Graduate Council Meeting Agenda
E-Vote
August 6th, 2015

1. **New Course Requests:**
   a. MSEN 605 Field Theories in Materials Science
   b. MSEN 617 Crystallography and Crystal Structure Determination
   c. NUEN 608 Fast Spectrum Systems and Applications
   d. OCNG 661 Advanced Oceanographic Data Analysis and Communication
   e. SCSC 640 Intellectual Property in Plant Sciences
   f. SPED 636 Meta-Analysis in Single-case Research

2. **Course Change Requests:**
   a. EDAD 605 The Secondary School Principalship
   b. ESSM 636 Range and Forest Watershed Management
   c. HORT 605 Internet Applications for Horticulture
   d. OCNG 657 Data Methods and Graphical Representation in Oceanography
   e. VIBS 670 Basic Environmental Toxicology

3. **Curriculum Change Requests:**
   a. Addition of MARA 493 and MARA 491 as a directed elective

4. **Special Consideration Items:**
   a. Master of Public Health- Closure of Low Producing Programs

   *The following special consideration item was tabled in the July 2015 Graduate Council Meeting.*
   b. Master of Science in Management- Proposed Change for CIP Code

5. **Informational Items:**
   a. **College of Medicine- First Professional Programs- Changes in Courses**
      i. MEID 700 Becoming a Physician
      ii. MEID 701 Hematology and Oncology
      iii. MEID 705 Medical Student Grand Rounds
      iv. MEDI 709 O.C. Cooper Preceptorship
   b. School of Law- Inactivation of Law School Courses
   c. Texas Maritime Academy- Deck Officer License Requirement
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   a. MSEN 605 Field Theories in Materials Science
   b. MSEN 617 Crystallography and Crystal Structure Determination
   c. NUEN 608 Fast Spectrum Systems and Applications
   d. OCNG 661 Advanced Oceanographic Data Analysis and Communication
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   f. SPEDE 636 Meta-Analysis in Single-case Research

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   d. OCNG 657 Data Methods and Graphical Representation in Oceanography
   e. VIBS 670 Basic Environmental Toxicology

3. **Curriculum Change Requests:**
   a. Addition of MARA 493 and MARA 491 as a directed elective

4. **Special Consideration Items:**
   a. Master of Science in Management- Proposed Change in CIP Code
   b. Master of Public Health- Closure of Low Producing Programs

   *The following special consideration item was tabled in the July 2015 Graduate Council Meeting.*
   c. Master of Science in Management- Proposed Change for CIP Code

5. **Informational Items:**
   a. **College of Medicine- First Professional Programs- Changes in Courses**
      i. MEID 700 Becoming a Physician
      ii. MEID 701 Hematology and Oncology
      iii. MEID 705 Medical Student Grand Rounds
      iv. MEDI 709 O.C. Cooper Preceptorship
   b. School of Law- Inactivation of Law School Courses
   c. Texas Maritime Academy- Deck Officer License Requirement
New Courses
Texas A&M University
Departmental Request for a New Course
Undergraduate • Graduate • Professional
• Submit original form and attach a course syllabus.

Form Instructions

1. Course request type:
   - Undergraduate
   - Graduate
   - First Professional

2. Request submitted by (Department or Program Name):
   Department of Materials Science and Engineering
   MSEN 605, Field Theories in Materials Science

3. Course prefix, number and complete title of course:

4. Catalog course description (not to exceed 50 words):
   Field theory concepts to understand and quantify a wide range of material behaviors, including transportable quantities; development of constitutive relations; linear response theory and Maxwell's equations, deformation and motion of a continuum, Brownian motion, self-assembly and patterning within reaction-diffusion formulations, thermal and ion/charge transport, acoustic waves in solids, Fourier's equations.

5. Prerequisite(s):

   Cross-listed with: ________________________________

   Stacked with: ________________________________

   Cross-listed courses require the signature of both department heads.

6. Is this a variable credit course?  □ Yes  ☑ No
   If yes, from ________ to ________

7. Is this a repeatable course?  □ Yes  ☑ No
   If yes, this course may be taken ________ times.

   Will this course be repeated within the same semester?  □ Yes  ☑ No

8. Will this course be submitted to the Core Curriculum Council?  □ Yes  ☑ No

9. How will this course be graded?  □ Grade  ☑ S/U  □ P/F (CLMD)

10. This course will be:
   a. required for students enrolled in the following degree program(s) (e.g., B.A. in history)

   b. an elective for students enrolled in the following degree program(s) (e.g., M.S., Ph.D. in geography)

   M. Engr., M.S., Ph.D., Materials Science and Engineering

11. If other departments are teaching or are responsible for related subject matter, the course must be coordinated with these departments. Attach approval letters.

12. ☑ I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

13. Prefix  Course #  Title (excluding punctuation)
    MSEN 605  Field Theories Matl. Science

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Approval recommended by: Dr. Miladin Radovic

Department Head or Program Chair (Type Name & Sign)  Date

Chair, College Review Committee  Date

Dean of College  Date

Department Head or Program Chair (Type Name & Sign)  Date

(if cross-listed course)

Submitted to Coordinating Board by:

Chair, GC or UCC  Date

Associate Director, Curricular Services  Date

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra-williams@tamu.edu.

Curricular Services – 07/14
# Field Theories in Materials Science

**MSEEN 605**  
**Fall 2016**

<table>
<thead>
<tr>
<th>Instructor</th>
<th>Dr. A. Amine Benzerga / Dr. Ramesh Talreja / Dr. Alan Needleman, Department of Materials Science and Engineering</th>
</tr>
</thead>
<tbody>
<tr>
<td>Instructor contact</td>
<td>(979) 458-3256; <a href="mailto:talreja@aero.tamu.edu">talreja@aero.tamu.edu</a>; 736A HRBB</td>
</tr>
<tr>
<td>Text</td>
<td>Book: Peter Hertel, 2012, &quot;Continuum Physics&quot;, 1st edition, Springer; Selected papers and handout notes</td>
</tr>
<tr>
<td>Course Description</td>
<td>Introduce a range of field theory concepts for MSEEN students laying a foundation for understanding and quantifying a wide range of material behaviors. Present a comprehensive generic treatment of field theories for continuous media with a focus on materials. Introduce the concepts of fields and field variables beginning with transportable quantities (mass, electric charge, momentum, energy, etc.) and their balance equations. Develop constitutive relations (notably for elasticity, electromagnetism, diffusion and other transport phenomena). Introduce linear response theory and focus on examples such as Maxwell's equations, deformation and motion of a continuum, Brownian motion, self-assembly and patterning within reaction-diffusion formulations, thermal and ion/charge transport, acoustic waves in solids, Fourier's equations.</td>
</tr>
<tr>
<td>Prerequisite:</td>
<td>Basic courses in materials science; graduate classification.</td>
</tr>
<tr>
<td>Learning outcomes</td>
<td>Students will become familiar with the continuum concepts for describing physical phenomena of interest to materials scientists. They will learn how these phenomena are modeled at a macro level based on fundamental knowledge at the atomistic level.</td>
</tr>
<tr>
<td>Grading Assignments</td>
<td>The course letter grade will be based on homework assignments, and midterm and final exams. Homework will be assigned once a week, due the week after, and will carry 30%; the remaining weight will be midterm 30%, and final 40%.</td>
</tr>
<tr>
<td>Grading scale</td>
<td>The final weighted average of each student will be calculated based on the indicated grade distribution. The letter grade will be assigned by the following criterion: A&gt;=90; 80=&lt;B&lt; 90; 70 &lt;= C&lt; 80; 60=&lt;D&lt;70; F&lt;60.</td>
</tr>
<tr>
<td>Copyrights</td>
<td>The handouts used in this course are copyrighted. By &quot;handouts&quot; we mean all materials generated for this class, which include but are not limited to syllabi, lab problems, in-class materials, review sheets, and additional problem sets. Because these materials are copyrighted, you do not have the right to copy the handouts, unless the author expressly grants permission.</td>
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<tr>
<td>Topics to be covered</td>
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<tr>
<td>---------------------</td>
<td>--------------------------------</td>
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<tr>
<td>Week 1</td>
<td>Mathematics preliminaries – tensors.</td>
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<tr>
<td>Week 2</td>
<td>Balance equations</td>
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<td>Week 3</td>
<td>Balance equations, contd.</td>
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<tr>
<td>Week 4</td>
<td>Constitutive equations – general principles</td>
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<tr>
<td>Week 5</td>
<td>Constitutive equations – viscous fluids, elastic solids</td>
</tr>
<tr>
<td>Week 6</td>
<td>Electromagnetism</td>
</tr>
<tr>
<td>Week 7</td>
<td>Midterm Examination (tentative)</td>
</tr>
<tr>
<td>Week 8</td>
<td>Electrostatics</td>
</tr>
<tr>
<td>Week 9</td>
<td>Stress and deformation</td>
</tr>
<tr>
<td>Week 10</td>
<td>Stress and deformation, contd.</td>
</tr>
<tr>
<td>Week 11</td>
<td>Nonlinear/time-dependent constitutive relations (plasticity/viscoelasticity/viscoplasticity)</td>
</tr>
<tr>
<td>Week 12</td>
<td>Transport (mass/thermal/charge)</td>
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<tr>
<td>Week 13</td>
<td>Selected applications</td>
</tr>
<tr>
<td>Week 14</td>
<td>Selected applications, cont.</td>
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</table>

**Americans with Disabilities Act (ADA) Policy Statement**

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu

**Academic Integrity Statement and Policy**

"An Aggie does not lie, cheat or steal, or tolerate those who do." For additional information, please visit: http://aggiehonor.tamu.edu.

As commonly defined, plagiarism consists of passing off as one's own the ideas, work, writings, etc., that belong to another. In accordance with this definition, you are committing plagiarism if you copy the work of another person and turn it in as your own, even if you have the permission of that person. Plagiarism is one of the worst academic sins, for the plagiarist destroys the trust among colleagues without which research cannot be safely communicated. If you have questions regarding plagiarism, please consult the latest issue of the Texas A&M University Student Rules [http://student-rules.tamu.edu/], under the section "Scholastic Dishonesty."

**Attendance**

The University views class attendance as the responsibility of an individual student. Attendance is essential to complete the course successfully. University rules related to excused and unexcused absences are located on-line [http://student-rules.tamu.edu/rule07].
<table>
<thead>
<tr>
<th>Make-up Policy</th>
</tr>
</thead>
<tbody>
<tr>
<td>If an absence is excused, the instructor will either provide the student an opportunity to make up any quiz, exam or other work that contributes to the final grade or provide a satisfactory alternative by a date agreed upon by the student and instructor. If the instructor has a regularly scheduled make up exam, students are expected to attend unless they have a university approved excuse. The make-up work must be completed in a timeframe not to exceed 30 calendar days from the last day of the initial absence. The reasons absences are considered excused by the university are listed below. See Student Rule 7 for details (<a href="http://studentrules.tamu.edu/rule07">http://studentrules.tamu.edu/rule07</a>). The fact that these are university-excused absences does not relieve the student of responsibility for prior notification and documentation. Failure to notify and/or document properly may result in an unexcused absence. Falsification of documentation is a violation of the Honor Code.</td>
</tr>
<tr>
<td>1. Participation in an activity that is required for a class and appears on the university authorized activity list at <a href="https://studentactivities.tamu.edu/app/sponsauth/index">https://studentactivities.tamu.edu/app/sponsauth/index</a></td>
</tr>
<tr>
<td>2. Death or major illness in a student’s immediate family.</td>
</tr>
<tr>
<td>3. Illness of a dependent family member.</td>
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<tr>
<td>4. Participation in legal proceedings or administrative procedures that require a student's presence.</td>
</tr>
<tr>
<td>5. Religious holy day. NOTE: Prior notification is NOT required.</td>
</tr>
<tr>
<td>6. Injury or illness that is too severe or contagious for the student to attend class.</td>
</tr>
<tr>
<td>a. Injury or illness of three or more class days: Student will provide a medical confirmation note from his or her medical provider within one week of the last date of the absence (see Student Rules 7.1.6.1)</td>
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<tr>
<td>b. Injury or illness of less than three class days: Student will provide one or both of these (at instructor’s discretion), within one week of the last date of the absence:</td>
</tr>
<tr>
<td>(i) Texas A&amp;M University Explanatory Statement for Absence from Class form available at <a href="http://attendance.tamu.edu">http://attendance.tamu.edu</a>, or</td>
</tr>
<tr>
<td>(ii) Confirmation of visit to a health care professional affirming date and time of visit.</td>
</tr>
<tr>
<td>7. Required participation in military duties.</td>
</tr>
<tr>
<td>8. Mandatory admission interviews for professional or graduate school that cannot be rescheduled.</td>
</tr>
<tr>
<td>Other absences may be excused at the discretion of the instructor with prior notification and proper documentation. In cases where prior notification is not feasible (e.g., accident or emergency) the student must provide notification by the end of the second working day after the absence, including an explanation of why notice could not be sent prior to the class.</td>
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Texas A&M University
Departmental Request for a New Course
Undergraduate ▪ Graduate ▪ Professional
Submit original form and attach a course syllabus.

