LIFE SCIENCES COMMUNICATION, BS

The Department of Life Sciences Communication (LSC) is one of the world's leading science communication programs, working at the intersection of science, media, and society. The LSC major teaches students how to understand the way we all make sense of increasingly complex scientific breakthroughs. This theoretical background is a foundation to effectively communicate about controversial science topics in areas such as the environment and natural resources, health, agriculture, and new science technologies like gene editing and artificial intelligence.

Students receive instruction across multimedia platforms such as print, audio, video, and web. They are taught how to target and create communications for both news and marketing. Most important, they learn how to plan strategically and implement the most effective communications for diverse audiences.

Many courses in LSC have a strong professional focus, combining classroom instruction with projects that have real-world clients from industry and non-profit. Our faculty and instructors work with clients from a variety of industries and the policy world and bring those experiences into the classroom. These collaborations and projects prepare LSC students for careers in a wide variety of fields, including healthcare, digital marketing, education, media, agriculture, information technology, consumer goods, life sciences, and consulting. LSC students also pursue graduate and professional school after graduation in the health, biological, social, and physical sciences.

Students can also participate in an honors in major program in LSC (https://guide.wisc.edu/undergraduate/agricultural-life-sciences/ life-sciences-communication/life-sciences-communication-bs/ #requirementstext).

LEARN THROUGH HANDS-ON, REAL-WORLD EXPERIENCES

State-of-the-art computer labs, radio labs, and video production equipment support student learning and preparation for careers.

Capstone courses provide students with an opportunity to put their LSC education into practice. Students apply their skills in the real world through these capstones, working with a real-life client on a social marketing campaign to influence behavioral change or participate in a science communication internship.

Students interested in science communication research can participate in research projects with professors leading the field of science communication.

BUILD COMMUNITY AND NETWORKS

LSC instructors are world-class researchers and real-world practitioners. Many courses enroll between 15-50 students, allowing students to get to know award-winning faculty and instructors personally throughout their time in the major.

CUSTOMIZE A PATH OF STUDY

LSC is an attractive major and double major for students interested in a variety of fields including genetics, global health, environmental science, physics, legal studies, psychology, and more. The LSC major is highly customizable both in terms of course selection in the major and in the ability to add majors and certificates to the LSC bachelor's degree based on each student's interests and career goals.

MAKE A STRONG START

LSC introduces students to the field of science communication, the College of Agricultural and Life Sciences, and the university by offering LSC 155 First-Year Seminar in Science Communication, a seminar course for first-year students.

GAIN GLOBAL PERSPECTIVE

LSC students often participate in study abroad opportunities around the world including places like Spain, Uganda, Denmark, England, and Ecuador. Programs range from two weeks in duration to an entire year. Learn more about studying abroad as an LSC major by checking out the LSC Major Advising Page (https://studyabroad.wisc.edu/academics/major-advising-pages-maps/life-sciences-communication/). Students work with their advisor and the CALS study abroad office (https://cals.wisc.edu/academics/undergraduate/current-students/study-abroad/) to identify appropriate programs.

HOW TO GET IN

HOW TO GET IN

To declare this major, students must be admitted to UW–Madison and the College of Agricultural and Life Sciences (CALS). For information about becoming a CALS first-year or transfer student, see Entering the College (http://guide.wisc.edu/undergraduate/agricultural-life-sciences/ #enteringthecollegetext).

Students who attend Student Orientation, Advising, and Registration (SOAR) with the College of Agricultural and Life Sciences have the option to declare this major at SOAR. Students may otherwise declare after they have begun their undergraduate studies. For more information, contact the advisor listed in the Contact Box for the major.

Students are not allowed to earn both the Science Communication Certificate and the Life Sciences Communication BS.

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 (http://guide.wisc.edu/undergraduate/ #requirementsforundergraduatestudytext) section of the *Guide*.

