




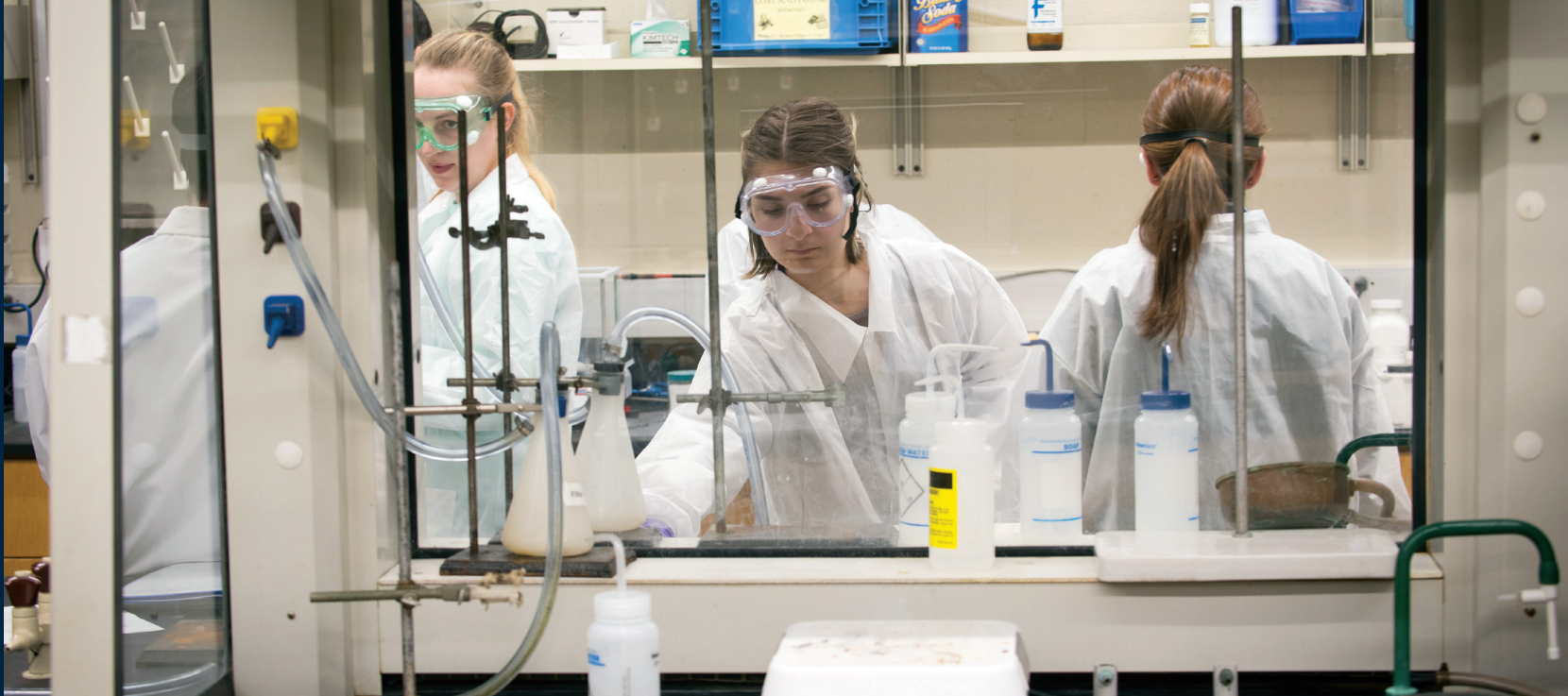
# **Doctor of Pharmacy (Pharm.D.) Professional Program**

**Admission Information and Plan of Study**



**A** career in pharmacy is innovative and exciting, with new roles and opportunities emerging as our health care system evolves to meet the changing needs of patients. In addition to critical roles in community pharmacies and hospitals, Pharm.D. graduates today secure careers in all areas of public and private health care and medical research.





## The Doctor of Pharmacy (Pharm.D.) Professional Program at UConn

► All pharmacy students are assigned staff and/or faculty advisors who provide support and counsel along the path to the Pharm.D. degree.

