PHPR 4880 — Internship in Pharmaceutics -Summer 2015- -Fall 2015/Spring 2016: See program director for appropriate deadlines-

Course Description

This course/experience is an integral component of the BSPS program within the College of Pharmacy and Pharmaceutical Sciences. Students will acquire practical knowledge and hands-on experience in the area of Industrial Pharmacy/Pharmaceutics by working in pharmacies, the pharmaceutical industry or with health care systems. The experience will provide the student an excellent opportunity to work with leaders and leading institutions in pharmacy practice and/or the pharmaceutical industry. They will also gain a contemporary perspective of the principles and concepts described and studied through classroom instruction. Students will complete an eight to 12 week experience at a host institution that will include developing, implementing and reporting on a project that is of importance to the institution and consistent with the student’s program of study.

Syllabus

Students will gain hands-on experience in pharmaceutical compounding, Industrial production, quality control and scale-up processes in a working environment. While each internship will be unique for each student, common as well as experience-specific objectives will be achieved. Projects will involve working with a primary preceptor at the host institution or company and will encompass the development, implementation, analysis and presentation of a research, or practice problems pertaining to the mission of the institutional environment. All projects will promote learning competencies through a structured process of research and inquiry.

► Objective: Problem definition through literature search, review and analysis
  ● Method: Literature and information searching, precedent identification, results analysis

► Objective: Experimental design and implementation
  ● Method: Record work flow path(s) and project execution

► Objective: Record keeping
  ● Method: Maintain laboratory or project notebook detailing aspects of work carried out. Details to be recorded include: date of work; contacts made; materials and methods used; data collected, and raw outcomes assessments. The students will also maintain a journal containing reflections of their experiences in terms of personal and professional development
Objective: Professional communication

- Method: Presentation of electronically assisted paper at the internship site reflective of the project’s background/origin, planning and execution, and results/outcomes. In addition, the students will provide both a written and oral (PowerPoint presentation) to include a brief abstract/summary of the project for presentation at the University and local, regional, or national meeting venues as appropriate. The University presentation will be given during the week prior to the start of school in August, or in December or April if the internship is done during those semesters.

Internship Site

The internship experience will be conducted in a pharmaceutical industry, pharmacy practice setting, and/or manufacturing setting. Other settings may include the pharmaceutical industry, governmental agencies (e.g., FDA, State Board of Pharmacy), professional organizations and offices (e.g., American Pharmacy Association, OPA, public policy agencies), and scientific communication services (e.g., professional publishing firms, database warehouses, etc.).

Performance Evaluation

Students will be evaluated using the “grade only” option. Grades will be determined using on-site preceptor reports, evaluation of the project abstract, presentation and written reports and the project notebooks. The program advisor, with input from the Director of the BSPS Internship and/or chair of the Pharmacy Practice Department, will assign the grade.

Details

- Instructor(s)


- Tentative Schedule

Report to Internship site: May 18-22

Complete Internship rotation, submit paper and provide presentation: August 7 or date to be determined which will be mutually convenient for all.
PHARMACEUTICS

INTERNSHIP EXPERIENCE

Your report must be typed, double-spaced and submitted to Dr. Kenneth Alexander (HEB 114K or email: kenneth.alexander@utoledo.edu) by August 7. Late submissions will not be accepted.

Student name: ___________________________________________________________

Internship site: ___________________________________________________________

Internship supervisor: _____________________________________________________

Dates of Internship experience: _____________________________________________

Specific report contents:

● A 100 word Abstract should be on the cover page of your report

The body of the report must contain the following items:

● Description of project(s)/problem(s) assigned during the internship
● Methodology/methodologies employed
● Results of project(s)/problem(s)
● Discussion of results/findings
● Summary of conclusions
● Career skills acquired
● Impact of this internship experience on your career goals
● Rate this internship experience on a scale of 1-5 (1 = poor; 5 = excellent)
● Would you consider employment at this site? (yes or no – please explain.)