition and to fight food insecurity.

**GLOBAL ENGAGEMENT**

Faculty and students in the program have many connections with global activities. The UW Mobile Clinic and Health Care in Uganda (<https://studyabroad.wisc.edu/program/?programId=532>) study abroad program provides students an opportunity to visit Uganda and learn about nutrition and public health. The Village Health Project student organization (<http://villagehealthproject.org/>) grew out of students traveling to Uganda on UW-Madison programs and supports ongoing public health projects in the region.

**ADVISING AND CAREERS****ADVISING AND CAREERS****ADVISING**

Students are assigned a professional advisor who assists them with building their personalized Wisconsin Experience – including a strong

## RESEARCH EXPERIENCE

Undergraduate students have the opportunity to participate in independent research in labs to learn research techniques. Students can expand their scientific knowledge outside of the classroom and contribute to ongoing papers, research, and discoveries. These experiences lead some students to pursue graduate studies in research after graduation. Read more about faculty research opportunities (<https://nutrisci.wisc.edu/people/faculty-staff/>).

## CERTIFICATION/LICENSURE

### CERTIFICATION/LICENSURE REGISTERED DIETITIAN NUTRITIONIST (RDN) CREDENTIAL

A Nutritional Sciences BS in Nutrition and Dietetics fulfills the Didactic Program in Dietetics (DPD) portion of the DPD + Dietetic Internship pathway to become an RDN. Following completion of the Nutritional Sciences BS in Nutrition and Dietetics (DPD), students must complete a supervised practicum (dietetic internship) and a master's degree to be eligible to sit for the national RDN examination.

For more information see: <https://www.eatright.org/become-an-rdn>  
(<https://www.eatright.org/become-an-rdn/>).

## RESOURCES AND SCHOLARSHIPS

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The Department of Nutritional Sciences awards tens of thousands of dollars in scholarship funds (<https://nutrisci.wisc.edu/undergraduate/scholarships/>) for students each year, and Nutrition and Dietetics students are also eligible for scholarships in the College of Agricultural and Life Sciences (<https://cals.wisc.edu/academics/undergraduate-students/financing-your-education/cals-scholarships/>).

The Academy of Nutrition and Dietetics Foundation provides dietetic scholarships to students. Visit [eatrightfoundation.secure-platform.com/a/](https://eatrightfoundation.secure-platform.com/a/) (<https://eatrightfoundation.secure-platform.com/a/>) for more information.

## ACCREDITATION

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Accreditation Council for Education in Nutrition and Dietetics (<https://www.eatrightpro.org/acend/>)

Accreditation status: Accredited. Next accreditation review: 2027.