**T**rain to become a licensed pharmacist. The Pharm.D. degree is a professional degree like the JD earned by an attorney or the MD earned by a doctor. Students typically complete general education and pre-professional foundation coursework in their freshman and sophomore years and apply to enter the School of Pharmacy's professional program during the second semester of their sophomore year. Students then transition to professional coursework (junior year) and earn a BS in Pharmacy Studies after the equivalent of senior year.

The semester immediately following the completion of the BS degree, students complete two additional years of upper-level coursework and engage in experiential rotations across the entire spectrum of pharmacy careers before earning their Pharm.D. degree.

Please refer to the 'Road to a Pharm.D.' graphic on the final two pages of this brochure for an explanation of all steps.

### Careers after pharmacy school include:

- Hospital (clinical specialty areas: pediatrics, critical care, emergency medicine, cardiology, oncology, infectious disease, psychiatry, palliative medicine, pain management; specialty pharmacy)
- Community Practice (independent, chain, compounding, and veterinary pharmacy)
- Pharmaceutical Industry (medical affairs, regulatory affairs, medical science liaison, drug information, research and drug development)
- Nuclear Pharmacy
- Academic Pharmacy
- Health Informatics
- Long-term, Hospice, and Home Health Consulting
- Government/Federal and State (FDA, NIH, Connecticut Department of Consumer Protection)
- Managed Care and Pharmacy Benefit Management
- Clinical Inspection Pharmacist
- Publishing/Medical Writing (medical, scientific and trade journal reporting)
- Poison Control

Please visit [pharmacy.uconn.edu/100-careers-in-pharmacy](https://pharmacy.uconn.edu/100-careers-in-pharmacy) for other opportunities.

► Students following academic tracks other than Pharmacy Studies may also apply to the School of Pharmacy, provided that they meet the requirements. Connect with the School of Pharmacy's administrative offices via email to [pharmacy@uconn.edu](mailto:pharmacy@uconn.edu) to discuss your personal path.



## Preparing To Be a Pharmacy Student

### For those in high school

**T**ake beneficial classes in high school such as upper-level science courses (i.e. chemistry, biology, physics, etc.), as well as pre-calculus and/or calculus.

#### In addition:

- Take three years of a single foreign language
- Incorporate classes that emphasize communication skills
- Consider taking AP and college cooperative classes (taken in high school) that fulfill UConn general education requirements
- Get involved outside of the classroom to develop leadership and time-management skills
- Get pharmacy-related experience (not required) or hold a part-time job
- Participate in extracurricular activities such as athletics, organizations, and clubs


### For those already enrolled in college or for adult learners


**T**ake required prerequisite courses (see proposed plan of study for preprofessional students in the center of this booklet).

#### In addition:

- Take advantage of on-campus support networks available to you (i.e. advising centers, on-campus tutoring, writing centers, etc.)
- Obtain pharmacy-related experience through part-time employment in a community and/or hospital pharmacy
- Shadow a local pharmacist
- Volunteer in humanitarian/health-related fields
- Arrange for summer internships at pharmaceutical companies
- Participate in extracurricular activities
- Participate in preprofessional courses and living/learning communities



- 
- Pharmacy Studies students can opt to join a pharmacy living-and-learning community, a small cluster of 20 to 25 first-year resident students who live, study, and learn together. The students also have a first-year experience course that covers basic university learning skills, but with a focus on pharmacy. Current Pharm.D. students act as mentors. Learn more: [lc.uconn.edu](https://lc.uconn.edu)

- 
- Pharmacy Studies students often join pharmacy student organizations and co-ed fraternities. These programs help connect students to upper class pharmacy students and experiences and often provide motivation to excel during preprofessional years.





## Application & Admission to the Pharm.D. Program

**S**tudents who enter UConn as first-years in BS Pharmacy Studies are considered preprofessional. They take a variety of foundational courses in preparation for the professional program. Transfers and students who make major changes are eligible to apply to the Pharm.D. program if the following criteria are met:

- Complete all required math, science, English, and social science prerequisites by the end of the spring semester for enrollment the following fall.
- Students who have not fulfilled the University of Connecticut General Education Requirements before they enter the professional program will have to complete those courses by May of the second professional year. Summer course work may be considered. Please check that credits transfer prior to signing up for a course.