Form Instructions:
1. Course request type: □ Undergraduate □ Graduate □ First Professional (DDS, MD, JD, PharmD, DVM)
2. Request submitted by: (Department or Program Name): Department of Materials Science and Engineering
   MSEN 617, Crystallography and Crystal Structure Determination
3. Course prefix, number and complete title of course:

4. Catalog course description (not to exceed 50 words):
   Symmetry operations in point group and space group; reciprocal lattice and kinematical diffraction theory; crystal structure determination by X-ray diffraction and transmission electron microscopy (TEM).

5. Prerequisite(s):
   Knowledge of calculus and vector algebra; graduate classification.

6. Cross-listed with:
   Stacked with:
   Cross-listed courses require the signature of both department heads.

7. Is this a variable credit course? □ Yes □ No
   If yes, from _______ to _______

8. Is this a repeatable course? □ Yes □ No
   If yes, this course may be taken _______ times.
   Will this course be repeated within the same semester? □ Yes □ No

9. Will this course be submitted to the Core Curriculum Council? □ Yes □ No

10. How will this course be graded: □ Grade □ S/U □ P/F (CLMP)

11. This course will be:
   a. required for students enrolled in the following degree program(s) (e.g., B.A. in history)
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   M. Engr., M.S., Ph.D., Materials Science and Engineering

12. If other departments are teaching or are responsible for related subject matter, the course must be coordinated with these departments. Attach approval letters.

13. Prefix Course # Title (excluding punctuation)

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<th>Lec.</th>
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<th>Other</th>
<th>SCH</th>
<th>CRIP and Fund Code</th>
<th>Admin. Unit</th>
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   Approval recommended by:

   Dr. Miladin Radovic
   Department Head or Program Chair (Type Name & Sign) Date

   Chair, College Review Committee
   Dean of College
   Date

   Department Head or Program Chair (Type Name & Sign) (if cross-listed course)
   Date

   Submitted to Coordinating Board by:
   Chair, GC or UCC
   Date

   Effective Date

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu.
Curricular Services – 07/14
MSEN 617
Crystallography and Crystal Structure Determination
Spring 2016
Credits: 3

Instructor: Li Liu
Email: li.liu@tamu.edu
Office Phone: 979-458-1090
Meeting Time: TBD
Meeting Location: TBD
Office Hours: TBD
Office hour location: 227 Reed McDonald Building

Course Prerequisites: Knowledge in calculus and vector algebra; graduate classification.

Course Description: This course focuses on crystal structure and its determination. Symmetry operations in point group and space group are introduced first, followed by the reciprocal lattice and the kinematical diffraction theory. The second part of the class will teach the structure determination by x-ray diffraction and transmission electron microscopy (TEM).

Course Schedule:
Week 1: Elements of crystals: Point group, unit cell, and crystal lattice
Week 2: Elements of crystals: Point group, unit cell, and crystal lattice
Week 3: Space group: symmetry and nomenclature in space group
Week 4: Space group: examples
Week 5: Space group: application in structure determination
Week 6: Basic x-ray Physics: Emission/Adsorption/Reflection of x-rays
Week 7: Reciprocal lattice; Midterm Examination (tentative)
Week 8: Kinematical theory of diffraction
Week 9: X-ray diffraction: powder diffraction
Week 10: X-Ray diffraction: structure determination by powder diffraction
Week 11: X-ray diffraction: single crystal diffraction
Week 12: Transmission electron microscopy: direct imaging
Week 13: Transmission electron microscopy: dynamics diffraction theory
Week 14: Transmission electron microscopy: imaging by diffraction

Reference Books:
Leonid V. Azaroff, Elements of X-Rays Crystallography, McGraw-Hill
The chosen chapters of the first textbook will be printed and handed out in the class since this book is not available for purchase. The second textbook can be downloaded from university library website.
The reference books are supplementary to the lecture note. The student is required to master the material in the notes and the related material in the text books.

**Examinations:** Midterm and comprehensive final examination.
**Problems:** Problem sheets will be assigned through emails.

**Communication:** Problem sheets and class notes will be sent to each student by e-mail. Questions on course material may be sent to Dr. Liu by e-mail.

**Grading:**

<table>
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<th>points</th>
<th>Description</th>
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<td>Homework</td>
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<td>A problem sheet will be assigned each week</td>
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<td>Midterm exam</td>
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<td>90-minute exam</td>
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<tr>
<td>Final exam</td>
<td>50</td>
<td>120-minute exam</td>
</tr>
<tr>
<td>Total</td>
<td>100</td>
<td></td>
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</table>

The final weighted average of each student will be calculated based on the indicated grade distribution. The letter grade will be assigned by the following criterion:

\[ A \geq 85; \quad 75 \leq B < 85; \quad 65 \leq C < 75; \quad 55 \leq D < 65; \quad F < 55 \]

*Grading will not be based on a curve or on normal distribution.*

**Americans with Disabilities Act (ADA) Policy statement:** The Americans with Disabilities Act (ADA) is a federal antidiscrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in room B118 Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu.

**Academic Integrity Statement**

**AGGIE HONOR CODE**

*"An Aggie does not lie, cheat, or steal or tolerate those who do."*

Upon accepting admission to Texas A&M University, a student immediately assumes a commitment to uphold the Honor Code, to accept responsibility for learning, and to follow the philosophy and rules of the Honor System. Students will be required to state their commitment on examinations, research papers, and other academic work. Ignorance of the rules does not exclude any member of the TAMU community from the requirements or the processes of the Honor System. See [http://aggiehonor.tamu.edu](http://aggiehonor.tamu.edu) for more information and for Honor Council.
10) In accordance with Title IX of the Educational Amendments of 1972, Texas A&M University shall treat pregnancy (childbirth, false pregnancy, termination of pregnancy and recovery therefrom) and related conditions as a justification for an excused absence for so long a period of time as is deemed medically necessary by the student's physician. Requests for excused absence related to pregnancy should be directed to the instructor.

Other absences may be excused at the discretion of the instructor with prior notification and proper documentation. In cases where prior notification is not feasible (e.g., accident or emergency) the student must provide notification by the end of the second working day after the absence, including an explanation of why notice could not be sent prior to the class.
Texas A&M University
Departmental Request for a New Course
Undergraduate • Graduate • Professional
• Submit original form and attach a course syllabus.

Form Instructions
1. Course request type:
   □ Undergraduate  ✔ Graduate  □ First Professional (D.D.S., M.D., J.D., Pharm.D., O.D.)
2. Request submitted by (Department or Program Name):
   Department of Nuclear Engineering
3. Course prefix, number and complete title of course:
   NUEN 608 FAST SPECTRUM SYSTEMS AND APPLICATIONS
4. Catalog course description (not to exceed 50 words):
   Design and analysis of nuclear systems and nuclear fuel cycles; data, methods, tools for advanced nuclear system modeling; systems analysis; sustainable development of nuclear energy, fast spectrum systems; partitioning & transmutation; hybrid systems; Advanced Fuel Cycle program; Generation IV fast reactors; design aspects of Advanced Fast Reactors – neutronics, heat removal, safety, materials, systems

5. Prerequisite(s):
   Graduate classification or approval of instructor
   Cross-listed with:
   Stacked with:
   Cross-listed courses require the signature of both department heads.

6. Is this a variable credit course?  □ Yes  ✔ No
   If yes, from _______ to _______

7. Is this a repeatable course?  □ Yes  ✔ No
   If yes, this course may be taken _______ times.
   Will this course be repeated within the same semester?  □ Yes  □ No
   Will this course be submitted to the Core Curriculum Council?  □ Yes  ✔ No

8. How will this course be graded:
   ✔ Grade
   □ S/U □ P/F (CL/MG)

10. This course will be:
   a. required for students enrolled in the following degree programs(s) (e.g., B.A. in history)
      None
   b. an elective for students enrolled in the following degree program(s) (e.g., M.S., Ph.D. in geography)
      MS and PhD in Nuclear Engineering

11. If other departments are teaching or are responsible for related subject matter, the course must be coordinated with these departments. Attach approval letters.

12. ✔ I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

13. Prefix  Course #  Title (excluding punctuation)
    NUEN  608  FST SPCTRNM SYS

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Approval recommended by:
Yassin A. Hassan
Department Head or Program Chair (Type Name & Sign) Date
Chair, College Review Committee Date
Dean of College Date

Submitted to Coordinating Board by:
Chair, GC or UCC Date

Associate Director, Curricular Services Date

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu.
Curricular Services – 07/14
Course title and Number: NUEN 608 FAST SPECTRUM SYSTEMS AND APPLICATIONS
Term (e.g., Fall 200X): Fall 2015
Meeting times and location: TBD

Course Description and Prerequisites

Elective course: for students enrolled in the M.S. and Ph.D. degree programs in nuclear engineering
Credits: NUEN 608(3-0) Fast Spectrum Systems and Applications. Credit 3
Description: design and analysis of nuclear systems and nuclear fuel cycles; data, methods and tools for advanced nuclear system modeling; systems analysis; sustainable development of nuclear energy and fast spectrum systems; partitioning & transmutation science and engineering in radioactive waste management; hybrid systems; Advanced Fuel Cycle program; design aspects of Advanced Fast Reactors – neutronics and heat removal, safety, materials, and systems.
Prerequisites: Graduate enrollment or approval by instructor

Learning Outcomes or Course Objectives

Course Objectives. NUEN 608, "Fast Spectrum Systems" is a 3-hour graduate course. It is intended to provide the graduate students with description of fast reactors and hybrid systems, Advanced Fuel Cycle program, nuclear fuel cycle concepts, partitioning & transmutation in radioactive waste management. The focus will be on the design principles, neutronics and heat removal, control, safety, materials, and systems, licensing aspects, and fuel cycle assessment for fast spectrum systems and their applications. The course will include the semester-long comprehensive design projects. The data, methods and tools for advanced nuclear system modeling will be introduced.

Learning Outcomes. Students who successfully complete this course should be able to:
1. Describe and discuss issues associated with nuclear fuel cycles including the radioactive waste management options and strategies.
2. Describe and discuss perspectives of sustainable development of nuclear energy and fast spectrum systems, partitioning & transmutation science and engineering in radioactive waste management.
3. Describe Advanced Fuel Cycle program and fast reactors.
4. Develop models and methodologies for designing and analyzing nuclear systems, nuclear fuel cycles and their safety characteristics accounting for specific applications including fast reactors and hybrid systems.
5. Design an advanced nuclear system and perform comprehensive analysis of its performance and safety characteristics.
6. Analyze nuclear systems and their fuel cycles including safety, radioactive waste management options and strategies including partitioning and transmutation technologies, and environmental impacts.
7. Design & analyze fast spectrum systems – fast reactors & hybrid fusion-fission systems
9. Describe licensing issues and safety potential of various advanced fast spectrum systems.

Instructor Information

Name: Dr. Pavel V. Tsvetkov
Telephone Number: (979) 845-7078
Email address: tsvetkov@tamu.edu
Office Hours: open door policy
Office Location: Bizzell, 255

Textbook and/or Resource Materials
Text

1. Notes:  
*Fast Spectrum Systems and Applications, lecture notes* (The main information source for course subjects is a set of comprehensive course notes written by the instructor and distributed to the class.)


2. References:  

Grading Policies

Assignments (HW solution sets and FSSDP report):

- **Preparation** (grade penalty up to a full assignment worth for not following the guidelines):  
  
  Each HW solution set: (1) give assignment number and attach assignment as a cover, (2) use only front side of each page, (3) provide brief problem statements, (4) be neat and legible and present work logically to allow easy follow-up, (5) if asked for a numerical result, give formula and number with units, (6) staple your set

  **FSSDP report and materials:** (1) 50 pages (no handwriting) recommended including contents, lists of figures and tables, introduction, problem description, model development, results, conclusions, references, etc., (2) if you created auxiliary materials – list them in the Appendix and E-mail actual materials (including your project presentations), (3) provide the list of references at the end of your report

- **Submission of the HW solution sets and the FSSDP reports and materials:**

  HW solution sets, FSSDP report and materials: Work together is encouraged. The participating classmates must be listed on the first page. However, the final submitted assignments must be individual work efforts. If blatant copying occurred, zero-score for all students involved!

  ALL assignments are due at the start of class on the due date!

  NO late assignments accepted without university excused absence.

  NO assignments will be accepted after the last day of classes! (except for university excused absence)

  **LATE SUBMISSION (1 WEEK TO EXPLAIN AND ASK FOR A NEW DUE DATE):**

  If a student cannot submit his work by the due date, he has 1 week after the due date to explain the reasons for the delay and ask for a new due date. Depending on the provided explanation and the assignment submission history of a student, the new due date will be assigned or denied (the delayed work will not be accepted in this case). NO GRADE PENALTY.