General Education

- Breadth-Humanities/Literature/Arts: 6 credits
 - · 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
 - Breadth–Social Studies: 3 credits
 - Communication Part A Part B *
 - Ethnic Studies *
 - Quantitative Reasoning Part A Part B *

* 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: Stud cumulative grade poin standing and be eligib	ents must maintain a minimum nt average of 2.000 to remain in good ole for graduation.	
Residency: Students residence at UW-Mac their undergraduate c	must complete 30 degree credits in dison after earning 86 credits toward degree.	
First year seminar (http://guide.wisc.edu/ undergraduate/agricultural-life-sciences/ #CALSFirstYearSeminarCourses)		
International studies (undergraduate/agricu #CALSInternationalS	(http://guide.wisc.edu/ ultural-life-sciences/ tudiesCourses)	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)		
Science breadth (biological, physical, natural, or social)		

CALS Capstone Learning Experience: included in the requirements for each CALS major (see "major requirements") (http://guide.wisc.edu/undergraduate/ agricultural-life-sciences/#CALSCapstoneRequirement)

MAJOR REQUIREMENTS

Courses may not double count within the major (unless specifically noted otherwise), but courses counted toward the major requirements may also be used to satisfy a university requirement and/or a college requirement. Students must have a minimum of 15 credits within the Life Sciences Communication major that do not double count toward CALS or university general education requirements.

MATH AND STATISTICS FOUNDATION

We strongly recommend that all students complete MATH 112 Algebra or MATH 114 Algebra and Trigonometry to complete the university quantitative reasoning A requirement and either STAT 301 Introduction to Statistical Methods, STAT 371 Introductory Applied Statistics for the Life Sciences or SOC/C&E SOC 360 Statistics for Sociologists I to complete the university quantitative reasoning B requirement.

REQUIRED COURSES

Code	Title	Credits
Foundation Course		
LSC 212	Introduction to Scientific Communication	3
Core		
LSC 250	Research Methods in the Communication Industry	3
LSC 251	Science, Media and Society	3
Complete two of the	following:	6
LSC 270	Marketing Communication for the Sciences	
LSC 314	Introduction to Digital Video Production	
LSC 332	Print and Electronic Media Design	
LSC 340	Misinformation, Fake News, and Correcting False Beliefs about Science	
LSC 350	Visualizing Science and Technology	
LSC 360	Information Radio	
Depth within the M	ajor	
Complete 6 credits fr	om one of the following depth	6
categories (see cours	e lists below):	
Communication St	rategy Depth	
Communication S	ills and Technologies Depth	
Capstone		
LSC 515	Social Marketing Campaigns in Science, Health and the Environment	3
or LSC 640	Case Studies in the Communication of Scie	ence and
Total Credits		24

DEPTH WITHIN THE MAJOR

Communication Strategy Depth

This depth category focuses on the skills and theory necessary to effectively communicate with audiences in the life sciences context, while satisfying the long terms strategic goals of an organization. The depth category includes courses in marketing, strategic and risk communication, and data analysis.

Code	Title	Credits
Complete two of the f	following:	6
LSC 432	Social Media for the Life Sciences	
LSC 435	Brand Strategy for the Sciences	
LSC 440	Digital Media and Science Communication	
LSC 460	Social Media Analytics	
LSC 480	Culturally Responsive Science Communication	
LSC/COM ARTS/ JOURN 617	Health Communication in the Information Age	
LSC 625	Risk Communication	
LSC 660	Data Analysis in Communications Research	

Communication Skills and Technologies Depth

This depth category focuses on the skills required to translate organized information into informative and persuasive messages for a variety of media, such as writing, documentary photography, social media, web design and video production.

Code	Title	Credits
Complete two of the	following:	6
LSC 430	Communicating Science with Narrative	
LSC 432	Social Media for the Life Sciences	
LSC 450	Documentary Photography for the Sciences	
LSC 532	Web Design for the Sciences	
LSC 614	Advanced Video Production	

HONORS IN THE MAJOR

Students admitted to the university and to the College of Agricultural and Life Sciences are invited to apply to be considered for admission to the CALS Honors Program.

Admission Criteria for New First-Year Students:

Complete program application including essay questions

Admission Criteria for Transfer and Continuing UW-Madison Students:

- UW-Madison cumulative GPA of at least 3.25
- Complete program application including essay questions

HOW TO APPLY

The application is available on the CALS Honors Program website (https:// cals.wisc.edu/academics/undergraduate/current-students/honorsprogram/). Applications are accepted at any time. New first-year students with accepted applications will automatically be enrolled in Honors in Research. It is possible to switch to Honors in the Major in the student's first semester on campus after receiving approval from the advisor for that major. Transfer and continuing students may apply directly to Honors in Research or Honors in the Major (after approval from the major advisor).