Visit **[pharmacy.uconn.edu](https://pharmacy.uconn.edu)** for additional information.

---

**TIP:** Our student ambassadors are available to talk or email. We have some who began as first-years and others who transferred in. Find them and connect at **[pharmacy.uconn.edu/ambassadors](https://pharmacy.uconn.edu/ambassadors)**.



### Admission Policy

The School of Pharmacy is a participating member of PharmCAS, the American Association of Colleges of Pharmacy's (AACP) electronic application service. All applicants need to submit an application to UConn School of Pharmacy through the PharmCAS portal. We will consider:

- Cumulative grade point average in the math and science prerequisites
- Overall academic performance
- Non-academic experience, i.e. pharmacy, health care, etc.
- Recommendations and personal statement
- Personal interview (in person or online)

The PCAT test is not required for admission consideration.



### Communication Skills

Pharmacists must have excellent written and oral communication skills. Applicants for whom English is not a primary language or who do not otherwise qualify for a waiver of this requirement must submit a valid TOEFL or IELTS score. The minimum passing TOEFL scores are total score: 94; listening & speaking sections: 27; reading and writing sections: 20. The minimum passing IELTS scores are total score: 7.0 with no lower than 8.0 sub-scores in listening and speaking and no lower than 6.5 sub-scores in reading and writing. Applicants should visit **pharmacy.uconn.edu** for more information or contact us directly. The UConn American English Language Institute (UCAELI) is available to provide further development of English language skills. Visit **ucaeli.uconn.edu** for details.

### Transfer Admissions to Pharm.D. Program

A transfer applicant is a student who is not currently enrolled at UConn and is seeking admission into the preprofessional or Pharm.D. Professional Program.

Restrictions and deadlines apply. Please refer to the Undergraduate Catalog and School of Pharmacy website for current information. Please also see our transfer applicant brochure.

### Tuition

UConn's Office of the Bursar lists complete in- and out-of-state tuition and fees. Discounted New England rates are available to residents of Massachusetts, Maine, Vermont, and New Hampshire. New England tuition rates are available to first-year through senior-year students enrolled in Pharmacy Studies or the Pharm.D. program.



## Pharm.D. Program Enrichment & Experiences

### Honors & Undergraduate Research

**T**he Honors Program is designed for highly motivated students who maintain a high GPA and cap off their research or scholarly interests by writing a thesis. A multitude of enrichment opportunities, research and travel scholarships, a Washington internship, and priority for dormitories on South Campus are available to Honors students. At graduation, Honors students are individually recognized

as Honors Scholars. Their transcripts and diplomas reflect this high honor.

Students may also participate in a research project without being in the Honors Program. Students wishing to conduct research need to identify a faculty research advisor who will supervise and guide the project. Students interested in a particular line of research should contact faculty members who share those interests and discuss the nature of the proposed project.



### University Scholar Program

This prestigious program is for students who wish to pursue nontraditional programs of study of their own creation. The program can be an interdisciplinary mixture of courses from different units within the university, can lead to two degrees, can include graduate studies, and can be tailored to each individual. A three-person faculty committee supervises a University Scholar's program of study. In consultation with the student's committee and the associate dean, certain requirements may be waived. In addition, the University waives the general university fee for every University Scholar for the remainder of their program. Graduation as a University Scholar is the highest academic honor that the University of Connecticut bestows on undergraduate students.

### Joint Pharm.D. Programs

Joint programs allow students to combine their Doctor of Pharmacy degree with select master's and Doctor of Philosophy degree programs. Application to these programs is made during the second professional [P2] year. The following programs are currently available:

➔ Introductory and advanced professional experiences give students the opportunity to learn on the job, supported by preceptors who maintain a guiding role.