- **Re-submission of HW sets:** If you re-do your assignment, you can increase your grade by at least 10% of the original worth (up to 100% depending on the originality). ONLY ONE RESUBMISSION OF EACH ASSIGNMENT IS PERMITTED.
Structure of final course score:

<table>
<thead>
<tr>
<th>Course Element</th>
<th>Element Score</th>
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<tbody>
<tr>
<td>Homework Problem Sets</td>
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<tr>
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<tr>
<td>Midterm Examination 2</td>
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<tr>
<td>Fast Spectrum System Design Project – Presentation, Series 1 (Initial)</td>
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<tr>
<td>Fast Spectrum System Design Project – Presentation, Series 2 (Progress)</td>
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<tr>
<td>Fast Spectrum System Design Project – Presentation, Series 3 (Final)</td>
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<tr>
<td>Fast Spectrum System Design Project – Final Technical Report</td>
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<td><strong>TOTAL Final Course Score</strong></td>
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Final course grade ranges:

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<td>80 - 89.9%</td>
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<td>70 - 79.9%</td>
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<tr>
<td>60 - 69.9%</td>
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Course Topics, Calendar of Activities, Major Assignment Dates

Topics Covered
1. Fundamentals of nuclear systems, mathematical description of physical phenomena
2. Nuclear data and cross section processing
3. Sensitivity and uncertainty analysis and its applications for nuclear system development
4. Advanced nuclear system modeling: data, methods, tools
5. Design and analysis of nuclear systems and fuel cycles, reactor and nuclear plant design principles, neutronics & heat removal, control, safety, materials, nuclear energy system, safety analysis, licensing of advanced nuclear systems, economics analysis
6. Systems analysis – integrated model application
7. Design aspects of advanced nuclear systems
8. Sustainable development of nuclear energy, nuclear systems and nuclear fuel cycles, fast spectrum systems
9. Partitioning and transmutation science and engineering in radioactive waste management
10. Fast reactors
    - Neutronics (nuclear design, dynamics, control requirements)
    - Systems (core materials, fuel pin and assembly design, fuel pin thermal performance, core thermal hydraulics)
    - Safety (protected and unprotected transients, containment considerations)
    - Sodium-cooled Fast Reactors, Lead-cooled Fast Reactors, Gas-cooled Fast Reactors
    - Advanced Burner Reactors (ABR)
11. Hybrid fast spectrum systems
12. Advanced Fuel Cycle (AFC) program, Generation IV nuclear energy systems and fuel cycles

Prerequisites by Topic
1. Nuclear physics as applied to nuclear engineering, cross-section data, evaluated nuclear data files
2. Reactor physics analysis principles and reactor design
3. Systems of linear equations, eigenvalues, eigenvectors, partial differential equations
4. Nuclear engineering systems and design

Course Structure
1. **Lectures and lecture notes** will cover the course topics and will be made as self-sufficient as reasonably achievable
2. **Homework problem (HW) sets** will be assigned and graded periodically (4 assignments).
3. **Two midterm examinations** will be administered in a take-home format. The time allocation to complete each examination is 2 weeks.
4. **Fast spectrum system design project (FSSDP)** will be assigned in addition to the regular homework assignments. The project will facilitate familiarization with the course topics. Project reports and oral
presentations/defense of the developed designs will serve as the course final examination. The project presentations will be administered in a conference format.

Calendar of Activities and Major Assignments (subject to change)

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<td>2. FUNDAMENTALS OF NUCLEAR SYSTEMS</td>
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<td>2.1. Characteristics of the fission reaction, neutron moderation, practical fuels</td>
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<td>2.2. Reactor power, fuel burnup, and fuel consumption</td>
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<td>2.3. Neutron chain-reacting systems</td>
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<td>2.4. Homogeneous and heterogeneous cores, reflectors</td>
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<td>2.5. Reactor kinetics and dynamics, reactivity feedback</td>
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<td>2.6. Core composition changes during reactor operation, nuclear system lifetime</td>
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<tr>
<td>3. MATHEMATICAL DESCRIPTION OF PHYSICAL PHENOMENA</td>
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<tr>
<td>3.1. General considerations about reactor physics, engineering requirements</td>
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<td>3.2. Description of the neutron distribution</td>
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<td>3.3. Nuclear data, cross sections, and reaction rates</td>
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<td>3.4. Basic scheme of nuclear system modeling methods</td>
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<td>3.5. Deterministic modeling of nuclear systems</td>
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<td>4. NUCLEAR DATA AND CROSS SECTION PROCESSING</td>
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<td>5. SENSITIVITY AND UNCERTAINTY ANALYSIS</td>
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<td>6. SUSTAINABLE DEVELOPMENT OF NUCLEAR ENERGY</td>
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<td>6.3. Radioactive waste management, motivation for partitioning &amp; transmutation</td>
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<td>6.4. Modern analysis methods and codes, nuclear fuel cycle modeling</td>
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<td>7.5. Plutonium recycling - light water reactor MOX, fast reactor MOX</td>
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<td>7.6. Plutonium and minor actinide recycling (light water reactors, fast reactors, and accelerator driven systems)</td>
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<td>7.7. Closed fuel cycle - consequences for geologic disposal</td>
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<td>7.9. Sensitivity, uncertainty and target accuracy for future nuclear systems</td>
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<td>8. DESIGN AND ANALYSIS OF NUCLEAR SYSTEMS AND FUEL CYCLES</td>
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<td>8.7. Fuel cycle optimization: linear and non-linear reactivity models, optimum equilibrium cycles</td>
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<td>8.8. Partitioning and transmutation modeling</td>
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<td>9. ADVANCED NUCLEAR SYSTEM MODELING: DATA, METHODS, TOOLS</td>
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<td>10.2. Uncertainty analysis of advanced fuel cycles</td>
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<td>10.3. Analysis of innovative nuclear systems and fuel cycles</td>
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<td><strong>FAST SPECTRUM SYSTEM DESIGN PROJECT – PRESENTATIONS, SERIES 1</strong></td>
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<td>11. SUSTAINABLE DEVELOPMENT AND FAST SPECTRUM SYSTEMS</td>
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<td>11.1. Spent fuel - light water reactor, light water reactor MOX, fast reactor MOX</td>
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<td>11.2. Radioxicity of fission products</td>
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<td>11.3. Advanced conditioning of minor actinides</td>
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<td>12. PARTITIONING AND TRANSMUTATION SCIENCE AND ENGINEERING IN RADIOACTIVE WASTE MANAGEMENT</td>
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<td>12.1. Aqueous and pyrochemical reprocessing technologies and recycling of transuranic elements and fission products</td>
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<td>13.1. Physics of transmutation, transmutation efficiency</td>
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<td>13.3. Homogeneous recycling</td>
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<td>13.4. Heterogeneous recycling and its potential limitations</td>
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<td>13.5. Transmutation issues of long-lived fission products</td>
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<td>13.7. Transmutation potential of various nuclear systems including dedicated cores</td>
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<td>13.8. Transmutation systems and safety</td>
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<td>14. FAST REACTORS</td>
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<td>14.1. Fast reactor principles</td>
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<td>14.2. Design considerations: materials, neutronics, heat transfer, and systems</td>
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<td>14.3. Fast reactors for actinide transmutation</td>
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<td>15.5. Accelerator driven systems – international trends in research and development</td>
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<td>17.9. Status of the Advanced Fuel Cycle (AFC) research &amp; development activities</td>
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<td>18.6. Concept-specific recycle technologies including partitioning &amp; transmutation</td>
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<td>19.2. Impact of partitioning and transmutation on nuclear non-proliferation</td>
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<td>19.3. Proliferation resistant partitioning and transmutation</td>
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<td>19.4. Global Nuclear Energy trends and the role for fast spectrum</td>
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<td>20.7. Improved reprocessing, waste management and disposal</td>
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<td>23. INTRINSICALLY PROTECTED NUCLEAR POWER</td>
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<td>23.5. Intrinsically protected nuclear power</td>
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Other Pertinent Course Information

Computer Usage
Appropriate use of engineering software and compilers will be encouraged. Justified use of relevant nuclear engineering codes will also be supported.

Americans with Disabilities Act (ADA)
The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu

ATTENDANCE POLICY
The university views class attendance as an individual student responsibility. Students are expected to attend class and to complete all assignments. In all such cases for University Excused absences, a student will be expected to submit a "Texas A&M University Explanatory Statement for Absence from Class" form available at http://student-rules.tamu.edu/rule07.

Religious Holidays
If you are a member of a religious faith that has one or more holidays which require you to be absent from any class listed above, please tell your instructor at least two weeks in advance of your absence and make arrangements to make-up the class.

Copyrights
The handouts used in this course are copyrighted. By "handouts" we mean all materials generated for this class, which include but are not limited to syllabi, lab problems, in-class materials, review sheets, and additional problem sets. Because these materials are copyrighted, you do not have the right to copy the handouts, unless the author expressly grants permission.

Academic Integrity
All students at Texas A&M University are bound by the Aggie Honor Code:
"An Aggie does not lie, cheat or steal, or tolerate those who do."

For more information, the student is referred to the Honor Council Rules and Procedures on the web at http://aggiehonor.tamu.edu.

As commonly defined, plagiarism consists of passing off as one's own the ideas, work, writings, etc., that belong to another. In accordance with this definition, you are committing plagiarism if you copy the work of another person and turn it in as your own, even if you have the permission of that person. Plagiarism is one of the worst academic sins, for the plagiarist destroys the trust among colleagues without which research cannot be safely communicated. If you have questions regarding plagiarism, please consult the latest issue of the Texas A&M University Student Rules [http://student-rules.tamu.edu/], under the section "Scholastic Dishonesty."

Professional Behavior
An important attribute of your professional development is that you act and speak in a manner that will not offend others giving particular care to diversity issues.
Texas A&M University
Departmental Request for a New Course
Undergraduate • Graduate • Professional
• Submit original form and attach a course syllabus.

1. Request submitted by (Department or Program Name): Department of Oceanography
2. Course prefix, number and complete title of course: OCNG 661 Advanced Oceanographic Data Analysis and Communication
3. Catalog course description (not to exceed 50 words): Project design and planning for oceanographers; oceanographic data organization and analysis; synthesis and interpretation of data analysis; technical report writing and presentation.

4. Prerequisite(s): OCNG 603, OCNG 604, OCNG 608, and OCNG 657, or permission of the instructor.

5. Is this a variable credit course? ☑ Yes ☐ No
   If yes, from _______ to _______

6. Is this a repeatable course? ☑ Yes ☐ No
   If yes, this course may be taken _______ times.
   Will this course be repeated within the same semester? ☑ Yes ☐ No

7. This course will be:
   a. required for students enrolled in the following degree program(s) (e.g., B.A. in history)
      Master of Ocean Science and Technology
   b. an elective for students enrolled in the following degree program(s) (e.g., M.S., Ph.D. in geography)
      M.S., Ph.D. in Oceanography

8. If other departments are teaching or are responsible for related subject matter, the course must be coordinated with these departments. Attach approval letters.

9. Prefix Course # Title (excluding punctuation)
   OCNG 661 ADV OCNG DATA ANLS & COM
   Lec Lab SCH CP and Final Code
   0 3 0 0 0 3 4 0 0 6 0 7 0 0 0 2 2 1 4 0 1 6 - 1 7 0 0 3 6 3 2
   Approval recommended by: [Signed]
   [Type Name & Sign] Date
   [Type Name & Sign] Date
   [Type Name & Sign] Date
   [Type Name & Sign] Date

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra-williams@tamw.edu.
Curricular Services – 3/10
Course title and number: OCNG 661 Advanced Oceanographic Data Analysis and Communication
Term: Spring 2017
Meeting times & location: Tuesday & Thursday, 9:35 to 10:50 am. O&M Building, room 303

Course Description and Prerequisites

Project design and planning for oceanographers; oceanographic data organization and analysis; synthesis and interpretation of data analysis; technical report writing and presentation.

Prerequisites are OCNG 603 Communicating Ocean Science, OCNG 604 Ocean Observing, OCNG 608 Physical Oceanography, and OCNG 657 Data Methods and Graphical Representation in Oceanography. These prerequisites are required for all students in the Master of Ocean Sciences and Technology program (MOST). Non-MOST students may take the course with permission of the instructor.

The objective of this course is to apply oceanographic knowledge and data analysis skills to conduct an analysis of a real world oceanographic dataset. Over the course of one semester, students will identify a dataset, conduct a comprehensive data analysis, and produce final products in the form of a Final Technical report and an oral presentation.

Learning Outcomes

On completion of OCNG 661, students will be able to:
1. Plan, manage and organize a data analysis and writing project lasting several weeks.
2. Define a set of project objectives.
3. Explore and analyze a complex oceanographic dataset to meet defined objectives
4. Draw inferences and conclusions based on analysis of data
5. Write a comprehensive technical report.

Instructor Information

Name Daniel C. O. Thornton
Telephone number 979-845-4092
Email address dthornton@ocean.tamu.edu
Office hours Monday 3:00 to 4:00 pm or by appointment
Office location O&M Building 518BA (enter via laboratory 521)

Textbook and/or Resource Material

There are no assigned textbooks or reading for OCNG 661.