REQUIREMENTS

All CALS Honors programs have the following requirements:

- Earn at least a cumulative 3.25 GPA at UW-Madison (some programs have higher requirements)
- · Complete the program-specific requirements listed below
- Submit completed thesis documentation to CALS Academic Affairs

LIFE SCIENCES COMMUNICATION HONORS IN THE MAJOR REQUIREMENTS

Students may apply for admission to honors in the major in Life Sciences Communication at any time but are strongly advised to apply before their junior year. Interested students are encouraged to meet with the Life Sciences Communication advisor with any questions about honors in the major.

- 24-28 credits of coursework, as outlined in the chart below.
- For the 15 credits of LSC coursework taken for honors credit:
 Students must earn at least a 3.5 cumulative GPA in this coursework.
 - It is the student's responsibility to enroll in honors sections or to select honors optional in order for courses to count toward honors in the major.
 - Thesis and independent study credits do not count toward the required 15 credits of LSC honors coursework.
- Complete a senior honors thesis and present the thesis at the CALS Undergraduate Research Symposium or another public venue.

Code	Title	Credits
Required Coursewo	rk	
STAT 301	Introduction to Statistical Methods	3
or STAT 371	Introductory Applied Statistics for the Life Sciences	
or C&E SOC/ SOC 360	Statistics for Sociologists I	
_SC 289	Honors Independent Study	2
or LSC 299	Independent Study	
or LSC 699	Special Problems	
_SC 681 & LSC 682	Senior Honors Thesis and Senior Honors Thesis	4-8
5 credits of LSC cour	sework taken for honors credit	15
Total Credits		24-28

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

- Specialized knowledge in theoretical and applied communication of science and technology, along with an education broad enough to meet the challenges of changing careers and opportunities.
- 2. The ability to think critically and creatively: to synthesize, analyze, and integrate ideas for decision making and problem solving.
- 3. The ability to communicate effectively across media and a broad range of audiences.
- 4. A global perspective; an appreciation for the interdependencies among individuals and their workplaces, communities, environments, and world; and an understanding of the interrelationships between science and society.
- 5. The ability to work with others in small or large groups, to recognize civic and social responsibilities, and to appreciate the uses of public policy in a democracy.
- 6. A respect for truth, a tolerance for diverse views, and a strong sense of personal and professional ethics.

FOUR-YEAR PLAN

FOUR-YEAR PLAN SAMPLE LIFE SCIENCES COMMUNICATION FOUR-YEAR PLAN

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

First Year

Fall	Credits Spring	Credits
LSC 100 ¹	3 LSC 212	3
MATH 112 or 114 ²	3-5 LSC 250	3
CALS First Year Seminar	1 CHEM 103, 108, or 109	4-5

Humanities Elective	3 Ethnic Studies	3
Electives ³	4-5 Elective	3
	14-17	16-17
Second Year		
Fall	Credits Spring	Credits
LSC 251	3 LSC Core Elective	3
STAT 301, 371, or C&E SOC 360 ⁴	3-4 CALS International Studies	3
Biological Science Elective	3 Science Breadth Elective	3
Humanities Elective	3 Electives	7
Elective	3	
	15-16	16
Third Year		
Fall	Credits Spring	Credits
LSC Core Elective	3 LSC Concentration	3
Social Science Elective	3 Biological Science Elective	3
Electives	9 Electives	9
	15	15
Fourth Year		
Fall	Credits Spring	Credits
LSC Concentration	3 LSC 515 or 640	3
Additional Science Elective	3 Electives	12
Electives	9	
	15	15

Total Credits 121-126

- ¹ LSC 100 is not required for the major but is strongly encouraged for students who need to take a communication A course.
- ² The program recommends MATH 112 or MATH 114 for students who need to complete the university quantitative reasoning A requirement.
- ³ Many Life Sciences Communication students choose to use elective spaces throughout their career to complete an additional major or certificate. Other students choose to take more LSC courses than the minimum required. Students should consult the advisor for more information and to create a personalized four-year plan based on their background, interests, and career goals.
- ⁴ The program strongly recommends STAT 301, STAT 371, or C&E SOC/ SOC 360 to fulfill the university quantitative reasoning B requirement.

THREE-YEAR PLAN

THREE-YEAR PLAN

This sample Three-Year Plan is a tool to assist students and their advisor(s). Students should use it –along with their DARS report, the Degree Planner, and Course Search & Enroll tools – to make their own three-year plan based on their placement scores, credit for transferred courses and approved examinations, and individual interests.