### Pharm.D./MPH

A joint Pharm.D./MPH program is offered to students who seek to combine pharmacy education with special skills in public health as it relates to pharmacotherapy and health promotion, disease prevention, and medication safety. Students apply for admission to the MPH program in the spring semester of their P2 year. Accepted students take MPH courses during their third year (after they completed the BS in Pharmacy Studies). Students return to the School of Pharmacy for the last two years of the Pharm.D. program, which consist of both pharmacy and public health courses. Both the Pharm.D. and the MPH will be conferred simultaneously after the program requirements have been successfully met.

### Pharm.D./Ph.D. Program

The School of Pharmacy offers a joint Pharm.D./Ph.D. program. This program targets a small number of students who seek to combine pharmacy education suitable for professional licensure with advanced research-based training in the pharmaceutical sciences. Students completing this program will earn two consecutive degrees, the Pharm.D. and the Ph.D. A modified graduate curriculum will be tailored to shorten the total time required to complete both degrees. Students must meet the admission requirements of both programs and apply to the Ph.D. program in the spring semester of the P2 year as they complete the BS in Pharmacy Studies.

### **LEADERS Track**

In the rapidly changing and highly competitive environment of pharmacy practice, the profession of pharmacy is seeking to identify the leaders of tomorrow. The School of Pharmacy strives to help identify and distinguish these leaders prior to graduation, preparing them to serve in leadership roles. The Pharmacy LEADERS Track is intended to expand the breadth and depth of a student's education and experiences to develop the next generation of pharmacy leaders.

### **Pediatric Track**

As the practice of clinical pharmacy becomes more competitive, the Pediatric Track is designed to provide the pharmacy student with tools to help them succeed as a pediatric clinical practitioner. It allows students interested in pediatric clinical pharmacy to have a multitude of pediatric experiences throughout their time as a pharmacy student and graduate as a Pediatric Pharmacy Scholar.

### **Pharmaceutical Sciences Track**

The Pharmaceutical Sciences Track will provide pharmacy students with greater exposure to the pharmaceutical sciences and related research. The track is designed to help students who are considering working as a pharmacist for a pharmaceutical company or planning to pursue a joint Pharm.D./Ph.D. degree. This flexible track allows a wide range of options designed to fit each student's goals and is designed for easy integration with existing science minors and the pharmacy honors program.

### **Urban Service Track**

The Urban Service Track is a unique collaboration between UConn's schools of Medicine, Pharmacy, Dental Medicine, Nursing, and Social Work; the Quinnipiac University Physician Assistant Program; and the community. The main goal of the Urban Service Track is to develop a group of health care professionals dedicated to caring for Connecticut's urban, underserved populations and practicing in interprofessional teams. Each year a group of students from the six professional schools are selected and admitted into the program. These urban health scholars work as a team to learn to solve challenges of health care in urban areas, including implementing community education and outreach programs, providing direct patient care in free clinics, promoting health literacy and cultural sensitivity, and participating in quality improvement initiatives and community-based research. In addition, urban health scholars participate in conferences focusing on health policy and advocacy activities affecting underserved populations.

Questions or want to visit? Please email [pharmacy@uconn.edu](mailto:pharmacy@uconn.edu).

---

▶ Ambassador students in each of the programs are available to discuss their experiences. Please email [pharmacy@uconn.edu](mailto:pharmacy@uconn.edu).



breakfast and 10 units NPH / 5 units Regular insulin before supper.

- What is the total dose (TDD) of insulin per kilogram of body weight receiving?

Answer

TDD

► UConn Pharmacy faculty are both teachers and researchers, able to provide modern-day perspective to curriculum.

► For more detailed information please visit [pharmacy.uconn.edu](http://pharmacy.uconn.edu).