Grading Policies

There will be no final or midterm exams for OCNG 661. Your grade will be based on coursework and attendance. Coursework during the semester will contribute to a semester long project culminating in a Final Technical Report and an oral presentation. The following assignments will be given during the semester:
Proposal — Once you have identified a dataset to work on for your Final Technical Report, you will write a short proposal outlining what your dataset is, the objectives of your project, and the analytical approaches you will use to achieve your objectives.

Exploratory data analysis and description - A report summarizing exploratory analysis of your data, addressing issues such as data quality, limitations of the dataset, summary statistics, and what advanced approaches you will use to analyze the data.

Final Technical report – This will be the major product of your project, a comprehensive analysis and write up of your dataset. Note that first drafts of different sections of the report will be due throughout the semester, giving you to he opportunity to revise and refine your Final Technical Report before you hand it in for grading.

Oral presentation – You will give a 20 minute presentation at the end of the semester summarizing your data analysis project.

Grading Scale

A percentage grade will be calculated based on your total points out of the 500 possible points (50 points attendance) + (50 points proposal) + (50 points exploratory data analysis) + (250 final technical report) + (100 presentation) = 500 points).

The grading divisions will be: A (90 -100 %), B (80 - 89 %), C (70 – 79 %), D (60 – 69 %) and F (0 – 59 %). There will be no extra credit. Grades may be curved at the end of the semester. If the grades are curved, they will only be curved upwards with the same curve applied to all students.

Attendance and Make-up Policies

The university views class attendance as an individual student responsibility. Students are expected to attend class and to complete all assignments. See: http://student-rules.tamu.edu/rule07.

Although you will conduct much of the work for OCNG 661 on your own, class attendance is strongly encouraged to ensure that you are making sufficient progress towards your final project goals. Consequently, attendance will contribute to your final grade. If you attend > 85 % of class sessions over the semester then you will receive 50 points towards your final grade, whereas 50 points will be deducted from your final grade if you attend < 85 % of class sessions. University approved excuses or documented participation in oceanographic fieldwork or other professional development will not count as absences.

Academic Integrity

For additional information please visit: http://aggiehonor.tamu.edu

"An Aggie does not lie, cheat, or steal, or tolerate those who do."

As commonly defined, plagiarism consists of passing off as one’s own ideas, words, writing, etc., which belong to another. On accordance with this definition, you are committing plagiarism if you copy the work of another person and turn it in as your own, even if you should have the permission of that person. Plagiarism is one of the worst academics, for the plagiarist destroys the trust among colleagues without which research cannot be safely communicated.
Course Topics, Calendar of Activities, Major Assignment Dates

This table shows the class schedule for OCNG 861. In the unlikely event that major changes need to be made to the schedule you will be notified by email and by postings on eCampus as soon as possible.

**Bold text** indicates that the activity contributes directly to your final grade. **Italics** indicate when drafts of the different sections of your final report should be handed in to the instructor for comments and feedback. Based on this feedback, you will be expected to revise your writing prior to handing in your final report.

<table>
<thead>
<tr>
<th>Week 1</th>
<th>Introduction, technical writing, project design Identify and acquire a dataset for analysis</th>
</tr>
</thead>
<tbody>
<tr>
<td>Week 2</td>
<td>Identify and acquire a dataset for analysis</td>
</tr>
<tr>
<td>Week 3</td>
<td>Proposal writing – scope of work, objectives and/or hypotheses, analytical approaches Proposal due by Friday @ 5 pm</td>
</tr>
<tr>
<td>Week 4</td>
<td>Exploratory data analysis</td>
</tr>
<tr>
<td>Week 5</td>
<td>Exploratory data analysis</td>
</tr>
<tr>
<td>Week 6</td>
<td>Exploratory data analysis and description due by Friday @ 5 pm</td>
</tr>
<tr>
<td>Week 7</td>
<td>Introduction and data analysis</td>
</tr>
<tr>
<td>Week 8</td>
<td>Introduction and data analysis</td>
</tr>
<tr>
<td>Week 9</td>
<td>Data analysis and synthesis Draft of final report data analysis methods section due by Friday @ 5 pm</td>
</tr>
<tr>
<td>Week 10</td>
<td>Data analysis and synthesis, Discussion and conclusions</td>
</tr>
<tr>
<td>Week 11</td>
<td>Data analysis and synthesis Discussion and conclusions Draft of final report results section due by Friday @ 5 pm</td>
</tr>
<tr>
<td>Week 12</td>
<td>Discussion and conclusions Draft of final report discussion/ conclusion section due by Friday @ 5 pm</td>
</tr>
<tr>
<td>Week 13</td>
<td>Individual presentations during class</td>
</tr>
<tr>
<td>Week 14</td>
<td>Individual presentations during class</td>
</tr>
<tr>
<td>Week 15</td>
<td>No final exam for OCNG 861 Final report due by Friday @ 5 pm Finals</td>
</tr>
</tbody>
</table>
Other Pertinent Course Information

You must have a NetID so you can access your email and eCampus through the Howdy portal.

Americans with Disabilities Act (ADA)
The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu
Texas A&M University
Departmental Request for a New Course
Undergraduate • Graduate • Professional
• Submit original form and attach a course syllabus.

Form Instructions
1. Course request type: ☐ Undergraduate ☑ Graduate ☐ First Professional (e.g., DPM, JD, MD, etc.)
2. Request submitted by (Department or Program Name): SCSC
3. Course prefix, number and complete title of course: Intellectual Property in the Plant Sciences
4. Catalog course description (not to exceed 50 words): This course introduces major foci of intellectual property (IP) impacting plant sciences, including: 1) traditional vs. emerging knowledge economies, 2) governing statutes and treaties, 3) forms of IP, and 4) IP asset identification, valuation, capture, and deployment towards understanding best practices for IP strategy development and IP portfolio management.

5. Prerequisite(s): None
   Cross-listed with: NA
   Stacked with: NA
   Cross-listed courses require the signature of both department heads.

6. Is this a variable credit course? ☐ Yes ☑ No
   If yes, from _______ to _______

7. Is this a repeatable course? ☐ Yes ☑ No
   If yes, this course may be taken _______ times.
   Will this course be repeated within the same semester? ☐ Yes ☑ No

8. Will this course be submitted to the Core Curriculum Council? ☐ Yes ☑ No

9. This course will be:
   a. required for students enrolled in the following degree program(s) (e.g., B.A. in history)
   b. an elective for students enrolled in the following degree program(s) (e.g., M.S., Ph.D. in geography)

10. If other departments are teaching or are responsible for related subject matter, the course must be coordinated with these departments. Attach approval letters.

11. ☑ I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

12. Prefix Course # Title (excluding punctuation)
    SCSC 640 INTELL PROP PLNT SCI

    Lect. Lab SCI CHF and Fund Code Admin. Unit Acad. Year FICE Code
    0 3 0 0 0 1 1 1 0 2 0 0 0 5 2 6 2 0 1 4 - 1 5 0 0 3 6 3 2

    Approval recommended by:

    Wayne Smith 7/15
    Department Head or Program Chair (Type Name & Sign) Date

    Chair, College Review Committee 7/15
    Date

    Department Head or Program Chair (Type Name & Sign) Date
    (if cross-listed course)

    Dean of College 7/22/15
    Date

    Submitted to Coordinating Board by:

    Chair, GC or UCC 7/22/15
    Date

    Associate Director, Curricular Services 04/14

    Effective Date

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra-williams@tamu.edu
Curricular Services – 04/14
SCSC 640
Intellectual Property in the Plant Sciences
SYLLABUS

NOTE
This is an ONLINE course.

TUESDAY/THURSDAY classes will be virtual, with students expected to review
online notes/podcasts and complete online quizzes as described below.

EXAMS will be web-based on dates listed below.

Course Description
This course introduces the major foci of intellectual property (IP) impacting plant sciences,
including: 1) traditional vs. emerging knowledge economies, 2) governing U.S. statutes and
international treaties, 3) forms of IP protection, and 4) IP asset identification, valuation, capture,
and deployment towards an understanding of best practices for the development of effective IP
strategies and management of IP portfolios.

Instructor
Russell W. Jessup
Soil & Crop Sciences
Heep 431B
979-315-4242
rjessup@tamu.edu

Class Notes
All course content will be available via both html website
https://IPPS.tonidoid.com/app/webshare/share/IPPS/index.html

and eCampus
https://howdy.tamu.edu/cp/home/displaylogin

***A textbook is NOT required.

Extra Credit
30 points can be earned by:

1) Construction of a 'Wiki' page (http://IPPS.wikispaces.com/) for an instructor
approved IP Strategy and Business Plan.

Quizzes
100 points can be earned through completion of online class quizzes.
Exercises
100 points can be earned through completion of ‘mock’ IP documentation activities.

Examinations
There will be three major examinations, each worth 100 points. There will be no final exam, but 30% of each major exam will be cumulative.

<table>
<thead>
<tr>
<th>Exam Dates:</th>
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</thead>
<tbody>
<tr>
<td>Exam 1: February 13, 2014</td>
</tr>
<tr>
<td>Exam 2: March 27, 2014</td>
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<tr>
<td>Exam 3: April 29, 2014</td>
</tr>
</tbody>
</table>

Instructor Assessment
Feedback is encouraged & always welcome!

Grading

<table>
<thead>
<tr>
<th>Activity</th>
<th>Maximum Points</th>
<th>Grading Scale</th>
<th>Grading Scale</th>
</tr>
</thead>
<tbody>
<tr>
<td>Exam 1</td>
<td>100</td>
<td>450 to 500</td>
<td>= A</td>
</tr>
<tr>
<td>Exam 2</td>
<td>100</td>
<td>400 to 449</td>
<td>= B</td>
</tr>
<tr>
<td>Exam 3</td>
<td>100</td>
<td>350 to 399</td>
<td>= C</td>
</tr>
<tr>
<td>Mock Exercises</td>
<td>100</td>
<td>300 to 349</td>
<td>= D</td>
</tr>
<tr>
<td>Quizzes</td>
<td>100</td>
<td>Below 300</td>
<td>= F</td>
</tr>
<tr>
<td>Total</td>
<td>500</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Learning Outcomes
The successful student should be able to:

- Explain the scope, relevance, and impact of IP upon commercial, environmental, and societal interests.
- Identify the types of materials eligible for IP protection.
- Audit and assess whether a piece of IP merits protection.
- Discuss the major forms of IP: patents, trademarks, copyrights, and trade secrets.
- Describe the process for obtaining a patent.
- Demonstrate the process for filing a plant patent application.
- Discuss the legal environment that impacts plant breeding activities in regards to plant patents vs. plant variety patents.
- Identify restrictions and participatory countries for IP international treaties.
- Demonstrate knowledge of IP transfer and licensing agreement options.
- Evaluate existing and propose improvements for IP portfolios and strategies.
- Identify the areas where IP rights could constrain a business and identify the implications of IP for the business plan.
Course Outline

1. Introduction: IP Culture & the Knowledge Economy
2. Traditional Knowledge vs. Biopiracy
3. *Sui generis* Systems
4. International Treaties: UPOV
5. International Treaties: TRIPS, GATT, CBD, WTO, WIPO
6. Patents: Overview of Patentability
7. Utility Patents: Biotechnology
8. Plant Variety Patents: Germplasm

Exam 1
9. Trademarks, Copyrights, & Trade Secrets
10. USPTO: Mock Patent Search
11. Inventorship, Ownership, Compensation, IP Training: Mock Invention Disclosure
12. Confidential Information: Mock CIA
13. IP Audit: Mock IP Audit Questionnaire
14. IP Value: Core Asset Class
15. Competitive Intelligence
16. Cyberspace: IP and IT Cooperation

Exam 2
17. IP Transfer: License Agreements
18. IP Transfer: Exclusivity, Field of Use, Compensation, Termination
19. IP Transfer: Due Diligence
20. IP Enforcement: Liability, Role of Counsel
21. Case Studies: USA, EU, China, Russia, Australia, India, Brazil, South Africa
22. IP Portfolio
23. IP Strategy
24. Leveraging IP Value: Mock Boilerplate

Exam 3

**Aggie Honor Code**

"An Aggie does not lie, cheat, or steal or tolerate those who do."

Upon accepting admission to Texas A&M University, a student immediately assumes a commitment to uphold the Honor Code, to accept responsibility for learning and to follow the philosophy and rules of the Honor System. Ignorance of the rules does not exclude any member of the Texas A&M University community from the requirements or the processes of the Honor System. For additional information please visit: [www.tamu.edu/aggihonor/](http://www.tamu.edu/aggihonor/).

**Americans with Disabilities Act (ADA)**

**Policy Statement**

The Americans with Disabilities Act (ADA) is a federal antidiscrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact the Department of Student Life, Services for Students with Disabilities in Room 126 of the Koldus Building, or call 845-1637. [http://disability.tamu.edu/](http://disability.tamu.edu/)
Texas A&M University  
Departmental Request for a New Course  
Undergraduate • Graduate • Professional

- Submit original form and attach a course syllabus.

