

PHARMACY, M.S.

The pharmacy master's program is a **two-year, combined pharmacy administrative residency** (an ASHP Accredited (<https://accred.ashp.org/aps/pages/directory/residencyprogramsearch.aspx>) PGY-1 and PGY-2, hosted by the UW Health Department of Pharmacy) and **academic degree program**, which culminates in a M.S. degree, emphasizing health system pharmacy management and leadership. **Applicants must be eligible for licensure as a pharmacist in the State of Wisconsin at the point of beginning the program.** The program is designed to provide the pharmacy resident/graduate student with a solid academic foundation and experience in the administration of exemplary pharmaceutical services across an integrated health system.

The primary objective of the program is to develop health system pharmacy administrators who are trained and prepared to immediately assume administrative leadership positions within large, integrated health care delivery systems at the level of managers and assistant directors, and eventually as directors of pharmacy. These positions include oversight of pharmacy operations, clinical programs, medication safety, new business development, supply chain, etc. Residents complete clinical and management rotations in the first year of the program, and advanced administrative and elective rotations in the second year (chosen from a variety of settings, as desired by the resident). The curriculum's flexibility allows for specialization in administrative areas that best complement the student's career goals. Resident activities are varied in scope, depending on each individual's background and areas of interest.

See the **detailed program overview** (including a description of rotations; program strengths; resident competency objectives; projects; presentation, teaching, and travel opportunities).

The UW Health Department of Pharmacy is a leader in the profession, and a leader within the University of Wisconsin Hospital & Clinics in the areas of technology assessment, new business development, information technology, patient safety, resource utilization and regulatory compliance. In 2006, this residency program proudly accepted the inaugural ASHP Foundation Pharmacy Residency Program Excellence Award for producing leaders across the profession.

ADMISSIONS

Please consult the table below for key information about this degree program's admissions requirements. The program may have more detailed admissions requirements, which can be found below the table or on the program's website.

Graduate admissions is a two-step process between academic programs and the Graduate School. **Applicants must meet** the minimum requirements (<https://grad.wisc.edu/apply/requirements/>) **of the Graduate School as well as the program(s)**. Once you have researched the graduate program(s) you are interested in, apply online (<https://grad.wisc.edu/apply/>).

Requirements	Detail
Fall Deadline	April 1
Spring Deadline	This program does not admit in the spring.
Summer Deadline	This program does not admit in the summer.

GRE (Graduate Record Examinations)	Not required.
English Proficiency Test	Every applicant whose native language is not English or whose undergraduate instruction was not in English must provide an English proficiency test score and meet the Graduate School minimum requirements (https://grad.wisc.edu/apply/requirements/#english-proficiency).
Other Test(s) (e.g., GMAT, MCAT)	n/a
Letters of Recommendation Required	0

This is a combined MS degree and post-graduate residency training program. Thus, two applications must be submitted. Applicants without a bachelor's degree may still be considered for admittance with an earned Doctor of Pharmacy or other professional graduate degree.

The first is through the standard Pharmacy Online Residency Centralized Application Service (PhORCAS). For additional details of this application process, see the area regarding "pharmacy administrative residency--applying to the program" on the UW Health website (<http://www.uwhealth.org/health-professionals/internships/pharmacy-administrative-residency/applying/31924/>). **Applications are due in early January; the exact date will be listed on the PhORCAS website.**

The second application is for the MS Pharmacy and is submitted to the UW Graduate School, with an application deadline of April 1. **Only those who are selected for the residency program through the PhORCAS application should apply for this program.**

The program begins in mid-June and M.S. coursework begins in early September.

Applications are not reviewed at any other time during the year. **Applicants to the M.S. program must be eligible for licensure as a pharmacist in Wisconsin due to the program's pharmacy residency requirements.**

FUNDING

PHARMACY M.S. STIPEND/BENEFITS

Students received an annual stipend while participating in this program. Stipends are updated annually and commensurate with other pharmacy residency positions.