# Plan of Study

## Proposed schedule for required courses

### 1<sup>ST</sup> PRE-PROFESSIONAL YEAR

ID	COURSE	CONTENT AREA	CREDITS
<b>First Semester</b>			
BIOL 1107	Principles of Biology	3	4
CHEM 1127Q+	General Chemistry	3	4
MATH 1131Q	Calculus		4
ECON 1201••	Principles of Microeconomics	2	3
<b>Second Semester</b>			
ENGL 1007••, 1010, or 1011	Academic Writing		4
CHEM 1128Q	General Chemistry II	3	4
PHYS 1201Q	Physics	3	4
Diversity Course•	General Education Requirements	4	3
Arts & Humanities•	General Education Requirements	1	3

### 2<sup>ND</sup> PRE-PROFESSIONAL YEAR

<b>First Semester</b>			
SOCI 1001*••	Intro to Sociology	2	3
PNB 2264 or 2774	Human Physiology & Anatomy		4
CHEM 2443	Organic Chemistry		3
MCB 2610	Fundamentals of Microbiology		4
W Course•	General Education Requirements		3
E-Literacy	Environmental Literacy		3
<b>Second Semester</b>			
MCB 2000 or 3010	Biochemistry		4-5
PNB 2265 or 2775 & 2776	Human Physiology & Anatomy II		4-6
Chem 2444	Organic Chemistry II		3
Diversity Course•	General Education Requirements	4	3
Arts & Humanities•	General Education Requirements	1	3

Please see the University Catalog for current information on general education requirements: [catalog.uconn.edu/general-education](http://catalog.uconn.edu/general-education)

- It is possible for the W requirement to be fulfilled by courses in content areas 1, 2, or 4.
- Students who have not fulfilled the University of Connecticut General Education Requirements (GER) before entering the professional program must complete those courses prior to the end of their second professional year in order to be awarded the B.S. in Pharmacy Studies.

\* Any 1000-level sociology, psychology, or anthropology course from Content Area 2

•• These courses do not need to be taken in the semester indicated but must be completed during the first two years.

+ CHEM 1124Q, CHEM 1125Q, and CHEM 1126Q as a sequence may be substituted for the CHEM 1127Q and CHEM 1128Q sequence.



## BS Pharmacy Studies Degree Program

The BS in Pharmacy Studies is awarded with a minimum of 137 credits. Introductory Pharmacy Practice Experiences (IPPE) begin in the first professional year and continue through the third professional year (P3).

### 1<sup>ST</sup> PROFESSIONAL YEAR

ID	COURSE	CREDITS
<b>Fall Semester - 20 credits</b>		
PHRX 3000	Cellular Biology	2
PHRX 3002	Foundations in Bioorganic Chemistry	3
PHRX 3006	Drug Information I	1
PHRX 3008	Pharmacy Communications	3
PHRX 3009	Principles of Drug Action	3
PHRX 3030	Pharmacokinetics/Biopharmaceutics	3
PHRX 3050	Public Health & Healthcare Policy	3
PHRX 3060	Pharmacy Skills Development I	2
<b>Spring Semester - 17 credits</b>		
PHRX 3001	Immunology	2
PHRX 3003	Nutrition	2
PHRX 3007	Drug Information II	2
PHRX 3031	Foundations in Pharmaceutics I	4
PHRX 3032	Non-Sterile Pharmaceutical Compounding	1
PHRX 3040	Neurology Module	4
PHRX 3065	Pharmacy Skills Development II	2

### 2<sup>ND</sup> PROFESSIONAL YEAR

<b>Fall Semester - 19 credits</b>		
PHRX 4030	Foundations in Pharmaceutics II	3
PHRX 4031	Sterile Pharmaceutical Compounding	1
PHRX 4040	Psychiatry Module	5
PHRX 4041	Immunology Module	2
PHRX 4050	Pharmacy Practice Management	2
PHRX 4063	Pharmacy Skills Development III	3
	Professional Electives	3
<b>Spring Semester - 17 credits</b>		
PHRX 4000	Pharmacoeconomics	1
PHRX 4001W	Current Topics in Pharmacy	3
PHRX 4042	Gastroenterology Module	2
PHRX 4043	Endocrine Module	3
PHRX 4044	Dermatology Module	1
PHRX 4062	Healthcare and History	2
PHRX 4065	Pharmacy Skills Development IV	2
	Professional Electives	3



### Doctor of Pharmacy (Pharm.D.) Program

Students complete the following two years to earn the Pharm.D. degree (minimum 210 credits).