GRADUATE STUDIES

---

4. Catalog course description (not to exceed 50 words):
   Steps of conducting a meta-analysis of single-case research studies.

5. Prerequisite(s):

   Doctoral classification; Approval of instructor;

   Cross-listed with:  
   Stacked with:  

   Cross-listed courses require the signature of both department heads.

6. Is this a variable credit course?  
   Yes  
   No

   If yes, from ________ to ________

7. Is this a repeatable course?  
   Yes  
   No

   If yes, this course may be taken ________ times.

   Will this course be repeated within the same semester?  
   Yes  
   No

8. Will this course be submitted to the Core Curriculum Council?  
   Yes  
   No

9. How will this course be graded:  
   Grade  
   S/U  
   P/F (CLMD)

10. This course will be:
   a. required for students enrolled in the following degree programs(s) (e.g., B.A. in history)
      Special Education PHD students.
   b. an elective for students enrolled in the following degree program(s) (e.g., M.S., Ph.D. in geography)

11. If other departments are teaching or are responsible for related subject matter, the course must be coordinated with these departments. Attach approval letters.

12. I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

13. Prefix  
    Course #  
    Title (excluding punctuation)

    | Dept. | Lab | Other | SCH | CIP and Fund Code | Admin. Unit | Acad. Year | FTE Code |
    |-------|-----|-------|-----|-------------------|-------------|------------|----------|
    | 3.00  | 0.00| 0.00  | 3.00| 1310130004        | 0920        | 16         | 0 0 3 6 3 2 |

    Approval recommended By:
    Victor Willson, Ph.D.
    Department Head or Program Chair (Type Name & Sign)  
    Date

    Department Head or Program Chair (Type Name & Sign)  
    Date (if cross-listed course)

    Submitted to Coordinating Board by:
    Chair, GC or UCC  
    Date

    Date  
    Effective Date

---

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra-williams@tamu.edu
Curricular Services – 07/14
SPED 626: META-ANALYSIS IN SINGLE-CASE RESEARCH

Special Education Program
Department of Educational Psychology
College of Education & Human Development

Summer 2015
MW 9-12
EDCT (Harrington Tower) 717

Instructor: Jennifer B. Ganz, Ph.D., BCBA-D
Email: jeniganz@tamu.edu
Office Address: Harrington 637G
Office Hours: By appointment at mutually convenient time (in person, by phone, or online) – email to set an appointment

DESCRIPTION
Students will complete the steps of conducting a meta-analysis of single-case research studies.
Prerequisites: This course is intended for doctoral-level students, whose emphasis is applied behavior analysis; approval of instructor.

REQUIRED READINGS


Additional readings assigned by instructor.

---

**EXPECTATIONS AND POLICIES**

1. **Appropriate Language**

   Students are expected to use appropriate language in both verbal communications and written work. People with disabilities are just that: people who happen to have physical, sensory, behavioral, learning, or intellectual disabilities. Please avoid terms like "the handicapped", "ED kids" etc. Instead, you will be expected to communicate in a way that puts "people first". For example, "the student with antisocial behaviors", "a student with an emotional and behavioral disorder", "students with a learning disability". This small change emphasizes the humanity and the individuality of the person and clarifies that a disability is only one of many characteristics (and not necessarily the most important) that a person can possess.

2. **Diversity**

   Effective teaching involves understanding and acceptance of the diverse backgrounds and contexts of students, families, and educators. Efforts at cultural sensitivity should be stressed and expected in all interactions with other students and instructors for this course.

3. **Due Dates**

   All assignments should be submitted ON or BEFORE THE ASSIGNED DUE DATE except in cases of excused absences. While understanding that everyone is busy with school and work, your decision to register for this course is an indication that you have made it a high priority. Therefore, assignments past the due date will not be accepted without documented, reasonable justification. Obviously, crises take place (e.g., death in the family, child who is sick, etc.) that can reasonably result in missed deadlines. *Examples of unreasonable extensions for an assignment include: frequent computer malfunctions, outside class-work, or job responsibilities that inhibit meeting the required deadlines*. If you anticipate missing a deadline on an assignment, you should send an email (before the deadline) with the following information:

   (a) The circumstances that require that you miss the assignment.

   (b) A copy of documentation of the issue.

Whether an extension is allowed will be at the instructor's discretion.

4. **Assignments**

   All assignments must be typed, double-spaced, and in 12 point font with no more than 1” margins on all sides. You are encouraged to check your papers for spelling and grammar. Papers that are not typed will not be accepted. You will turn in all assignments online, using the Turnitin tool. When turning in assignments, please begin your file name with your last name, your first name, then the assignment name. Include a title page with:
Your full, official name (according to current TAMU records)

Date

Course number

Instructor’s name

Honor pledge:

"On my honor, as an Aggie, I have neither given nor received unauthorized aid on this academic work."

__________________________

Signature of Student [Type your name in lieu of your signature on items turned in electronically.]

5. Plagiarism

While collaboration is encouraged, plagiarism will result in sanctions. Plagiarism is defined as an attempt to "steal and pass off as one's own the ideas or words of another" (Webster, 1967, p. 646). Examples of plagiarism are turning in copies of other student's assignments as your own and copying words, even just three in a row, from an article without appropriately citing the work. Please paraphrase others' work when you are citing it. That it, put the information completely in your own words. Direct quotes tend to be overused and do not demonstrate that you understand the material. The Aggie Honor Code: "An Aggie does not lie, cheat or steal, or tolerate those who do."

Please review the Honor Council Rules and Procedures on the web: aggiehonor.tamu.edu You are responsible for their contents. I cannot stress enough: cite, cite, cite your sources.

6. Grading Concerns

Many times during the course of a semester students will have concerns regarding the assignment of a particular grade. Some of the grading is subjective (e.g., responses to guided reading questions) while other aspects are more objective (e.g., midterm and final). If you have concerns regarding a particular grade, then please set up an appointment to discuss your grade. In addition to setting up an appointment, you should submit your work with a typed memo indicating your concerns. Grades of “Incomplete” are strongly discouraged and will not be issued except in extraordinary circumstances.

7. Participation, Professionalism, and Student Conduct

In-class participation (i.e., asking thoughtful questions, working with groups on application assignments etc.) and professionalism (e.g., coming on time to class, being prepared, notifying the instructor of late assignments in advance, paying attention in class, following grading protocols, etc.) is expected. Please do not sleep in class, work on assignments for either this class or another class, browse the internet or access email, engage in discussions unrelated about class content, text message, or other related behaviors that are not consistent with professionalism and participation in the course. If student conduct is unacceptable (e.g., talking in class), an email or written notification will be sent to the student and his/her advisor identifying the problem behavior and asking that the student change his/her behavior to meet class expectations. If the problem behavior continues, a meeting between the student and his/her advisor will be made to discuss a plan of action to correct the problem behavior.

8. Absences

Attendance is required at all class meetings unless the student has an excused absence (e.g., illness that requires bed rest) that can be documented. Information presented and learning activities in each class are not available through any other means. If a class is missed, the student is responsible for all material covered in class including all handouts. Much of the information and materials given in class are only available in class. If you are absent, the instructor will not have extra copies of handouts when you return to class. If absent, do not ask the instructor what was missed. Instead, find a class contact person who will share information and notes/handouts that were missed. For more information on attendance please review student rule 7: http://student-rules.tamu.edu/rule07

Class contact person: __________________________

Students are required to be familiar with the university student academic rules, which can be found here: http://student-rules.tamu.edu/academicrules

To be excused the student must notify his or her instructor in writing (acknowledged e-mail message is acceptable) prior to the date of absence if such notification is feasible. In cases where advance notification is not feasible (e.g. accident, or emergency) the student must provide notification by the end of the second working day after the absence. This notification should include an explanation of why notice could not be sent prior to the
class. Accommodations sought for absences due to the observance of a religious holiday can be sought either prior or after the absence, but not later than two working days after the absence.

9. Recordings
No electronic recording of lectures or class sessions may be done without written prior permission of the instructor.

<table>
<thead>
<tr>
<th>CLASS ASSIGNMENTS</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Activity</strong></td>
</tr>
<tr>
<td>Weekly Activities, Attendance, &amp; Participation</td>
</tr>
<tr>
<td>Meta-Analysis Components &amp; Manuscript</td>
</tr>
</tbody>
</table>

Due dates are listed on the schedule.
*Please keep all coursework until you receive your final grade on your transcript.

Grading scale:
A = 90-100%   B = 80-89%
C = 75-79%    D = 70-74%   F = less than 70%

Weekly Activities, Attendance, & Participation

*In class activities:
About once a week, students will participate in individual or group activities in class. Handouts will be posted online prior to class. You are responsible for either printing the assignment in advance or bringing your laptop with the assignment downloaded. Every time a group or individual assignment is given during class time, you must turn in a written product. In-class activities will be due the day of class. These assignments will not be accepted at a later date. Students attending via distance sites may scan and email their assignments within 24 hours after class or type on a laptop during class and email them during class. Credit will be given for participation, effort, and correct/accurate responses.

Attendance and participation in this course are expected (see above).

*Attendance expectations:
1. Absent only in the case of emergency
2. Punctual
3. Contacts peer to find out what transpired during absence and makes provisions to learn/know the material covered

*Class participation expectations:
1. Offers insights, comments and/or actively contributes to discussions
2. Contributions reflect understanding of reading and content from earlier classes
3. Uses effective speaking strategies (such as eye contact, appropriate language, tone, and volume)
4. Demonstrates positive interpersonal skills (encourages others, offers assistance to others, does not criticize others, builds upon positive contributions of others, displays a sense of humor)
5. Is respectful, does not interrupt or talk when others are talking, does not dominate conversation

Meta-Analysis Manuscript (due dates for multiple parts – see schedule)
The aim of this paper is to contribute to the current literature regarding the state of an evidence-based educational practice for individuals with autism spectrum disorders or others who engage in challenging behaviors. This will be accomplished by submitting a manuscript for publication to a peer-reviewed or professional journal.

The course will focus on conducting and writing up at least one meta-analysis. Each student will be graded according to his or her amount and quality of contribution to the following components of the manuscript:
- Table of documents found via search
- Table of included articles
- Table of coded articles
- Excel file with ES calculations (stats software printouts)
- First drafts of forest plots, intro, & methods
- First drafts of table, results, & discussion
- Second drafts of all documents
- Final drafts of all documents

The instructor will guide the class in completing each step of the process and will provide feedback to guide revisions of each written product.

Grading Criteria for Written Products:
- Thoroughness of content overall
- Thoroughness of literature/research
- Organization and flow
- Inclusion of all requirements
- Graduate level of writing and thought
- Correct APA format for headings, subheadings, in-text citations, and the reference list. Cite sources throughout your paper each time you report information that came from another source. Paraphrase – do not plagiarize or use words taken from your sources. Include the honor pledge on your title page.
- Grammar, spelling, and flow/organization
- Completion of each component on time
• Quality of revisions (final copy)

Submit your papers via eLearning by the due date and time.

*There will be no opportunities for extra credit in this course.*
<table>
<thead>
<tr>
<th>Week</th>
<th>Topic</th>
<th>Guest Lecturer</th>
<th>Assignment Due</th>
</tr>
</thead>
</table>
| 1    | Intro to meta-analysis in SCR  
Determine a topic  
Conduct a preliminary literature search for depth of the literature and recent metas/lit reviews |                      | Table of documents found via search  
Assignment due by the first day:  
• Read the assigned metas  
  Bowman-Perrott, Ganz, Ninci).  
  Pay particular attention to the methods and results, but read the whole thing. Develop one outline of the steps needed in conducting and writing up a meta. |
| 2    | Determine search criteria  
Conduct search  
Make a table of all documents found in the searches | Reference librarian   | Read the two Kratochwill and the Maggin articles  
For the selected autism intervention, come up with a list of key words you might use for the meta. |
| 3-4  | Determine inclusion/exclusion criteria  
Judge all documents for inclusion/exclusion  
IRR for inclusion/exclusion  
Hand search of references for included documents |                      | Table of included articles |
| 5-6  | Determine moderators and columns for coding articles  
Code all included articles  
IRR for coding of articles | John Davis            | Table of coded articles |
| 7-8  | Determine what comparisons to make from graphs  
Extract data from graphs | John Davis            | Read Parker article  
Excel file with ES calculations (stats software printouts) |
| 9-10 | Calculate Tau-U effect sizes for moderators  
Write introduction  
Write methods | John Davis            |                                                                  |
| 11-12| Create table summarizing included articles  
Review analyses, write results | John Davis            | First drafts of intro, & methods |

**SPED 626: Meta-Analysis in Single-Case Research**

**TENTATIVE AGENDA FOR CLASS MEETINGS AND TOPICS**
| 13-14 | Final revisions and submission  
Determine additional  
manuscripts (including quality  
indicators) to draft | Final drafts of all documents  
Readings: Quality Reviews  
(Camargo, Hong) |
Americans with Disabilities Act

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu

Plagiarism Statement: As commonly defined, plagiarism consists of passing off as one's own the ideas, words, writings, etc., which belong to another. In accordance with this definition, you are committing plagiarism if you copy the work of another person and turn it in as your own, even if you should have the permission of that person. Plagiarism is one of the worst academic sins, for the plagiarist destroys the trust among colleagues without which research cannot be safely communicated. If you have questions regarding plagiarism, please consult the latest issue of the Texas A&M University Student Rules, http://student-rules.tamu.edu, under the section "Scholastic Dishonesty".