Three-year plans may vary considerably from student to student, depending on their individual preparation and circumstances. Students interested in graduating in three years should meet with an advisor as early as possible to discuss feasibility, appropriate course sequencing, postgraduation plans (careers, graduate school, etc.), and opportunities they might forgo in pursuit of a three-year graduation plan.

These three-year road maps below are designed to provide an example of how a student could complete their BS in Life Sciences Communication within three years. One plan assumes you are entering college with 29 credits from Advanced Placement, International Baccalaureate, or college transfer courses, including fulfilling UW-Madison's quantitative reasoning A requirement through credit or placement scores. The other plan assumes you are entering without bringing in outside credits. Your specific program of study could, and probably will, look different. You should customize the road map to fit your unique path at UW-Madison. Consult with your advisor about the best path for you.

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

SAMPLE LIFE SCIENCES COMMUNICATION THREE-YEAR PLAN #1¹

First Year				
Fall	Credits Spring	Credits	Summer	Credits
LSC 100 (Comm A) ²	3 LSC 212	3	Social Science Elective	3
CALS First Yea Seminar	r 1 LSC 250	3		
Humanities Elective	3 CHEM 103, 108 or 109	8, 4-5		
Electives ³	7 Ethnic Studies	3		
	14	13-14		3
Second Year				
Fall	Credits Spring	Credits		
LSC 251	3 LSC Core	3		
STAT 301, 371, or C&E SOC 360 ⁴	3-4 Biological Science Electiv	3 /e		
LSC Core	3 Humanities Elective	3		
Additional Science Electiv	3 Electives ve	7		
Electives	3			
	15-16	16		
Third Year				
Fall	Credits Spring	Credits		
LSC Concentration	3 LSC Capstone	3		
CALS International Studies	3 LSC Concentration	3		
Science Breadt Elective	h 3 Biological Science Electiv	3 /e		
Electives	6 Electives	6		
	15	15		

Total Credits 91-93

¹ Plan #1 assumes that students are coming to UW-Madison with approximately 29 credits from AP/IB or college transfer credits and that the University quantitative reasoning A requirement is fulfilled through transfer credit or placement scores. Your plan may look different depending on the number of credits you bring in.

- ² LSC 100 is not required for the major but is strongly encouraged for students who need to take a communication A course.
- ³ Many Life Sciences Communication students use their elective coursework to take additional LSC courses, to add one or more certificates, to add a double major, or to take other coursework to work to achieve their academic and career goals.
- ⁴ The program recommends STAT 301, STAT 371, or C&E SOC/SOC 360 to fulfill the university quantitative reasoning B requirement.

SAMPLE LIFE SCIENCES COMMUNICATION THREE-YEAR PLAN #2¹

First Year			
Fall	Credits Spring	Credits Summer	Credits
LSC 100 ²	3 LSC 212	3 LSC 251	3
MATH 112 or 114	³ 3-5 LSC 250	3 Electives	6
CALS First Yea Seminar	r 1 CHEM 103, 108 or 109	3, 4-5	
Humanities Elective	3 Ethnic Studies	3	
Electives ⁴	4 Elective	3	
	14-16	16-17	9
Second Year			
Fall	Credits Spring	Credits Summer	Credits
STAT 301, 371, or C&E SOC 360 ⁵	3-4 Biological Science Electi	3 LSC Core ve	3
LSC Core	3 Social Science Elective	s 3 Science Bread Elective	th 3
Additional Science Electiv	3 Humanities e Elective	3 Elective	3
Electives	7 Electives	7	
	16-17	16	9
Third Year			
Fall	Credits Spring	Credits Summer	Credits
LSC	3 LSC Capstone	e 3 LSC	3
Concentration		Concentration	
CALS International Studies	3 Biological Science Electi	3 Electives ve	6
Electives	9-11 Electives	10	
	15-17	16	9

Total Credits 120-126

¹ Plan #2 assumes that you are coming to UW-Madison without credits from AP/IB or another college/university.

² LSC 100 is not required for the major but is strongly encouraged for students who need to take a communication A course.

³ The program recommends MATH 112 or MATH 114 for students who need to complete the university quantitative reasoning A requirement.