#### 3<sup>RD</sup> PROFESSIONAL YEAR

ID	COURSE	CREDITS
<b>Fall Semester - 19 credits</b>		
PHRX 5040	Cardiovascular Module	4
PHRX 5041	Renal Module	2
PHRX 5042	Respiratory Module	2
PHRX 5046	Clinical Toxicology	2
PHRX 5060	Pharmacy Skills Development V	3
PHRX 5062	Pharmacy Law and Regulatory Affairs	3
<b>Spring Semester - 15 credits</b>		
PHRX 5043	Infectious Disease Module	4
PHRX 5044	Hematology/Oncology Module	3
PHRX 5045	Special Populations	4
PHRX 5048	Patient Assessment	2
PHRX 5065	Pharmacy Skills Development VI	2



#### 4<sup>TH</sup> PROFESSIONAL YEAR

The following required Advanced Pharmacy Practice Experiences (APPE) are one month each for a total of 36 credits (1 credit = 40 hours).

ID	COURSE	CREDITS
<b>Professional Experience - 16 credits</b>		
PHRX 5100	Community Pharmacy	4
PHRX 5101	Health System Pharmacy	4
PHRX 5102	Ambulatory Care Pharmacy	4
PHRX 5103	General Medicine	4
PHRX 5260	Professional Development I	0
PHRX 5265	Professional Development II	0

Pediatrics or Geriatrics may be substituted for Ambulatory Care or General Medicine.

#### Elective Professional Experience – 20 credits

Students choose 5 from the following list. One month's elective experience is 4 credits. At least two of the elective courses must involve direct patient care (indicated by ••). Please note that the below listed courses may change from year to year. Please visit our website for the latest offerings.

ID	COURSE	ID	COURSE
PHRX 5104	Cardiology••	PHRX 5141	Oncology II••
PHRX 5105	Infectious Disease••	PHRX 5143	Psychiatry II••
PHRX 5106	Oncology••	PHRX 5146	Managed Care II
PHRX 5107	Psychiatry••	PHRX 5147	International Pharmacy I
PHRX 5108	Pediatrics••	PHRX 5149	Critical Care II••
PHRX 5109	Geriatrics••	PHRX 5150	Pain Management••
PHRX 5110	Community Pharmacy II••	PHRX 5152	Patient Safety
PHRX 5111	Critical Care••	PHRX 5153	Academia
PHRX 5114	Emergency Medicine	PHRX 5154	Organ Transplantation
PHRX 5115	Home Health Care	PHRX 5155	International Pharmacy Practice II
PHRX 5116	Health System Pharmacy II	PHRX 5157	Clinical Based Community Practice
PHRX 5117	Industry	PHRX 5161	Pharmacy Informatics
PHRX 5118	Managed Care	PHRX 5164	Infectious Disease II
PHRX 5119	Nuclear Pharmacy	PHRX 5165	Management
PHRX 5122	Long-Term Care	PHRX 5166	Research I
PHRX 5123	Surgery••	PHRX 5167	Urban Service
PHRX 5124	General Medicine II••	PHRX 5169	Leadership
PHRX 5125	Ambulatory Care II••	PHRX 5170	Medical Writing
PHRX 5126	Anticoagulation Service••	PHRX 5171	Antimicrobial Stewardship
PHRX 5128	Hospice Care••	PHRX 5172	Health System Based Clinical Practice
PHRX 5133	Clinical Toxicology	PHRX 5173	Academic Leadership
PHRX 5135	Investigational Drugs	PHRX 5195	Special Topics-Clinical
PHRX 5136	Drug Information	PHRX 5199	Research II
PHRX 5137	Pediatrics II••		
PHRX 5138	Industry II		
PHRX 5139	Professional Organization		
PHRX 5140	FDA		

## Post-Pharm.D. Licensure and Careers

**A**fter earning the Pharm.D. degree, graduates must pass the North American Pharmacist Licensure Examination® (NAPLEX®) before becoming a licensed, practicing pharmacist. The NAPLEX is a national exam that has been developed by the National Association of Boards of Pharmacy (NABP) to assess the graduate's ability to practice pharmacy.

In addition to national licensure, pharmacists need to be registered in the state in which they practice. Although every state varies in their requirements for registration, many states, like Connecticut, require the Multistate Pharmacy Jurisprudence Examination® (MPJE®).

