

**Integrated Pharmacotherapy 6: Psychiatry, Neurology, and Pain Management (PTX-6)**  
**PHAR 7586**  
Fall Semester 2024

**Course Description**

This course integrates knowledge pathophysiology, pharmacology, and pharmacotherapy to make appropriate treatment recommendations for pain management and for patients with psychiatric and neurologic disorders.

**Additional Course Information**

This course introduces the pharmacy student to a variety of psychiatric and neurologic disorders. Students will integrate knowledge of pathophysiology, pharmacology, pharmacokinetics, and pharmacotherapy to make appropriate treatment recommendations.

**Course Credit**

5 credit hours

**Pre-Requisites**

P3 standing

**Co-Requisites**

None

**Class Meeting Days, Time & Location**

Tuesdays 2-4:30pm and Thursdays 2-4:30pm; WTB 234

**Course Coordinator**

Jonathan Newsome, PharmD, BCGP

W.T. Brookshire Hall Room 238

[jonathannewsome@uttyler.edu](mailto:jonathannewsome@uttyler.edu)

Office hours:

- Mondays, 1-3 PM and Wednesdays, 1-3 PM (may be in person, via phone, or Zoom; all other times by appointment)
- Preferred method of contact: email

**Fisch College of Pharmacy (FCOP) and UT Tyler Policies**

This is part 1 of the syllabus. Part 2 contains UT Tyler and the FCOP course policies and procedures. These are available as a PDF at <https://www.uttyler.edu/pharmacy/academic-affairs/files/fcop-syllabus-policies.pdf>. For experiential courses (i.e., IPPE and/or APPE), the Experiential Manual contains additional policies and instructions that supplement the Syllabus Part 1 and 2. Please note, the experiential manual may contain policies with different deadlines and/or instructions. The manual should be followed in these cases.

**Required Materials**

Most course required materials are available through the Robert R. Muntz Library. These materials are available either online\* (<http://library.uttyler.edu/>) or on reserve.

1. \*DiPiro JT, Talbert RL, Yee GC, Matzke GR, Wells BG, Posey L. eds. Pharmacotherapy: A Pathophysiologic Approach, 11e. New York, NY: McGraw-Hill. 2020.
2. \*DiPiro JT, Yee GC, Posey LM, Haines ST, Nolin TD, Ellingrod VL. eds. DiPiro's Pharmacotherapy: A Pathophysiologic Approach, 12e. New York, NY: McGraw-Hill. 2022.

3. \*Hammer GD and McPhee SJ, eds. Pathophysiology of Disease: An Introduction to Clinical Medicine (8<sup>th</sup> Edition). Lange-McGraw Hill. 2019.
4. \*Katzung BG, Vanderah TW, eds. Basic and Clinical Pharmacology (15<sup>th</sup> Edition). Lange-McGraw Hill. 2021.
5. **Other required materials will be posted on the classes' Canvas site. The site address is: [uttyler.edu/canvas](https://uttyler.edu/canvas).**

### Recommended Materials

The course recommended materials are on reserve at the Robert R. Muntz Library.

1. Lee M. Basic Skills in Interpreting Laboratory Data. 5<sup>th</sup> Edition. American Society of Health-System Pharmacists. 2013. ISBN: 978-1-58528-343-9
2. Roche VF, Zito SW, Lemke TL, Williams DA, eds. Foye's Principles of Medicinal Chemistry, 8th ed. Wolters Kluwer Health. 2019. ISBN 978-1-49638-502-4

### Course Format

The course may include, but are not limited to, the following activities:

1. Independent study of selected readings
2. Individual readiness assessment tests (iRATs)
3. Team-based learning, active learning strategies:
  - a. Team readiness assessment tests (tRATs)
  - b. Team application of content and concepts
4. Face to face or online classes (synchronous or asynchronous)

### Course Learning Outcomes (CLOs)

<sup>1</sup> CLOs	PLO(s) Assessed for this CLO (1-15) <sup>2</sup>	EPAs (1.1- 6.1) <sup>3</sup>	Assessment Methods <sup>4</sup>	Grading Method <sup>5</sup>	ACPE Std. 11 & 12 (1-4) <sup>7</sup>
1. Identify psychiatric and neurologic disorders and medication-related problems in these patients.	1,2	1.1 1.2	1,2	ES	-
2. Evaluate pharmacologic treatment options for pain management and psychiatric and neurologic disorders.	1	1.2	1,2	ES	-
3. Recommend appropriate non-pharmacologic and pharmacologic treatment options for pain management and patients with psychiatric and neurologic disorders.	1,2,6	1.3	1,2	ES	-
4. Educate patients and caregivers about psychiatric and neurologic medications.	7	4.1	1,2	ES	-

### Course Assessment Methods

	Assessment Method	Description <i>Please provide a brief description of each summative assessment that you plan to use in this course to allow us to identify which ACPE standards are being assessed</i>
1	Multiple Choice or Multiple Selection Question(s)	Standard MCQ and Select All that apply questions.
2	Open Ended Question(s)	Fill the blank, short answer, or short essay questions

## Grading Policy & Grade Calculation

Grades will be determined based on evaluation of individual and team readiness assessment tests (iRATs, tRATs), individual and team cumulative assessment tests (iCATs, tCATs), midterm examinations, final written examinations, skills assessments, graded application assignments, participation in team-based projects, peer evaluations and other assessment methods that may include, but not limited to, Objective Structured Clinical Examinations (OSCE). Examinations, RATs and CATs may consist of, but not limited to, multiple-choice, true/false, fill in the blank, short-answer, essay, and problem-based questions. **Backwards navigation will not be available on summative assessments (e.g. midterms, final).**

During the time the course is in progress, students whose cumulative course percentage falls below 75.0% may receive an academic alert and be subject to periodic course content review in special sessions with the course instructor(s). The student's faculty advisor may receive an academic alert to act upon on the student's behalf.