Copyright Statement: The materials used in this course are copyrighted. These materials include but are not limited to syllabi, quizzes, exams, lab problems, in-class materials, review sheets, and additional problem sets. Because these materials are copyrighted, you do not have the right to copy the handouts, unless permission is expressly granted.

Scholastic Dishonesty: Instances of scholastic dishonesty will be treated in accordance with Section 20 of the TAMU Student Rules. Please inform yourself on the student rules regarding cheating, plagiarism, fabrication of information, conspiracy at the new website aggiehonor.tamu.edu

Academic Integrity: "An Aggie does not lie, cheat, or steal, or tolerate those who do." Upon accepting admission to Texas A&M University, a student immediately assumes a commitment to uphold the Honor Code, to accept responsibility for learning, and to follow the philosophy and rules of the Honor System. Students will be required to state their commitment on examinations, research papers, and other academic work. Ignorance of the rules does not exclude any member of the TAMU community from the requirements or the process of the Honor System. For additional information, please visit aggiehonor.tamu.edu

Respect Statement: The faculty of the College of Education and Human Development value and respect diversity and the uniqueness of each individual. The faculty affirms its dedication to non-discrimination in our teaching, programs, and services on the basis of race, color, religion, gender, age sexual orientation, domestic partner status, ethnic or national origin, veteran status, or disability. The College of Education and Human Development at Texas A&M University is an open and affirming organization that does not tolerate discrimination, vandalism, violence or hate crimes. We insist that appropriate action be taken against those who perpetrate such acts. Further, the College is committed to protecting the welfare, rights, and privileges of anyone who is a target of prejudice or bigotry. Our commitment to tolerance, respect, and action to promote and enforce these values embraces the entire university community. In the spirit of shared responsibility, each University unit, student organization, and community member is encouraged to help make our campus, and this class, a welcoming place for all. Should you have any concerns related to respect for diversity or feel that you (or any others) are being discriminated against, please contact your departmental Ombudsperson, or the Department Head, or the College Ombudsperson.
Course Changes
Texas A&M University
Departmental Request for a Change in Course
Undergraduate • Graduate • Professional
• Submit original form and attachments •

Form Instructions
1. Request submitted by *(Department or Program Name)*: Educational Administration & Human Resource Development (EAMHR)
2. Course prefix, number and complete title of course: EDAD 605, The Secondary School Principalship
3. Change requested
   a. Prerequisite(s): From: ____________________________ To: ____________________________
   b. Withdrawal (reason): ____________________________
   c. Cross-list with: ____________________________

   Cross-listed courses require the signatures of both department heads.

   d. Change in course title and description. Enter complete current course title and current course description in item 5; enter proposed course title and proposed course description in item 6. Complete item 7 for change in title.

   e. Change in course number, contact hours (lab & lecture), and semester credit hours. Complete item 7. Attach a course syllabus.

4. For informational purposes only, please indicate course number if this course will be stacked:

5. Complete current course title and current catalog course description: EDAD 605, The Secondary School Principalship: Role of principal in the organization of junior and senior high schools; preparation for instructional management, program planning, evaluation and scheduling.

6. Complete proposed course title and proposed catalog course description (not to exceed 50 words): EDAD 605, School Principalship: Role of the principal in organization and administration of prekindergarten through grade 12 schools; management of instruction, educational program planning, legal situations, evaluation, scheduling and programs.

7. a. As currently in course inventory:

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Approval recommended by:

Beverly Irby
Department Head or Program Chair *(Type Name & Sign)* Date 07/21/15
Chair, College Review Committee Date 07/21/15

Fredrick M. Nafukho
Department Head or Program Chair *(Type Name & Sign)* Date 07/21/15
Dean of College Date 07/21/15

Submitted to Coordinating Board by:

Chair, GC or UCC Date

Associate Director, Curricular Services

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra-williams@tamu.edu.
Curricular Services – 02/11
Texas A&M University
Departmental Request for a Change in Course
Undergraduate • Graduate • Professional
• Submit original form and attachments •

Form Instructions
1. Course request type:
   - ☑ Undergraduate
   - ☑ Graduate
   - ☑ First Professional (DDS, MD, JD, PharmD, DVM)
2. Request submitted by (Department or Program Name):
   Select or Type Department/Program Name

3. Course prefix, number and complete title of course:
   ESSM 636 Range and Forest Watershed Management

4. Change requested
   a. Prerequisite(s): From: ___________________________ To: ___________________________
   b. Withdrawal (reason): ___________________________
   c. Cross-list with: ___________________________

   Cross-listed courses require the signatures of both department heads.

   d. Change in course title and description. Enter complete current course title and current course description in item 9; enter proposed course title and proposed course description in item 10. Complete item 11a and b for a change in title.

   e. Change in course number, contact hours (lab & lecture), and semester credit hours. Complete item 11a and b. Attach a course syllabus.

5. Is this an existing core curriculum course?
   - ☑ Yes
   - ☐ No

6. If grade type is changing for existing course, indicate the new grade type:
   - ☑ Grade
   - ☑ S/U
   - ☐ P/F (CLD)

7. If this course will be stacked, please indicate the course number of the stacked course:
   - ☐ I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

8. Complete current course title and current catalog course description:
   Range and Forest Watershed Management. Management of range and forest watersheds; influence of range and forest practices on runoff, interception, infiltration, erosion and water quality; current literature and research advances.*

9. Complete proposed course title and proposed catalog course description (not to exceed 50 words):
   Wildland Watershed Management. Elements of watershed management and principles and practices of wildland management for protection, maintenance and improvement of water resource values; current literature and research advances.

10. As currently in course inventory:

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<tr>
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<td>Level 6 3 6 3 2</td>
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</tbody>
</table>

   Approval recommended by:
   Thomas W. Boutton
   Chair, College Review Committee

   Department Head or Program Chair (Type Name & Sign) Date
   Chair, GC or UCC Date
   Dean of College Date

   Submitted to Coordinating Board by:
   Effective Date

   Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu
   Curricular Services – 08/14
ESSM 636 Title change justification

Changing the title of ESSM 636 from Range and Forest Watershed Management to Wildland Watershed Management fits better with the current literature and use in the natural resources management field.
WILDLAND WATERSHED MANAGEMENT
ESSM 636 Sections 399, 700 and 720
Taught by Distance in the 10-week Summer Term
Credits 3 (3-0)

Description

Elements of watershed management and principles and practices of wildland management for protection, maintenance and improvement of water resource values, current literature and research advances.

Learning Outcomes:

1. To be able to draw the hydrologic cycle.
2. Describe the components of the hydrologic cycle with emphasis on vegetation.
3. Describe the impacts of range and forest practices on water quality and quantity basis for land use decisions.

Instructor:

Robert W. Knight
Ecosystem Science and Management
Kleberg 122B
Phone 979-845-5557
Cell 979-324-6980 Before 10:00 p.m.
E-mail: bob-knight@tamu.edu

Grades:

Two exams: 50 points
Term paper: 20 points(3 points for proposed title, outline, description, 10 references)
Class discussion: 18 points (3 points each)
Homework: 12 points (4%/ points each)

Grading policy: Missed tests and late work will be handled according to University Rule 7. All assignments are due by 5 pm on the due date. Late work for unexcused absences will be penalized 10% of the total points per day late. There will be no makeup exams for unexcused absences. Grades will follow A=100%-90%, B=89.5%-80%, C=79.5%-70%, F=<69.5% (http://student-rules.tamu.edu/rule7.htm)

Text:
No assigned text. Required readings will be posted on eCampus.
ESSM 636 Due Dates

All assignments should be submitted as a Word file, 1 inch margins, and 12 point font

Exam Dates:

Exam 1        July 10, Friday
Exam 2        August 10, Monday

Term Paper:

June 29 – Proposed paper title, one paragraph description of paper and 10 references

August 3 – Final paper due by 5:00 p.m.

Homework:

Transpiration study results due       June 15
Infiltration study results due        June 22
Raindrop splash erosion results due   July 13

ADA Statement:

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact the Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu

Academic Integrity:

For additional information please visit: http://aggiehonor.tamu.edu
“An Aggie does not lie, cheat, or steal, or tolerate those who do.”

Helpful Websites

Academic Calendar       http://admissions.tamu.edu/Registrar/General/Calendar.aspx
On-line Catalog         http://www.tamu.edu/admissions/catalogs/
Student Rules           http://student-rules.tamu.edu/
Texas A&M University  
Departmental Request for a Change in Course  
Undergraduate • Graduate • Professional  
• Submit original form and attachments •  

Form Instructions
1. Course request type:  
   ☐ Undergraduate  ☑ Graduate  ☐ First Professional (DDS, MD, JD, PharmD, DVM)  
2. Request submitted by (Department or Program Name):  
   Department of Horticultural Sciences  
3. Course prefix, number and complete title of course:  
   HORT 605 Internet Applications for Horticulture  

Attach a brief supporting statement for changes made to items 4a thru 4d. and 10 below:  
4. Change requested  
   a. Prerequisite(s):  
      From:  
      To:  
   b. Withdrawal (reason):  
      Course is no longer offered.  
   c. Cross-list with:  
      Cross-listed courses require the signature of both department heads.  
   d. Change in course title and description. Enter complete current course title and current course description in item 9; enter proposed course title and proposed course description in item 10. Complete item 11a and b for a change in title.  
   e. Change in course number, contact hours (lab & lecture), and semester credit hours. Complete item 11a and b.  

Attach a course syllabus.  
5. Is this an existing core curriculum course?  
   ☑ Yes  ☐ No  
6. If grade type is changing for existing course, indicate the new grade type:  
   ☐ Grade  ☐ S/U  ☐ P/F (CLMD)  
7. If this course will be stacked, please indicate the course number of the stacked course:  
   ☐ I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).  
8. Complete current course title and current catalog course description:  
   HORT 605 Internet Applications for Horticulture. (2-2). Credit 3. Internet applications for horticulture presents the theory and practice of computer networks and networking so that the information and educational content (not the hardware) is the key; the focus is on the World Wide Web and creating Web materials for teaching, research, and extension applications. Prerequisite: Graduate classification.  
9. Complete proposed course title and proposed catalog course description (not to exceed 50 words):  
10. Complete proposed course title and proposed catalog course description (not to exceed 50 words):  

   As currently in course inventory:  

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<th>Level</th>
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Approval recommended by:  
Patricia Klein 07/14/2015  
Department Head or Program Chair (Type Name & Sign) Date  
Chair, College Review Committee Date  
Dean of College Date  

Submitted to Coordinating Board by:  
Associate Director, Curricular Services  
Date  
Effective Date  

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu.
Curricular Services – 08/14
July 14, 2015

TO: Curricular Services

Remove HORT 605 from Catalog

We are requesting that HORT 605 be removed from the TAMU course catalog. The course has not been taught in many years and we do not plan on teaching it again.
Texas A&M University
Departmental Request for a Change in Course
Undergraduate • Graduate • Professional
• Submit original form and attachments •

Form Instructions

1. Course request type:
   □ Undergraduate   ✓ Graduate   □ First Professional (M.S., Ed.S., Ph.D., D.V.M.)

2. Request submitted by (Department or Program Name):
   Select or Type Department/Program Name

3. Course prefix, number and complete title of course:
   OCNG 657 Data Methods and Graphical Representation in Oceanography

4. Change requested:
   Knowledge of vector calculus and basic statistics
   To: OCNG 655 or equivalent or permission of instructor
   Cross-listed courses require the signature of both department heads.

5. Is this an existing core curriculum course?
   Yes □  No ✓

6. If grade type is changing for existing course, indicate the new grade type:
   Grade □  S/U □  P/F (CLMT) ✓

7. If this course will be stacked, please indicate the course number of the stacked course:
   [✓] I verify that I have reviewed the FAQ for Export Control Basics for Distance Education
   (http://ypr.tamu.edu/resources/export-control-basics-for-distance-education).

8. Complete current course title and current catalog course description:
   Data Methods and Graphical Representation in Oceanography. Provide the basic tools and techniques to process, analyze, and visualize oceanographic data sets; multi-disciplinary approach; real-world applications to physical, biological, chemical and geological oceanographic data; basic instruction in the MATLAB programming language.

9. Complete proposed course title and proposed catalog course description (not to exceed 50 words):
   Data Methods and Graphical Representation in Oceanography. Application of advanced statistical, quantitative, and computational methods to oceanographic observational data; methodologies emphasized include spectral analysis and representations of time series data, optimal interpolation of irregular data fields, analysis of multiple variables using Empirical Orthogonal Functions, and scientific interpretation of statistical quantities.

