PHI 6631 (3 credits)
Foundations of Medication Therapy Management I

Course Purpose
The course will introduce the student to the core elements of medication therapy management (MTM), physical assessment skills, communication techniques, and literature evaluation methods needed for the successful provision of MTM. The student will learn how to conduct various types of patient care interviews. Additionally, the student will develop confidence in communicating with patients and providers, performing physical assessment, and analyzing the medical literature.

Course Faculty and Office Hours

Course Coordinator:
Karen Whalen, Pharm.D. BCPS, CDE
Clinical Associate Professor/Associate Chair
Department of Pharmacotherapy & Translational Research
Office: Room 4321 HPNP
Phone: (352) 273-9497
Email: whalen@cop.ufl.edu
Office Hours: 4-5 PM EST on Wednesday and by appointment

Please see Appendix A for a listing of all faculty members involved in this team-taught course.

Place and Time of Class Sessions

Lectures are prerecorded and posted on the course website in the Sakai eLearning system. Lectures may be viewed at the student’s convenience. The students will have one on-campus session during the fifth week of the course (Monday evening through Thursday evening).

How This Course Relates to the Learning Outcomes You Will Achieve in the MS-MTM Program

This course prepares the MS-MTM student to accomplish the following abilities and the related Student Learning Outcomes (SLOs) upon graduation: Demonstrate comprehensive knowledge related to a specific discipline within the pharmaceutical sciences. This course is one of a series that will prepare the student to demonstrate comprehensive knowledge in the area of medication therapy management.
Course Objectives

Upon successful completion of this course, the student will be able to:

1. Establish individual goals for personal practice and identify the MS-MTM program competencies that will enable achievement of these goals.
2. Define the core elements of Medication Therapy Management (MTM).
3. Outline how to provide MTM to an individual patient.
4. Perform and document basic physical assessment of vital signs, vital statistics, and other physical assessment findings necessary for provision of MTM.
5. Utilize appropriate medical terminology when recording physical assessment findings and documenting provision of MTM services.
6. Obtain a thorough medication history from a patient that provides adequate information to conduct a comprehensive medication therapy review.
7. Utilize effective communication techniques when conducting a medication therapy management session.
8. Identify ineffective communication techniques that serve as barriers to the provision of MTM services.
10. Communicate MTM interventions effectively to other healthcare providers.
11. Identify drug information resources necessary for the provision of MTM services.
12. Critically evaluate scientific and professional literature for the purpose of making an MTM intervention.

Pre-Requisite Knowledge and Skills

The student must have successfully completed a Bachelor of Science in Pharmacy or a Doctor of Pharmacy degree, and must be licensed and in good standing with their respective state Board of Pharmacy. The student must be in good academic standing with the MS-MTM degree program.

Course Structure & Outline

The course is offered in a blended learning format that utilizes a combination of live online classroom instruction, self-directed learning (videos, readings, web-based learning), and hands-on experiential activities. To meet the standards for course credit assignment this three-credit course requires a minimum of 48 hours of classroom instruction or the equivalent. Since the face-to-face classroom instruction is less than 48 hours, a number of alternative instructional activities comprise the remainder of the equivalent content and serve to fulfill the curricular equivalency standard. Using a combination of live classroom instruction and alternative methods of instruction ensures that the requirements for course credit assignment are fulfilled. An outline of the course activities and their respective contribution to course credit assignment can be found in the accompanying course schedule document (Appendix B).

Course Outline/Activities
Refer to Appendix B for the course schedule and outline of activities.
Textbooks


Instructors may require additional readings such as clinical guidelines, review articles, book chapters, or websites. They may also provide additional resources to supplement the lecture material. Required or recommended readings will be listed under assignments and responsibilities on the course schedule. The readings will be available under the resources tab on the course website.

Active Learning Requirements

- Designing a medication history interview guide
- Application of living room language to physical assessment terms
- Writing a SOAP note
- MTM Institute (on-campus experience) – physical assessment, patient interviewing, motivational interviewing

Student Evaluation & Grading

Evaluation Methods

Written Assignments 15%
  - Medication History Assignment - 5%
  - Physical Assessment/Review of Systems Assignment - 3%
  - SOAP Note Assignment - 7%
Quizzes 15%
  - Week 2 – 7.5%
  - Week 3 – 7.5%
MTM Institute 30% (includes active participation in all activities, professionalism, punctuality)
Exams 40%
  - Midterm Exam - 15%
  - Final Exam - 25%

Grading Scale

Additional information on minus grades is available on the University of Florida website: [http://www.registrar.ufl.edu/catalog/policies/regulationgrades.html](http://www.registrar.ufl.edu/catalog/policies/regulationgrades.html).