Each resident receives 144 hours of PTO (paid time off) annually, inclusive of vacation, holiday, and sick time. As employees of the School of Pharmacy, residents receive health, dental, and vision insurance benefits and full access to the University of Wisconsin-Madison's recreational, educational, and cultural facilities. Tuition costs and university "segregated fees" are paid for by the UW Health Department of Pharmacy. Funding is available for attendance at professional meetings.

GRADUATE SCHOOL RESOURCES

Resources to help you afford graduate study might include assistantships, fellowships, traineeships, and financial aid. Further funding information (<https://grad.wisc.edu/funding/>) is available from the Graduate School. Be sure to check with your program for individual policies and restrictions related to funding.

REQUIREMENTS

MINIMUM GRADUATE SCHOOL REQUIREMENTS

Review the Graduate School minimum academic progress and degree requirements (<http://guide.wisc.edu/graduate/#policiesandrequirements>), in addition to the program requirements listed below.

MAJOR REQUIREMENTS

MODE OF INSTRUCTION

Face to Face	Evening/ Weekend	Online	Hybrid	Accelerated
Yes	No	No	No	No

Mode of Instruction Definitions

Accelerated: Accelerated programs are offered at a fast pace that condenses the time to completion. Students typically take enough credits aimed at completing the program in a year or two.

Evening/Weekend: Courses meet on the UW–Madison campus only in evenings and/or on weekends to accommodate typical business schedules. Students have the advantages of face-to-face courses with the flexibility to keep work and other life commitments.

Face-to-Face: Courses typically meet during weekdays on the UW–Madison Campus.

Hybrid: These programs combine face-to-face and online learning formats. Contact the program for more specific information.

Online: These programs are offered 100% online. Some programs may require an on-campus orientation or residency experience, but the courses will be facilitated in an online format.

CURRICULAR REQUIREMENTS

Requirement Detail

Minimum
Credit
Requirement

Minimum
Residence
Credit
Requirement

Minimum
Graduate
Coursework
Requirement

36 credits

36 credits

18 credits must be graduate-level coursework. Details can be found in the Graduate School's Minimum Graduate Coursework (50%) policy (<https://policy.wisc.edu/library/UW-1244>).

Overall
Graduate
GPA
Requirement

3.00 GPA required.
This program follows the Graduate School's GPA Requirement policy (<https://policy.wisc.edu/library/UW-1203>).

Other Grade
Requirements

Candidates may be dropped from the program if they receive more than 7 credits of grades at the BC level or lower. This applies to formal courses, seminars, and research credits.

Assessments
and
Examinations

A master's research project is required.

Language
Requirements

No additional language requirements.

REQUIRED COURSES

Code	Title	Credits
Fall Semester (Year 1)		
PHM PRAC 961	Graduate Seminar in Health-System Pharmacy	1
PHM PRAC 999	Advanced Independent Study	1
M H R 705	Human Resource Management	3
ISY E 515	Engineering Management of Continuous Process Improvement	3

Elective 2

Spring Semester (Year 1)

PHM PRAC 962	Graduate Seminar in Health-System Pharmacy	1
PHM PRAC 999	Advanced Independent Study	1
S&A PHM 999	Advanced Independent Study	2
ISY E/PSYCH 859	Special Topics in Human Factors Engineering	1-3

Consult with Director of Graduate Studies prior to enrollment in ISYE 859

PHM PRAC 617 Health System Pharmacy Data Analysis and Informatics 2

Fall Semester (Year 2)

PHM PRAC 961	Graduate Seminar in Health-System Pharmacy	1
PHM PRAC 999	Advanced Independent Study	2
ACCT IS 710	Managerial Accounting	3
OTM 752	Project Management	3

OTM 753 can be taken in place of OTM 752 if schedule conflict exists

Spring Semester (Year 2)

PHM PRAC 962	Graduate Seminar in Health-System Pharmacy	1
PHM PRAC 999	Advanced Independent Study	2
S&A PHM 716	Advanced Hospital Pharmacy Administration	2
M H R 728	Bargaining, Negotiating and Dispute Settlement for Managers	3