10. As currently in course inventory:

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b. Change to:

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   Approval recommended by:
   [✓] Department Head or Program Chair (Type Name & Sign) Date: 12/3/14
   Chair, College Review Committee Date: 12/10/12
   Dean of College Date: 12/10/12

   Submitted to Coordinating Board by:
   [✓] Chair, GC or UCC Date: 12/10/12

   Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu.
   Curricular Services – 08/14
December 1, 2014

MEMORANDUM

TO: Office of the Registrar

THROUGH: Dr. Chris Houser
          AOC Dean College of Geosciences

FROM: Dr. Debbie Thomas
      Department Head
      Department of Oceanography

SUBJECT: Change in Course description for OCNG 657

OCNG 657 is an advanced data analysis course. The old course description was too similar to an undergraduate course taught by the same instructor and did not reflect the advanced nature of the course. This is corrected using the new course description and revised syllabus. The content of the course has not changed. The new course description and syllabus are no more aligned with that content. If you have any questions please contact our Academic Advisor Missy Matthews by email at missy@tamu.edu, or by phone at 979-845-7688.
COURSE SYLLABUS

OCNG 657-600: DATA METHODS AND GRAPHICAL REPRESENTATION IN OCEANOGRAPHY

Term: Spring 2015
Meeting times: TR 9:35 - 10:50 AM
Meeting Room: O&M Building Room 617

Three credit hours

Instructor Information:
Dr. Steven F. DiMarco, Professor and Ocean Observing Team Lead
Department of Oceanography
3146 TAMU
Office: 702D Eller O&M Building
OCNG Phone: 979-862-4168 or GERG Phone: 979-458-9323
Email: sdimarco@tamu.edu
Office Hours: TR 11:00-12:00 PM or by appt., 702D
Admin. Assistant: Ms. Laura Caldwell, 979-845-1231 lcaldwell@geos.tamu.edu

Objective:
To provide instruction on advanced computational tools and statistical methods of oceanographic data processing and analysis and techniques of graphical representation.

Catalogue Description: Catalog Description: Application of advanced statistical, quantitative, and computational methods to oceanographic observational data; methodologies emphasized include spectral analysis and representations of time series data, optimal interpolation of irregular data fields, analysis of multiple variables using Empirical Orthogonal Functions, and scientific interpretation of statistical quantities.

Prerequisites:
Graduate level. OCNG 655 or equivalent or permission of instructor

Textbook:

Grading Policy:
80% homework problem sets (5), and 20% final exam. Grades will be based on the following grading system: 90-100%=A, 80-89%=B, 70-79%=C, 60-69%=D, <60=F.
Learning Outcomes:
By taking this course, the student, upon completion, will be able to:
1. Identify instrumentation and sensors suitable for scientific inquiry in oceanography,
2. Critically assess data quality using quantitative techniques,
3. Perform advanced statistical analysis of oceanographic time series data,
4. Produce maps of oceanographic data using objective analysis and optimal interpolation,
5. Use structured and modular programming techniques to write scientific computer programs,
6. Perform modal decomposition of multiple variable oceanographic observations,
7. Select an analysis method that is appropriate to a given dataset,
8. Think critically and objectively about scientific results based on statistical estimates,
9. To effectively design and produce statistical graphics of oceanographic data sets.

Attendance Policy:
Please refer to http://student-rules.tamu.edu. Please see Part 1: Academic Rules, #7 Attendance. If you would like a copy of the rule it will be provided to you.

Course Topics/Calendar:
Collection
Week 1. Introduction to Oceanographic instrumentation
Week 2. Introduction to MATLAB programming and mathematical review
Processing
Week 5.: Filling the Gaps: Interpolating Data and Splines, Causation and Correlation
Week 6. Designing and Testing Hypotheses: Confidence and Significance Testing
Analysis
Week 7. Elements of Data Analysis: Least-squares, Linear Estimates and Regression
Week 8. Elements of Time-Series Analysis: Sampling Theory and Frequency Domain Representation
Week 9. Convolution and Temporal and Spatial Scales: Oceanographic Field Design
Weeks 10-11. Digital filters and Spectral Analysis of Oceanographic Data
Week 12. Cross-spectra, Coherency and Tidal (Harmonic) Analysis
Week 13. Spatial Representation and Analysis of Oceanographic Data Fields
Week 14a. Non-stationary Data: Wavelets
Database management
Week 14.b Database Management and Project Legacy, wrap up

Students are encouraged to bring and use their own data sets for class projects.
List of assignments and exams:
Weekly reading assignments.
Homework 0. Due approximately end of week 1.
Homework 1. Problem set due (approximately) end of week 4.
Homework 2. Problem set due (approximately) end of week 6.
Homework 3. Problem set due (approximately) end of week 9.
Homework 4. Problem set due (approximately) end of week 12.
Homework 5. Problem set due (approximately) end of week 14.
Final Test. (written)

Schedule of Lectures and Assignments:
WK1
January 20
   Introduction: Data Acquisition
   Reading: Course Syllabus
   Handout
January 22
   Instrumentation: Part 1
   Temperature and Salinity
   Reading: Chapter 1 and Handout
   **Homework 0 due**

WK2
January 27
   Instrumentation: Part 2
   Velocity and Pressure
   Reading: Chapter 2.1-3
January 29
   Basic Sampling
   Reading: 3.1-3.2, Handout

WK3
February 3
   Probability and Distributions
   Reading: Chapter 3.3
February 5
   Probability and Moments
   Reading: Chapter 3.4-3.7

WK4
February 10
   Data Processing: Quick-looks
   and Graphical Representation
   Reading: Chapter 2.4, Handout
February 12
   Errors: Outliers, detrending, Gap-filling
   Reading: Chapter 3.16
   **Homework 1 due**

WK5
February 17
   Interpolation and Splines
   Reading: Chapter 3.17
February 19
   Correlation and Covariance
   Reading: Chapter 3.13, 3.18

WK6
February 24
   Causation, Degrees of Freedom,
   Confidence
February 26
   Confidence, Significance testing and
   Bootstrapping
OCNG 657 Data Methods in Oceanography
Instructor: S. F. DImarco

Syllabus

Reading: 3.13, 3.15

Reading: Chapter 3.10, 3.14, 3.19

**Homework 2 due**

**WK7**
March 3
Linear Estimation and Regression
Reading: Chapter 3.12, 3.13

March 5
Elements of Time Series Analysis
Reading: Chapter 5.1-5.3

**WK8**
March 10
Fourier Series
Reading: Chapter 5.4, Handout

March 12
Time and Frequency domain representation
Reading: Handout

March 16-20
Spring Break

No Class

**WK9**
March 24
Convolution, Correlation Function
Reading: 5.8 Notes

March 26
Scale Estimation
Reading: Notes

**Homework 3 due**

**WK10**
March 31
Scales examples
Reading: Notes

April 2
Filtering and Smoothing
Reading: Chapter 5.6

**WK11**
April 7
Digital Filters: theory
Reading: Chapter 5.10
Handout

April 9
Choosing the best filter
Reading: Chapter 5.10

**WK12**
April 14
Cross-spectra and coherency
Reading: 5.8

April 16
Additional spectral methods, Harmonic Analysis
Reading: Chapter 5.5-5.7

**Homework 4 due**

**WK13**
April 21
EOFs: Concepts
Reading: Chapter: 4.1 – 4.3

April 23
EOFs: Theory and Programming
Reading: Chapter 4.3, Handout, Notes
WK14
April 28
Wavelets: theory
Reading: Chapter 5.9

April 30
Data Management and Project Legacy
Reading: Notes, Handout
Homework 5 due

Finals May 7-12

Resources:
Access to University computing resources, e.g. Virtual Desktop. MATLAB access through University site license.

Course Website:
http://adcp.tamu.edu/~stevendimarco/OCNG657

Americans with Disabilities Act (ADA):
The Americans with Disabilities Act (ADA) is a federal antidiscrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact the Department of Student Life, Services for Students with Disabilities in Cain Hall, Room B118, or call 845-1637.

Copyright and Plagiarism Policy:
All materials generated for this class are copyrighted. These materials include but are not limited to syllabi, quizzes, exams, lab problems, in-class materials, review sheets, and additional problem sets. Because these materials are copyrighted, you do not have the right to copy the handouts, unless permission is expressly granted.

As commonly defined, plagiarism consists of passing off as one's own the ideas, words, writings, etc., which belong to another. In accordance with this definition, you are committing plagiarism if you copy the work of another person and turn it in as your own, even if you should have the permission of that person. Plagiarism is one of the worst academic sins, for the plagiarist destroys the trust among colleagues without with research cannot be safely communicated.

If you have any questions regarding plagiarism, please consult the latest issue of the Texas A&M University Students Rules, student-rules.tamu.edu, under the section “Scholastic Dishonesty.”

For more information regarding plagiarism in GEOS 470, please see the instructor or the handout “Assignment Guidelines”.

Academic Integrity
Aggie Code of Honor: “An Aggie does not lie, cheat, or steal, or tolerate those who do.”
For additional information please visit http://aggiehonor.tamu.edu.
Texas A&M University
Departmental Request for a Change in Course
Undergraduate • Graduate • Professional
Submit original form and attachments.

Form Instructions

1. Course request type:  □ Undergraduate  □ Graduate  □ First Professional (M.D., M.D., Ph.D., D.V.M.)
2. Request submitted by (Department or Program Name): Veterinary Integrative Biosciences
3. Course prefix, number and complete title of course: VIBS 670, Basic Environmental Toxicology

Attach a brief supporting statement for changes made to items 4a thru 4d, and 10 below.

4. Change requested
   a. Prerequisite(s): From: no change  To: no change
   b. Withdrawal (reason): no change
   c. Cross-list with: no change

Cross-listed courses require the signature of both department heads.

d. Change in course title and description. Enter complete current course title and current course description in item 10. Complete item 11a and b for a change in title.

   e. Change in course number, contact hours (lab & lecture), and semester credit hours. Complete item 11a and b.

5. Is this an existing core curriculum course? □ Yes  □ No
6. If grade type is changing for existing course, indicate the new grade type: □ Grade  □ S/U  □ P/F (CLMD)
7. If this course will be stacked, please indicate the course number of the stacked course:
   □ I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

8. Complete current course title and current catalog course description: Current course title: Basic Environmental Toxicology; Catalog Course Description for VIBS 670: Introduction to general principles of toxicology; test methods, target organs, toxicity of major classes of toxins/toxicants, and risk assessment for engineers and other non-toxicologists; risk assessment methodology. Prerequisite: VIBS 602 or approval of instructor.

9. Complete proposed course title and proposed catalog course description (not to exceed 50 words): Proposed course title: Environmental Toxicology; Proposed catalog course description: Toxic effects of drugs and chemicals on major mammalian organ systems and ecological receptors; general principles of toxicokinetics and toxicodynamics; case studies of toxic effects of environmental exposures. Prerequisite: VIBS 602 or approval of instructor.

11. a. As currently in course inventory:

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<tr>
<td>VIBS</td>
<td>670</td>
<td>BASIC ENVIRONMENTAL TOXICOLOGY</td>
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b. Change to:

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Approval recommended by:

Department Head or Program Chair (Type Name & Sign) Date

Chair, College Review Committee Date

Dean of College Date

Submitted to Coordinating Board by:

Chair, GC or UCC Date

Associate Director, Curricular Services Date

Effective Date

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu.
Curricular Services – 08/14
Curriculum Changes
Texas A&M University
Request for a Change in Curriculum
Undergraduate + Graduate + Professional

1. Program request type: ☐ Undergraduate ☐ Graduate ☐ First Professional (e.g., DVM, JD, MD, etc.)

2. Request change for: ☐ Degree Program ☐ Minor ☐ Certificate

3. Request submitted by [Department or Program Name]: Maritime Administration (TAMUG)

4. Program Designation and Name (e.g., B.A. in History, Minor in History, Certificate in European Union): MS in Maritime Administration and Logistics (3+2 program)

5. Brief description of changes:
   - add MARA 493 as a directed elective at the undergraduate level of this program, AND
   - add MARA 491 as a directed elective at the undergraduate level of this program

6. Rationale for change:
   - MARA 493 has been approved as a permanent course AND
   - MARA 491 has been approved as a permanent course

---

Use the checkboxes below to make sure that all information is included.

7. a. Proposed curriculum attached. ☐ Yes ☐ No
   b. Current catalog curriculum with handwritten edits attached. ☐ Yes ☐ No
   c. Current Howdy degree evaluation with handwritten edits attached. ☐ Yes ☐ No
   Please make sure the attached proposed curriculum, catalog and Howdy degree evaluation match.