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<thead>
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<tbody>
<tr>
<td>A</td>
<td>93-100</td>
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<tr>
<td>A-</td>
<td>90.0-92.9</td>
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<tr>
<td>B+</td>
<td>86.6-89.9</td>
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<tr>
<td>B</td>
<td>83.3-86.5</td>
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<tr>
<td>B-</td>
<td>80.0-83.2</td>
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<td>C+</td>
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<td>73.3-76.5</td>
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<tr>
<td>C-</td>
<td>70.0-73.2</td>
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<tr>
<td>D+</td>
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<td>D</td>
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<td>D-</td>
<td>60.0-63.2</td>
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<td>E</td>
<td>&lt;60</td>
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Class Attendance Policy

Attendance at the MTM Institute is mandatory. Students who do not attend or do not complete the Institute will receive an incomplete in the course until the Institute can be completed.

Quiz/Exam Policy

The midterm exam will be administered via pencil/paper at the MTM Institute. The final examination and quizzes will be administered online. Online examinations may consist of multiple choice, short answer and/or case-based questions. Thus, online examinations necessitate skills in typing and using a computer. If you do not have strong keyboard skills, please do not delay in contacting the course coordinator. With early intervention you can be directed to Staff members who are equipped to review your needs. Please note that it takes time to build these skills and this is not something that can be done at the last minute. To maintain the highest standards of academic integrity, high stakes online examinations may require the use of a proctoring system. More information on the proctoring system may be found at: http://www.proctoru.com/

Exam grades will be posted within one week of the exam. Notice will be provided to the students if there will be a delay in posting of exam grades.

Students have one week after posting of the exam grades to challenge any exam question. No appeals will be accepted after one week. Written appeals must include the following: the question number, an evidence-based rationale for why the student feels their response is accurate. The exam will be regraded, in full, by a third party. Note: the score of a fully regraded exam may increase, decrease, or stay the same. The regraded score will be considered final.

Make-up Quiz/Exam Policy

Scheduled exams should only be missed for REAL EMERGENCIES. A student who misses an exam should notify the course coordinator via email within 24 hours. Students with an excused absence may be allowed to take a make-up exam. Make-up exams should be arranged with the course coordinator and administered within two weeks of the original exam date.

Policy on Old Quizzes and Assignments

Students will not be provided with old quizzes, exams, or assignments.

Assignment Deadlines

Please submit online assignments early to avert last minute issues with technology. Late submission of assignments will result in a point deduction and may result in a zero grade, depending on the assignment. Students who experience technical difficulty when submitting assignments electronically must notify the course coordinator as soon as possible.
**General College of Pharmacy Course Policies**

The College of Pharmacy has a website that lists course policies that are common to all courses. This website covers the following:

1. University Grading Policies
2. Academic Integrity Policy
3. How to request learning accommodations
4. Faculty and course evaluations
5. Student expectations in class
6. Discussion board policy
7. Email communications
8. Religious holidays
9. Counseling & student health
10. How to access services for student success

Please see the following URL for this information:


**Complaints**
Should you have any complaints with your experience in this course please contact your course coordinator. If you feel that the complaint is not addressed satisfactorily, please visit:

http://www.distancelearning.ufl.edu/student-complaints to submit a complaint.
Appendix A:  Directions for Contacting Faculty & Course Faculty List

Directions for Contacting Course Faculty
All questions pertaining to course logistics should be posted on the course logistics discussion board. Questions for individual lecturers should be posted on the discussion under the relevant topic, so that classmates may benefit from the discussion. Please do not email the lecturers directly unless directed to do so by the course coordinator, or if the question is of a personal nature, i.e., not related to clarification of course content.

Instructors

Paul Doering, M.S.
Paul Doering is a Distinguished Service Professor, Emeritus in the Department of Pharmacotherapy and Translational Research at the University of Florida’s College of Pharmacy. For 28 years he was the Director or Co-Director of the statewide Drug Information and Pharmacy Resource Center at the Health Sciences Center, University of Florida. Over the years, Professor Doering has received numerous honors and awards. He was awarded Teacher of the Year five separate times and in 2007 he was named a member of the University of Florida’s Academy of Distinguished Teaching Scholars. Paul is now enjoying his “retirement” years and is continuing his work with students and pharmacists through lectures, seminars, and other such things.