Elective 2

Total Credits 36-38

Elective Courses

Code	Title	Credits
ISY E 520	Quality Assurance Systems	3
ISY E 555	Human Performance and Accident Causation	3
ISY E/ MED PHYS 559	Patient Safety and Error Reduction in Healthcare	2
ISY E/PSYCH 653	Organization and Job Design	3
ISY E/PSYCH 859	Special Topics in Human Factors Engineering (as approved by advisor)	1-3
ISY E/ POP HLTH 875	Cost Effectiveness Analysis in Health and Healthcare	3
M H R 628	Negotiations	3
M H R 700	Leading People and Organizations	3
M H R 704	Managing Behavior in Organizations	3
M H R 706	Leading and Working in Teams	1
M H R 722	Entrepreneurial Management	3
M H R 728	Bargaining, Negotiating and Dispute Settlement for Managers	3
OTM/ MARKETNG 421	Fundamentals of Supply Chain Management	3
OTM/ MARKETNG 722	Logistics Management	2-3
OTM 753	Healthcare Operations Management	3
OTM 758	Managing Technological and Organizational Change	3
POP HLTH 795	Principles of Population Health Sciences	1-3
POP HLTH/ SOC 797	Introduction to Epidemiology	3
POP HLTH/ ECON 848	Health Economics	1-3

UW-Madison University Special

No coursework taken as a UW-Madison special student may be used to fulfill course requirements in the M.S. degree.

PROBATION

This program follows the Graduate School's Probation policy. (<https://policy.wisc.edu/library/UW-1217/>)

The UW Health Department of Pharmacy also has a disciplinary policy for its residents; contact the Department of Pharmacy for details.

ADVISOR / COMMITTEE

Students/residents are regularly reviewed by the UW Health Senior Director of Pharmacy, the HSPAL Residency Program Director, and program preceptors.

CREDITS PER TERM ALLOWED

15 credits; students must maintain a minimum of 8 credits per semester.

TIME LIMITS

This program follows the Graduate School's Time Limits policy. (<https://policy.wisc.edu/library/UW-1221/>)

GRIEVANCES AND APPEALS

These resources may be helpful in addressing your concerns:

- Bias or Hate Reporting (<https://doso.students.wisc.edu/bias-or-hate-reporting/>)
- Graduate Assistantship Policies and Procedures (<https://hr.wisc.edu/policies/gapp/#grievance-procedure>)
- Hostile and Intimidating Behavior Policies and Procedures (<https://hr.wisc.edu/hib/>)
 - Office of the Provost for Faculty and Staff Affairs (<https://facstaff.provost.wisc.edu/>)
- Dean of Students Office (<https://doso.students.wisc.edu/>) (for all students to seek grievance assistance and support)
- Employee Assistance (<http://www.eao.wisc.edu/>) (for personal counseling and workplace consultation around communication and conflict involving graduate assistants and other employees, post-doctoral students, faculty and staff)
- Employee Disability Resource Office (<https://employeedisabilities.wisc.edu/>) (for qualified employees or applicants with disabilities to have equal employment opportunities)
- Graduate School (<https://grad.wisc.edu/>) (for informal advice at any level of review and for official appeals of program/departmental or school/college grievance decisions)
- Office of Compliance (<https://compliance.wisc.edu/>) (for class harassment and discrimination, including sexual harassment and sexual violence)
- Office of Student Conduct and Community Standards (<https://conduct.students.wisc.edu/>) (for conflicts involving students)
- Ombuds Office for Faculty and Staff (<http://www.ombuds.wisc.edu/>) (for employed graduate students and post-docs, as well as faculty and staff)
- Title IX (<https://compliance.wisc.edu/titleix/>) (for concerns about discrimination)

POLICIES

GRADUATE SCHOOL POLICIES

The Graduate School's Academic Policies and Procedures (<https://grad.wisc.edu/acadpolicy/>) provide essential information regarding general university policies. Program authority to set degree policies beyond the minimum required by the Graduate School lies with the degree program faculty. Policies set by the academic degree program can be found below.

MAJOR-SPECIFIC POLICIES

PRIOR COURSEWORK

Graduate Work from Other Institutions

No coursework taken outside of UW-Madison may be used to fulfill course requirements in the M.S. degree.

UW-Madison Undergraduate

No coursework taken as a UW-Madison undergraduate may be used to fulfill course requirements in the M.S. degree.