⁴ Many Life Sciences Communication students use their elective coursework to take additional LSC courses, to add one or more certificates, to add a double major, or to take other coursework to work to achieve their academic and career goals. ⁵ The program strongly recommends STAT 301, STAT 371, or C&E SOC/ SOC 360 to fulfill the university quantitative reasoning B requirement.

ADVISING AND CAREERS

ADVISING AND CAREERS ADVISING

Each LSC student is assigned to both an academic advisor and a faculty mentor in LSC. The academic advisor is a professional advisor who works with students on planning their coursework, as well as navigating and getting involved on campus. Current and prospective students should contact the advisor with questions.

The faculty mentors are LSC faculty and instructors who provide students with another direct contact and resource in the department specifically focusing on career conversations as well as how to get involved in research as a student.

CAREER OPPORTUNITIES

LSC alumni hold professional positions in communications, digital marketing, environmental advocacy, and research or consulting in a variety of industries including health care, media, education, agriculture, information technology and life sciences. Many pursue advanced degrees in graduate and professional programs in the health, biological, social and physical sciences.

Graduates are recognized for their skills in social media, event management, marketing, leadership, public speaking, customer service, public relations, strategic planning, research, data analysis, writing and digital video production.

LSC has a large alumni network across many industries and fields. To connect students to these networks, LSC hosts career panels during the academic year, posts alumni profiles (https://lsc.wisc.edu/alumni-friends/ what-our-undergraduate-alumni-are-doing/) on its website, and manages a LinkedIn group to share job opportunities and facilitate connections between alumni and students.

PEOPLE

PEOPLE PROFESSORS & INSTRUCTORS (HTTPS:// LSC.WISC.EDU/PEOPLE/FACULTY-RESEARCH-STAFF/)

Botham, Sarah Brossard, Dominique (chair) Chen, Kaiping Chinn, Sedona Li, Nan Newman, Todd Patterson, Dexter Scheufele, Dietram Shaw, Bret Stanley, Don Xenos, Michael (director of undergraduate studies)

WISCONSIN EXPERIENCE

WISCONSIN EXPERIENCE INTERNSHIPS

Most LSC students participate in internships during their time as undergraduates. LSC staff notify students of opportunities to apply for summer and academic year internships related to science communication and students are encouraged to discuss their goals with their career mentor (https://guide.wisc.edu/undergraduate/agricultural-lifesciences/life-sciences-communication/life-sciences-communicationbs/#advisingandcareerstextcontainer). Students intern with marketing agencies, environmental and sustainability organizations, and healthcare and agricultural agencies. Read about student internship experiences (https://lsc.wisc.edu/?s=internship&submit=Search).

STUDENT ORGANIZATIONS

LSC is home to both the Science Communication Club and the National Agri-Marketing Association UW-Madison chapter (https://lsc.wisc.edu/academic-programs/undergraduate/#student-organizations), and there are many additional opportunities for students to get involved with other student organizations on campus.

GLOBAL ENGAGEMENT

LSC students are encouraged to gain global perspective by participating in study abroad opportunities all over the world including places like Spain, Uganda, Denmark, England, and Ecuador. Students choose programs ranging anywhere from two weeks in duration to an entire year. Learn more about studying abroad as an LSC major (https://studyabroad.wisc.edu/ academics/major-advising-pages-maps/life-sciences-communication/).

LSC offers a course introducing students to communication at the intersection of science, politics, and society to provide students with an international perspective on science communication. Taught by faculty from around the world, LSC courses provide an overview of the theoretical foundations of science communication and their relevance for societal debates about science and emerging technologies across different parts of the world.

COMMUNITY ENGAGEMENT AND VOLUNTEERING

LSC students often volunteer in healthcare, non-profits, advocacy agencies, and more. The Morgridge Center for Public Service (https://morgridge.wisc.edu/) provides resources to help students connect with volunteer opportunities based on their interests and goals.

RESOURCES AND SCHOLARSHIPS

RESOURCES AND SCHOLARSHIPS

Students in the College of Agricultural and Life Sciences receive more than \$1.25 million in scholarships annually. LSC awards over \$42,000 in scholarships each year to students in the department. Students apply for CALS and LSC scholarships through a single application in the Wisconsin Scholarship Hub (WiSH). Learn more about college scholarships (https:// cals.wisc.edu/academics/undergraduate-students/financing-youreducation/cals-scholarships/).