The MPJE combines federal and state-specific law questions to serve as the state law examination. In 2023 the UConn School of Pharmacy had the highest match rate in New England and the sixth-highest in the nation at 93%.

Visit the website [nabp.pharmacy](https://nabp.pharmacy) for your state's requirements.

### Specialization after a Pharm.D. degree

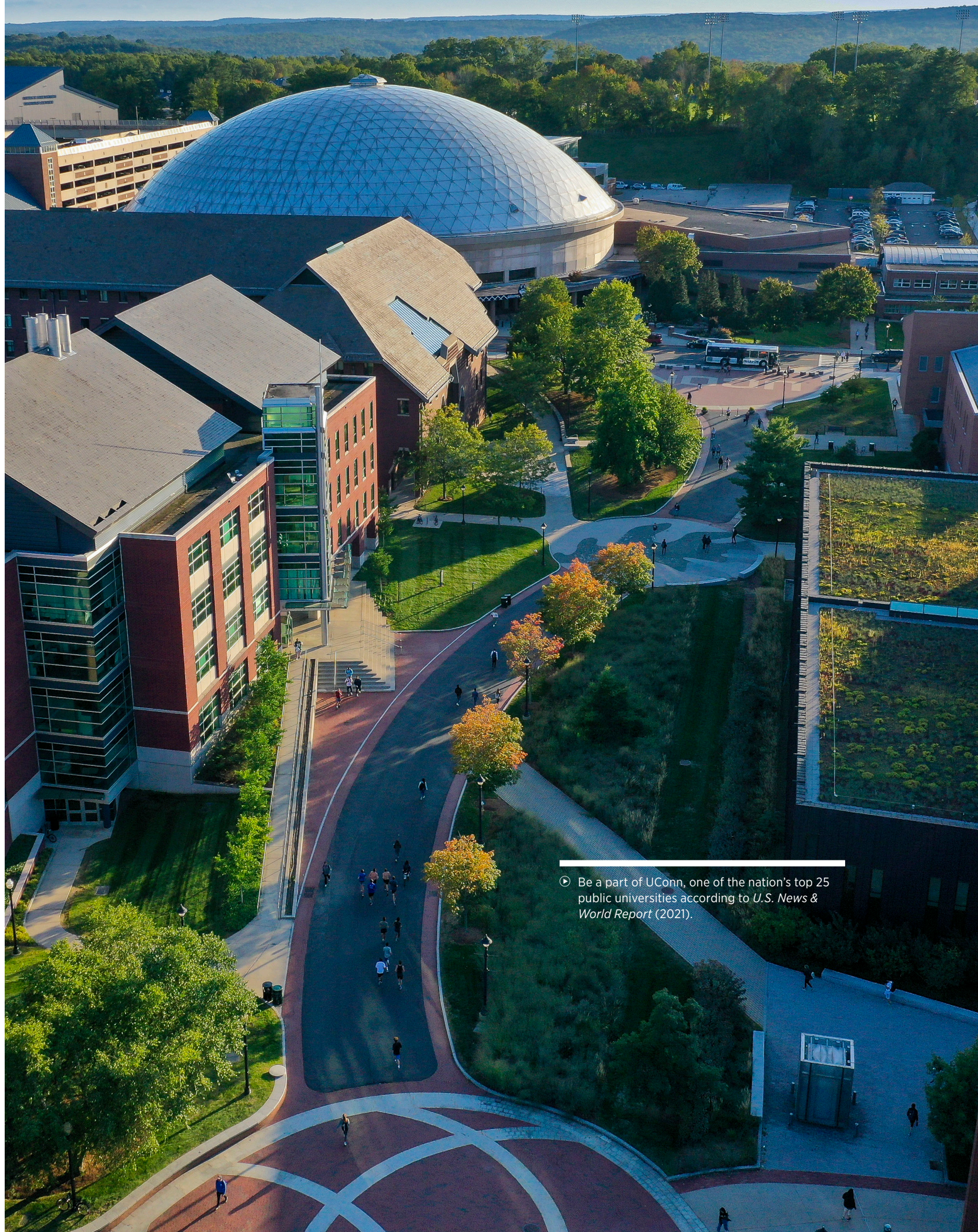
In addition to the many careers available to licensed pharmacists, many graduates continue their education by applying for a residency and/or fellowship. Doctor of Pharmacy (Pharm.D.) postgraduate training typically lasts 12 months or longer and leads to the specialization in an area of pharmacy practice.