Grievance Policy for Graduate Programs in the School of Pharmacy

Any student in a School of Pharmacy graduate program who feels that they have been treated unfairly by a faculty member, staff member, postdoc, or student has the right to have a complaint heard about the treatment and to receive a prompt hearing of the grievance, following these grievance procedures. Any student who discusses, inquires about, or participates in the grievance procedure may do so openly and shall not be subject to intimidation, discipline, or retaliation because of such activity. The person whom the complaint is directed against must be an employee of the School of Pharmacy. Any student or potential student may use these procedures unless the complaint is covered by other campus rules or contracts.

Exclusions

This policy does not apply to employment-related issues for Graduate Assistants in TA, PA and/or RA appointments. Graduate Assistants will utilize the Graduate Assistantship Policies and Procedures (<https://hr.wisc.edu/policies/gapp/>) (GAPP) grievance process to resolve employment-related issues.

Requirements for Programs

The School of Pharmacy requires that each director of graduate studies (DGS) serve as a grievance advisor for the school. The program must notify students of the grievance advisors, including posting the grievance advisor's names in the program handbook. The student will be able to select the grievance advisor of the student's choice and does not need to use the grievance advisor from the student's program.

A grievance advisor may be approached for possible grievances of all types. They will spearhead the grievance response process described below for issues specific to the graduate program, including but not limited to academic standing, progress to degree, professional activities, appropriate advising, and a program's community standards. They will ensure students are advised on reporting procedures for other types of possible grievances and are supported throughout the reporting process. Resources (<https://grad.wisc.edu/current-students/#reporting-incidents>) on identifying and reporting other issues have been compiled by the Graduate School.

Procedures

1. The student is advised to initiate a written record containing dates, times, persons, and description of activities, and to update this record while completing the procedures described below.
2. If the student is comfortable doing so, efforts should be made to resolve complaints informally between individuals before pursuing a formal grievance. If students would like to seek guidance at this informal step, the student can contact the Assistant Dean of Diversity, Equity, and Inclusion, the DGS for the student's program, or the UW Ombuds Office.
3. Should a satisfactory resolution not be achieved AND the complaint does not involve an academic program, the procedure outlined in Step 6 below should be followed. Should a satisfactory resolution not be achieved in step 2, the student should contact an SOP grievance advisor of one's choice to discuss the complaint. The grievance advisor should keep a record of contacts with regards to possible grievances. The first attempt is to help the student informally address the complaint prior to pursuing a formal grievance and should occur within 10 days of notifying the grievance advisor. The student is also encouraged to talk with their faculty advisor regarding concerns or difficulties.
4. If the issue is not resolved to the student's satisfaction, the student may submit a formal grievance to the grievance advisor in writing, within 60 calendar days from the date the grievant first became aware of, or should have become aware of with the exercise of reasonable diligence, the cause of the grievance. To the fullest extent possible, a grievance shall contain a clear and concise statement of the grievance and indicate the issue(s) involved including individuals, the relief sought, the date(s) the incident or violation took place, and any specific policy involved.
5. On receipt of a written grievance, the following steps will occur. The final step must be completed within 30 working days from the date the formal written grievance was received. The program must store documentation of the grievance for seven years. Significant grievances that set a precedent may be stored indefinitely.
 - a. The grievance advisor will convene a SOP faculty committee with at least 3 members to facilitate the grievance following step b, c, and d. The grievance advisor assumes the role of coordinator. Any faculty member involved in the grievance or who feels that they cannot be impartial may not participate in the committee. Committee composition will include at least one member from outside the student's home program.
 - b. The faculty committee, through the grievance advisor, will obtain a written response from the person or persons toward whom the grievance is directed. The grievance advisor will inform this person that their response will be shared with the student filing the grievance.
 - c. The grievance advisor will share the response with the student filing the grievance.
 - d. The faculty committee will make a decision regarding the grievance. The committee's review shall be fair, impartial, and timely. The grievance advisor will report on the action taken by the committee in writing to both the student and the person toward whom the grievance was directed.
6. If either party (the student or the person or persons toward whom the grievance is directed) is unsatisfied with the decision of the program's faculty committee, the party may file a written appeal to the SOP Associate Dean for Research and Graduate Education within 10 working days from the date of notification of the program's faculty committee. The following steps will occur:
 - a. The grievant will be notified in writing, within 5 business days of the written appeal, acknowledging receipt of the formal appeal and establishing a timeline for the review to be completed.
 - b. The associate dean or their designee may request additional materials and/or arrange meetings with the grievant and/or others. If meetings occur, the associate dean or their designee will meet with both the grievant and the person or persons toward whom the grievance is directed.
 - c. The associate dean or their designee will make a final decision within 20 working days of receipt of the committee's recommendation.
 - d. The SOP Associate Dean for Research and Graduate Education must store documentation of the grievance for seven years. Significant grievances that set a precedent may be stored indefinitely.
7. The student may file an appeal of the School of Pharmacy decision with the Graduate School. See the Grievances and Appeals section