All examinations, tests, and assignments, including the final examination, may be **cumulative**. Students are responsible for material presented during the prior courses. The grading scale for all graded material is below. The final course grade will be assigned according to the calculated percentage and the percentages will not be rounded upward or downward. For additional information, see examination/assessment policy below.

Standard Grade Calculation*	
Individual Applications/Activities/iRATs	5%
Midterm 1	22.5%
Midterm 2	22.5%
Midterm 3	22.5%
Final Exam	22.5%
tRATs/Team Applications	5%
<b>Total</b>	<b>100%</b>

***\*The final course letter grade will be determined according to the following grading scheme:***

A	90 - 100 %
B	80 - 89.999 %
C	70 - 79.999 %
D	65.0 - 69.999 %
F	< 65.0 %

## Class Attendance and Punctuality Expectations

Students are expected to attend all class sessions, exams, and other course activities and be on time. This includes the beginning of class and return from breaks. For certain class activities (e.g. exams), this requires arrival earlier than the scheduled start time. Students who are tardy or absent for unexcused reasons may miss graded assignments that cannot be made up. Students who are tardy for quizzes, exams, or other course assessments may lose the opportunity to take the quiz or exam, or participate in the assessment, resulting in a grade of zero for that assessment. See the FCOP Syllabus, Part 2, for details of the examination and attendance policies.

### PHAR 7586 Course Schedule – Fall 2024

Week	Day	Hours	TOPIC	Instructor	CLO	Disease State
1	8/27	3	Course Overview Medicinal Chemistry: Anticonvulsants and Opioids	Newsome Abdelaziz	2	S05.99
	8/29	2	Medicinal Chemistry: Anti-Parkinson's agents and Antipsychotics	Abdelaziz	2	S05.99
<b>Labor Day (September 2, 2024)</b>						
2	9/3	3	Medicinal Chemistry: Sedative/Hypnotic/Anxiolytics and Antidepressants	Abdelaziz	2	S05.99
	9/5	2	Pharmacotherapy: Mild-Mod Pain	Dunn	1,2,3,4	S05.06B
3	9/10	3	Pharmacotherapy: Severe Pain	Dunn	1,2,3,4	S05.06A S05.06B
	9/12	2	Neuropathic pain	Newsome	1,2,3,4	S05.06B
4	<b>MIDTERM 1 (September 17, 2024)</b>					
	9/19	3	Pharmacotherapy: Headache/Migraine	Newsome	1,2,3,4	S05.07
5	9/24	2	Pharmacotherapy: MS/Fibromyalgia	Newsome	1,2,3,4	S05.02 S05.22
	9/26	3	Pharmacotherapy: Sickle Cell Disease	Newsome	1,2,3,4	S05.06 B S14.03
6	10/1	3	Pharmacotherapy: Opioid Use Disorder	Yu	1,2,3,4	S05.03
	10/3	2	Pharmacotherapy: Alcohol Use Disorder	Newsome	1,2,3,4	S06.08B
7	<b>MIDTERM 2 (October 8, 2024)</b>					
	10/10	3	Pharmacotherapy: Smoking Cessation	Yu	1,2,3,4	
8	10/15	2	Pharmacotherapy: Epilepsy	Newsome	1,2,3,4	S05.03
	10/17	3	Pharmacotherapy: Essential Tremor	Newsome	1,2,3,4	S05.03
9	10/22	2	Pharmacotherapy: Parkinson's Disease	Newsome	1,2,3,4	S05.05
	10/24	2	Pharmacotherapy: Alzheimer's Disease	Newsome	1,2,3,4	S05.01
10	10/29	2	Pharmacotherapy: Schizophrenia	Bratteli	1,2,3,4	S06.02
	10/31	3	Pharmacotherapy: ADHD	Feimster	1,2,3,4	S06.01
11	<b>MIDTERM 3 (November 5, 2024)</b>					
	11/7	2	Pharmacotherapy: Narcolepsy/RLS/OSA/Other sleep disorders	Yu	1,2,3,4	S06.05 S02.06 S05.10
12	11/12	2	Pharmacotherapy: Insomnia	Brazill	1,2,3,4	S06.05
	11/14	3	Pharmacotherapy: Depression	Feimster	1,2,3,4	S06.03
13	11/19	2	Pharmacotherapy: Depression	Feimster	1,2,3,4	S06.03
	11/21	3	Pharmacotherapy: Anxiety Disorders	Gutierrez	1,2,3,4	S06.13
<b>11/25 - 11/29: Thanksgiving Week – No Class</b>						

14	12/3	2	Pharmacotherapy: PTSD	Bratteli	1,2,3,4	S06.07 S06.16 S06.17
	12/5	3	Pharmacotherapy: Bipolar Disorder	Feimster	1,2,3,4	S06.04
15	12/11	<b>Cumulative Final Exam (9a – 11a)</b>				

*Please note that dates, topics, and assignments are subject to change. In the event of a change, you will be given ample notification of the change. Lecturer will inform students if there is an iRAT/tRAT for that lecture day.*