By meeting academic and experiential qualifications outlined on the Board of Pharmacy Specialties website at [bpsweb.org](https://bpsweb.org), Doctors of Pharmacy can become board certified in one of the following six specialty areas:

- Ambulatory Care: Integrate health care across community and family practice to maximize pharmacotherapy and outcomes
- Nuclear Pharmacy: Prepare and dispense compound radioactive pharmaceuticals for diagnostic purposes
- Pharmacotherapy: Ensure the safe, economical, and appropriate use of drugs for patients
- Nutrition Support Pharmacy: Provide diet and medication for patients with special needs
- Oncological Pharmacy: Assist with cancer therapy dosing, and education and care regarding side effects
- Psychiatric Pharmacy: Monitor medical and behavioral treatments as they relate to various mental health disorders








► Be a part of UConn, one of the nation's top 25 public universities according to *U.S. News & World Report* (2021).





Introductory Pharmacy  
Practice Experiences  
(IPPE) begin.

Foundational courses  
in pharmaceutical,  
social, and administrative  
pharmacy, as well as  
biomedical and clinical  
sciences.

Apply to UConn  
School of Pharmacy.

Preprofessional  
General education  
and foundational  
coursework.


Preprofessional  
General education  
and foundational  
coursework.

**Road To a  
Pharm.D.**

**YEAR 1**

**YEAR 2**





Take the North American Pharmacist Licensure Examination (NAPLEX) and Multistate Pharmacy Jurisprudence Exam (MPJE) after graduation.

Receive your BS in Pharmacy (an equivalent to senior year in college).

Receive your Pharm.D. degree.

Continued foundational courses in pharmaceutical, social, and administrative pharmacy, as well as biomedical and clinical sciences.

Continued foundational courses in pharmaceutical, social, and administrative pharmacy, as well as biomedical and clinical sciences.

Advanced Pharmacy Practice Experiences (APPE) with preceptors in the field.

Begin professional program. Special tracks can be selected.

Introductory Pharmacy Practice Experiences (IPPE) continue.

Introductory Pharmacy Practice Experiences (IPPE) continue.

1<sup>st</sup> Professional Year

2<sup>nd</sup> Professional Year

3<sup>rd</sup> Professional Year

4<sup>th</sup> Professional Year

**P1**  
**YEAR 3**

**P2**  
**YEAR 4**

**P3**  
**YEAR 5**

**P4**  
**YEAR 6**





The University of Connecticut complies with all applicable federal and state laws regarding non-discrimination, equal opportunity and affirmative action, including the provision of reasonable accommodations for persons with disabilities. UConn does not discriminate on the basis of race, color, ethnicity, religious creed, age, sex, marital status, national origin, ancestry, sexual orientation, genetic information, physical or mental disability, veteran status, prior conviction of a crime, workplace hazards to reproductive systems, gender identity or expression, or political beliefs in its programs and activities. Employees, students, visitors, and applicants with disabilities may request reasonable accommodations to address limitations resulting from a disability. For questions or more information, please contact the Associate Vice President, Office of Institutional Equity, 241 Glenbrook Road, Unit 4175, Storrs, CT 06269-4175; Phone: (860) 486-2943; Email: [equity@uconn.edu](mailto:equity@uconn.edu); Website: <http://www.equity.uconn.edu>.

PHARM\_002\_FY24

**UConn**  
SCHOOL OF PHARMACY

**OFFICE OF ADMISSIONS AND STUDENT AFFAIRS**

69 NORTH EAGLEVILLE ROAD, UNIT 3092  
STORRS, CT 06269-3092

[pharmacy.uconn.edu](http://pharmacy.uconn.edu) | 860.486.2129



@UConnPharmacy