Justin De Leo, M.Ed.
Justin De Leo is the Instructional Designer for the College of Pharmacy and member of CoP IT. His background is in academic instruction, curriculum development, pedagogical design, technical writing, and information technology. His research interests include social development theory, experiential learning theory, active learning events via mobile technology, the effect of social networking tools to enhance synchronous learning experiences, and redesigning assessment to measure teaching & learning; cognitively & affectively. Justin is committed to education and to supporting those who teach and learn. He is excited for the opportunity to coordinate instructional design for the MTM program, and he looks forward to working with you and helping make your experience here the best it can be.

Carole Kimberlin, Ph.D., FAPhA
Carole Kimberlin is a Professor in the Department of Pharmaceutical Outcomes and Policy. Since coming to the University of Florida, she has taught a course for pharmacy students on “Professional Communications in Pharmacy Practice” and teaches courses in the Ph.D. and M.S. programs on “Measurement in Pharmacy Research” and “Patient Responsibility in Healthcare”. Her research interests include patient decisions on medication use and the effects of pharmacist-patient communication on patient understanding of therapy and adherence to therapy. Dr. Kimberlin is co-author of the widely-used textbook “Communication Skills in Pharmacy Practice”.

Michele Lawson, RHIT
Michele Lawson, RHIT (Registered Health Information Technician) worked in the Office of Experiential Programs at the UF College of Pharmacy for ten years before taking a position at Select Specialty Hospital as the Medical Records Director. She currently serves as the training coordinator for the MTM Call Center at the University of Florida. Michele specializes in communication skills, diversity training, empathic listening, and patient interviewing. She is
currently working towards obtaining her CPLP (Certified Professional in Learning and Performance) credential with the American Society of Training & Development.

Lisa Vandervoort, Pharm.D.
Dr Vandervoort received her Doctor of Pharmacy degree from the University of Florida College of Pharmacy in 1995 and completed a Pharmacy Practice Residency at Shands Hospital at the University of Florida in 1996. She spent 10 years as the Clinical Specialist in Infectious Disease/Internal Medicine at Orlando Regional Medical Center. For the past 3 years Dr Vandervoort has been a Clinical Assistant Professor at the University of Florida both at the Orlando Campus and with the WPPD program. Her primary interests include pharmacokinetics, infectious disease and internal medicine.

Katherine Vogel Anderson
Dr. Vogel Anderson earned her Bachelor of Science degree in biochemistry, with a minor in math, from the Florida State University in 1999. In 2003, Dr. Vogel Anderson graduated with her Doctor of Pharmacy degree from the University of Florida College of Pharmacy. Following this, Dr. Vogel Anderson completed a primary care pharmacy residency at the Malcom Randall Veterans Affairs Medical Center in Gainesville. After her residency, Dr. Vogel Anderson accepted a clinical pharmacy specialist position at the same VA, where she specialized in anticoagulation management. After five years she transferred to the VA geriatric primary care clinic, where she managed anticoagulation, hypertension, and diabetes, among other disease states, as part of a multi-disciplinary healthcare team. Dr. Vogel Anderson joined the Gainesville UF faculty in 2010. In addition to her teaching responsibilities, Dr. Vogel Anderson practices at Oak Hammock, a continuing care retirement community, where her focus is in geriatric patient care.

Karen Whalen, Pharm.D., BCPS, CDE
Dr. Whalen received her Doctor of Pharmacy degree from the University of Florida. She then completed a Pharmacy Practice Residency at the Moses Cone Health System in Greensboro, North Carolina. Subsequently, she completed a Primary Care Residency at the James A. Haley Veterans’ Hospital in Tampa, Florida. Dr. Whalen joined the faculty of the University of Florida College of Pharmacy in 2008 as Assistant Director of the St. Petersburg Campus. Currently, she is a Clinical Associate Professor in the Department of Pharmacotherapy and Translational Research and Director of the MS-MTM Program. Prior to joining the faculty at University of Florida, Dr. Whalen was an Associate Professor of Pharmacy Practice at Nova Southeastern University for twelve years. Dr. Whalen is a Board Certified Pharmacotherapy Specialist and a Certified Diabetes Educator. She is an active member of the Florida Pharmacy Association, and is a past president of that organization.
Appendix B. Schedule of Course Activities/Topics