of the Graduate School's Academic Policies and Procedures (<https://grad.wisc.edu/documents/grievances-and-appeals/>).

OTHER

n/a

PROFESSIONAL DEVELOPMENT

GRADUATE SCHOOL RESOURCES

Take advantage of the Graduate School's professional development resources (<https://grad.wisc.edu/pd/>) to build skills, thrive academically, and launch your career.

PROGRAM RESOURCES

Professional development opportunities for residents/students include those in the following presentation, teaching, travel, and other categories:

Presentation Opportunities

- Weekly resident seminars
- Resident report presentations, educational presentations and in-services on clinical rotations
- Team and staff meeting leadership
- Leadership of monthly journal club discussions
- Nursing and pharmacy student orientation to pharmacy services
- Major projects are presented at the ASHP Midyear Clinical Meeting, Great Lakes Pharmacy Resident Conference, and Pharmacy Society of Wisconsin (PSW) Annual Meeting and Educational Conference

Teaching Opportunities

- Clinical Instructor status at the University of Wisconsin School of Pharmacy
- Lecturer and small group discussion leader for Drug Information class and participant in a Leadership Course led by our department within the UW School of Pharmacy
- Preceptorship of 4th year students on clinical rotation at UWHC
- Contribution to clinical faculty discussions with students
- Optional teaching certificate program for residents at area hospitals

Other Activities

- Weekly resident lunch seminars with hospital administrators to discuss administrative topics
- Patient and medication safety involvement
- Participation on various patient care committees
- Participation in resident community service projects
- Opportunities to interact with residents in the pharmacy practice, community practice, ambulatory, critical care, infectious disease, medication systems and operations, oncology, transplant, and specialty pharmacy residency programs
- Monthly coffees with the Senior Director of Pharmacy for UW Health

Travel

- ASHP Midyear Clinical Meeting
- Great Lakes Pharmacy Residents Conference
- Pharmacy Administrative Residency Exchange
- Site visits to other health systems and residency programs

- ASHP Leadership Conference
- Pharmacy Society of Wisconsin (PSW) Annual Meeting and Educational Conference

LEARNING OUTCOMES

1. Demonstrates the ability to design, implement, evaluate, optimize, and manage the medication use process using technology, automation, workflow design, application, and optimal skill mix.
2. Thoroughly understands the components of an integrated health system and the role of pharmacy across the continuum of care.
3. Displays knowledge and expertise in the development and coordination of medication use policy to standardize practice, provide optimal patient care, and impact the financial performance of the organization.
4. Demonstrates the ability to manage the supply chain, including inventory analysis, contract negotiation, purchasing, and drug shortage management.
5. Comprehends medication safety principles to ensure safe medication practices.
6. Effectively monitors the financial performance of the pharmacy department, including knowledge of budgeting concepts, reporting of variances, and revenue cycle optimization.
7. Understands the principles of human resource management, including recruitment, interviewing, hiring, performance management, discipline, and effective day-to-day supervision.
8. Demonstrates personal leadership qualities essential to operate effectively within a health system and advance the profession and practice of pharmacy.

PEOPLE

Residency Preceptors (<https://kb.wisc.edu/pharmacyscholarship/90984/>).