Lecture schedule

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<thead>
<tr>
<th>Week</th>
<th>Module</th>
<th>Lecture Topic</th>
<th>Lecturer</th>
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<tbody>
<tr>
<td>1</td>
<td>08/27 – 09/02</td>
<td>Course Introduction</td>
<td>Whalen/Riffée Whalen Whalen/De Leo De Leo Zuest</td>
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<td></td>
<td></td>
<td>1.1 Program Welcome/ Course Overview</td>
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<td></td>
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<td>1.2 MTM Institute/ SSEs (Modules 1, 2, 3)</td>
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<td>1.3 Student Affairs</td>
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<td>2</td>
<td>09/03 - 09/09</td>
<td>Communicating with Patients</td>
<td>Lawson Whalen Kimberlin</td>
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<td>2.1 Effective Communication</td>
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<td>2.2 Medication History</td>
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<td>2.3 Motivational Interviewing</td>
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<td>3</td>
<td>09/10 - 09/16</td>
<td>Introduction to Physical Assessment</td>
<td>Whalen Whalen Whalen</td>
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<td>3.1 Medical History</td>
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<td>3.2 Medical Interview</td>
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<td>3.3 Overview of the Physical Exam</td>
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<td>4 &amp; 5</td>
<td>09/17 – 09/30</td>
<td>MTM Institute (9/24-9/27)</td>
<td>Whalen De Leo Jesano Martinez</td>
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<td>5.1 Live lectures on campus</td>
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<td>6</td>
<td>10/01 – 10/07</td>
<td>Introduction to MTM</td>
<td>Whalen Vandervoort Vogel Anderson</td>
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<td>6.1 Intro to MTM</td>
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<td>6.2 SOAP notes</td>
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<td>6.3 Communicating with Providers</td>
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<td>7</td>
<td>10/08 – 10/13</td>
<td>Drug Info Resources and Literature Evaluation</td>
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<td>7.1 Drug Information I</td>
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<td>7.2 Drug Information II</td>
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<td>7.3 Literature Evaluation I</td>
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<td>7.4 Literature Evaluation II</td>
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<td>7.5 Literature Evaluation III</td>
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Exam Schedule

Exam 1: September 26, 2012
Final Exam: October 13, 2012
<table>
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<tr>
<th>Week</th>
<th>Reading Assignment</th>
<th>Learning Responsibility</th>
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</table>
| 1    | Review course syllabus  
Fundamental values of academic integrity  
Program academic standards | View all lectures for week 1  
Complete assignments  
• SSE 1: Professional Email  
• SSE 1: Write to Respond  
• SSE 2: Academic Integrity  
• SSE 2: Academic Dishonesty  
• SSE 3: Academic Planning  
• Time mgmt discussion board posting  
• Student Affairs documents  
  My Directory Profile  
  HIPAA training/Privacy  
  Academic stds agreement  
• Library PubMed tutorial |
| 2    | Changing Behavior with MI  
What is MI?  
MI Principles  
Interaction Techniques  
MI Strategies | View all lectures for week 2  
Complete readings  
Complete assignments  
• Medication history guide  
• Discussion board – medication hx experience  
**QUIZ** |
| 3    | Jones, Chapter 1  
Jones, Chapter 3  
Jones, Chapter 4 | View all lectures for week 3  
Complete assignments  
• Abbreviation guide  
• ROS activity  
• Sample medical history  
**QUIZ** |
| 4-5  | Jones, Chapter 5  
Jones, Chapter 8  
Jones, Chapter 13  
Jones, Chapter 18  
Jones, Chapter 19 | Participate in all MTM Institute activities  
**EXAM 1** |
| 6    | Core Elements of MTM  
Communication with Prescribers  
Clinical Documentation for Patient Care | View all lectures for week 6  
Complete assigned readings  
Complete assignments  
SOAP note activity |
| 7    | Medpage Guide to Biostatistics  
Literature Eval Template | View all lectures for week 6  
**FINAL EXAM** |

*Contribution to course credit assignment*

All assignments will be released on Sakai at least two weeks prior to due date. Reading assignments not contained in the required text will be posted in the Resource folder designated for that week of class. All assignments should be completed on an **individual basis** unless otherwise specified.