8. a. Will degree program hours change (increase/decrease) due to the proposed curriculum changes? ☐ Yes ☐ No
   b. If yes, degree program hours will change from: ___________ to: ___________
   c. If yes, is the Texas Higher Education Coordinating Board form attached? ☐ Yes ☐ No
   http://www.thecb.state.tx.us/index.cfm?fa=view&fileId=A0E9F7D2-A923-4F11-235D4D38BF0109D0

9. If proposed changes affect other unit(s), are letters of support attached? ☐ Yes ☐ No

IMPORTANT NOTE: Curriculum changes submitted through the approval process and fully approved by February (December-UCC/GC, January-Faculty Senate, February-President) will be effective in the next academic year. Changes requiring approval beyond the University should complete the internal approval process early in the fall semester whenever possible in order to ensure timely implementation.

Approval recommended by:

[Signature]
Department Head or Program Chair (Type Name & Sign) Date

[Signature]
Dean of College Date

[Signature]
Chair, College Review Committee Date

[Signature]
Chair, GC or UCC Date

Questions regarding this form should be directed to Curricular Services at 845-3201 or sandra.williams@tamu.edu.
Curricular Services – 06/14
5-Year Curriculum: Maritime Administration (MARA) and Master of Maritime Administration and Logistics (MMAL)

This program allows Maritime Administration (MARA) majors to enter the graduate program for a Master of Maritime Administration and Logistics the beginning of their senior year, enabling students to receive their MARA undergraduate degree (B.S.) and a Master of Maritime Administration and Logistics (MMAL) graduate degree in five years.

Students admitted to the 5-year degree program will have completed 92 of the 120 hours of course work required to receive a bachelor's degree. These courses must include the specific prerequisites for a Bachelor of Science degree in Maritime Administration, as well as the required Texas A&M University core curriculum courses.

Maritime Administration majors who have at least a 3.25 GPA and who have taken all of their prerequisite courses and otherwise completed 92 hours by the fall of their fourth year will be eligible to apply for the 5-year program during their junior year. Applicants to the 5-year program will submit the same materials (including GMAT scores) as other MMAL applicants, and those whose records are judged to be competitive by the mid-January deadline will be admitted. Admission criteria will be the same as for other MMAL students.

Students who choose not to finish the MMAL degree after being admitted to the 5-year program may exit the program at any time. Completed MMAL courses will be applied to their bachelor's degree in Maritime Administration, as appropriate. Failure to complete the MMAL program will in no way impede their ability to attain a bachelor's degree in Maritime Administration when the requirements for that degree are completed. Those who pursue the joint program will receive both degrees upon completion of the entire 5-year program. Students will not graduate with a bachelor's degree in year four, but rather will earn both their Bachelor of Science and Master of Maritime Administration and Logistics at the end of year five.

Admitted students will be enrolled in Maritime Administration and Logistics graduate courses with an undergraduate classification (U4) during the fall of their fourth year and will be reclassified as degree seeking master's students (G7) upon completing 107 credit hours. This will normally occur at the beginning of the spring semester of year four. Students will take 12 fewer undergraduate credit hours. Graduate courses taken in the fifth year program will be counted double, as credit towards their MMAL degree and as substitutes for MARA and free electives required for the bachelor's degree.

Students will be required to complete 36 graduate hours. The graduate hours will include 7 core courses (21 credits) in economics, management, operations and logistics with 15 credit hours of electives. The electives will be chosen according to the interest of the student in either the Maritime Policy and Law track or the Shipping and Port Management track. Students will also take 21 hours of undergraduate level MARA electives that must include MARA 416 in order to satisfy the TAMU intensive writing requirement.

**FRESHMAN YEAR**

**Fall Semester**

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<tr>
<td>MARA 205</td>
<td>Introduction to Ships and Shipping †</td>
<td>(3-2)</td>
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<td>MATH 141</td>
<td>Business Math I</td>
<td>(3-0)</td>
<td>3</td>
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<td>POLS 206</td>
<td>American National Government</td>
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**Spring Semester**

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<td>Management Information Systems †</td>
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<td>Elective in American History</td>
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<td>Elective in Life and Physical Sciences §</td>
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**SOPHOMORE YEAR**

**Fall Semester**

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<td>Introduction to Accounting †</td>
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<td>ECON 202</td>
<td>Principles of Economics †</td>
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<tr>
<td>MARA 301</td>
<td>Ocean Transportation I †</td>
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### Spring Semester

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<td>ECON 203</td>
<td>Principles of Economics †</td>
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<tr>
<td>MARA 212</td>
<td>Business Law †</td>
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<tr>
<td>MARA 281</td>
<td>Seminar in Undergraduate Research Methods †</td>
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<tr>
<td>MARA 304</td>
<td>Ocean Transportation II †</td>
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<tr>
<td>POLS 207</td>
<td>State and Local Government</td>
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**Total:** 16

### JUNIOR YEAR

#### Fall Semester

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<td>Personnel Management †</td>
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<td>MARA 421</td>
<td>Admiralty Law †</td>
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<td>SCMT 303</td>
<td>Statistical Methods †</td>
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#### Spring Semester

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<td>MGMT 481</td>
<td>Seminar in Management †</td>
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<td>Elective in Creative Arts</td>
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**Total:** 16

**Total Hours to be completed prior to admission to the graduate courses:** 92

### SENIOR YEAR/FIRST YEAR OF FIVE-YEAR PROGRAM

#### Fall Semester

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<td>Managerial Decision Making</td>
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<td>MARA 641</td>
<td>Financial Management in Marine Transportation</td>
<td>3</td>
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<td>MARA 627</td>
<td>Marketing of Transportation Services</td>
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#### Spring Semester

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<td>MARA 623</td>
<td>Economics Issues in Shipping</td>
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<td>MARA 664</td>
<td>Production, Operations and Logistics Management</td>
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<td>International Strategic Planning and Implementation</td>
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### SECOND YEAR OF FIVE-YEAR PROGRAM

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<td>MMAL Elective *</td>
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#### Spring Semester

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<td>Elective (General)</td>
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**Total:** 12

**Total Hours:** 144
Notes for the MARA/MMAL 3+2 Program

Note: All electives must be chosen in consultation with, and approved by, the student’s academic advisor. Unless courses are specifically listed, see University Core Curriculum at [http://core.tamu.edu](http://core.tamu.edu) for a listing of course options for Communication; Mathematics; Life and Physical Sciences; Language, Philosophy and Culture; Creative Arts; American History; Government and Political Sciences; and Social and Behavioral Sciences. The 6-hour University Core Curriculum requirement for International and Cultural Diversity may be met with courses used to satisfy other degree requirements.

† Indicates required courses in the Maritime Administration major. These courses will be used to compute the major GPR. At the time of graduation, a MARA major must have a GPR of ≥ 2.25 in their major. A MARA major must achieve a grade of “C” or better in ECON 202, ECON 203, ACCT 229, ACCT 230 and SCMT 303 as a graduation requirement. These courses may be repeated as necessary to meet this requirement, and the requirement applies to courses taken at TAMUG or offered for transfer from other institutions.

§ Students may satisfy the 9-credit hours of Life and Physical Science requirement through any combination of one, three or four credit hour courses.

Δ The total hours may be increased if the student is required to take remedial math, remedial English, foreign language or International and Cultural Diversity courses.

V - MARA Electives: Students are required to complete 21 credit hours of MARA electives that must include MARA 416 to satisfy the intensive writing requirement. Students should choose 6 from the following courses:

ACCT 315, ACCT 316, ECON 311, ECON 323, ECON 452, SCMT 336, MARA 342, MARA 401, MARA 402, MARA 416, MARA 424, MARA 433, MARA 450, MARA 460, MARA 470, MARA 484, MARA 485 or MARA 489.

* Choose 15 credit hours from the following graduate level MMAL elective courses: MARA 604, MARA 616, MARA 640, MARA 650, MARA 652, MARA 658, MARA 660, MARA 670, MARA 672; or MARS 620, MARS 640, MARS 660, MARS 676.
Detail Requirements

Information for Degree Evaluation

This is NOT an official evaluation.

Program Evaluation

Master of Maritime Administration and Logistics - Thesis Option (Five Year Program)

Time Limits: All requirements for the degree must be completed within seven consecutive years.

Degree Plan: A Graduate Degree Plan of at least 36 hrs must be completed with a minimum GPR of 3.000 and no grade lower than C. At least one hour of 691 (Research) must be included.

Course Limitations: Courses exceeding limits below will not be considered for meeting degree requirements.

1. Only approved courses on the degree plan will be considered for this program.
2. No more than 12 hrs or one-third of the total hours on the degree plan, whichever is greater, may be used. Transfer course work must be completed at an accredited institution with a grade of B or better.
3. No more than 12 hrs taken in a non-degree seeking (GR) classification may be used.
4. No more than 12 hrs may be used in any combination of the following categories:
   a. Not more than 8 hrs of 691 (Research) may be used.
   b. Not more than 8 hrs of 685 (Directed Studies) may be used.
   c. Not more than 3 hrs of 680 (Theory of Research) may be used.
   d. Not more than 3 hrs of 695 (Frontiers in Research) may be used.
5. No more than 2 hrs of 681 (Seminar) may be used.
6. No more than 9 hrs of advanced undergraduate courses (300-499) may be used.
7. No correspondence study may be used.
8. No credit hours of extension course work may be used.
9. No credit hours of PRIN 601 or GERM 603 may be used.

Advisory Committee: The Advisory Committee consists of at least three members of the Graduate Faculty, one of which must be from outside the student's major department.

Residence Requirements: During one semester or 2 consecutive 5-week summer terms, 9 hrs of resident credit must be completed.

Research Proposal: A thesis proposal approved by the Advisory Committee, Department Head and the Office of Graduate Studies is required.

Thesis Defense: The thesis defense may be written and/or oral. The defense may be waived for students with a 3.500 degree plan GPR and permission of the Advisory Committee, Department Head and the Office of Graduate Studies. The request to hold and announce the defense must be submitted to the Office of Graduate Studies a minimum of 10 working days in advance of the scheduled date.

To be eligible to hold the defense, the student:

1. must have a graduate GPA of at least 3.000 (listed as "Program GPA" below),
2. must have a Degree Plan GPA of at least 3.000 with no grade lower than a C in any course on the degree plan,
3. must have an approved research proposal,
4. must have completed or be registered for all remaining degree plan course work,
5. must be registered in the university,
6. must have the thesis in final form and ready for distribution to all committee members,

Thesis: The final version of the thesis must be cleared by the Office of Graduate Studies no later than one year after the defense or within the seven year time limit, whichever is first.

Program: MML (Galv) Syr program
Campus: Galveston
College: Galveston Campus
Degree: Master of Maritime Admin & Log
Level: Graduate
Majors: Maritime Admin & Logistics
Departments: Maritime Administration
Catalog Term: Fall 2014 - Galveston
Evaluation Term: Summer 2015 - Galveston
Expected Graduation Date:
Request Number: 444
Results as of: Jun 12, 2015

Met Credits

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Program GPA: No
Program GPA: 3.00
Overall GPA: Yes
Overall GPA: 0.00

Transfer:

This is NOT an official evaluation.

Area: Courses for Degree Plan GPA - Not Met

Description: A minimum degree plan GPA of 3.000 is required. Courses with grades of D, F or U are not acceptable for degree plan credit and must be repeated for a grade of C or better or Satisfactory (S).
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**unofficial evaluation**

**Area:** Courses Not Applied - Met
**Description:** See Graduate Committee Chair or Graduate Advisor for acceptable changes to degree plan coursework.

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**unofficial evaluation**

**Area:** Graded Degree Plan Courses - Not Met
**Description:** A grade of C or better is required in all courses listed.

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**unofficial evaluation**

**Area:** S/U Degree Plan Courses - Not Met
**Description:** A grade of S is required in all courses listed.

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**unofficial evaluation**

**Back to Display Options**
# Texas A&M Galveston
## Maritime Administration - Five Year Program Thesis Option

### Name: ____________________
### UIN: ____________________

###Catalog #:

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### DEPT SIGN

### COMMENTS:

1. Students may satisfy the 9 credit hour life and physical science requirement through any combination of one, two or four credit hour courses.

2. The 6 hours communications electives requirement can be satisfied at TAMUG using COMM 203, ENGL 104 or ENGL 203.


Legend: T - Credit by Transfer  CR - Credit by Examination  Q - Q-Drop  R - Registered in Current Semester

* - Courses requiring a grade of "C" or better  ** - Writing intensive if Section 900 course
Detail Requirements

Information for Degree Evaluation

This is NOT an official evaluation.

Program Evaluation

Master of Maritime Administration and Logistics - Non-Thesis Option (Five Year Program)

Time Limits: All requirements for the degree must be completed within seven consecutive years.

Degree Plan: A Graduate Degree Plan of at least 36 hrs must be completed with a minimum GPR of 3.000 and no grade lower than C.

Course Limitations: Courses exceeding limits below will not be considered for meeting degree requirements:

1. Only approved courses on the degree plan will be considered for this program.
2. No more than 12 hrs or one-third of the total hours on the degree plan, whichever is greater, may be used. Transfer course work must be completed at an accredited institution with a grade of B or better.
3. No more than 12 hrs taken in a non-degree seeking (66) classification may be used.
4. No more than 25 percent of the total degree plan hours may be used in any combination of the following categories:
   a. Not more than 4 hrs 644 (Professional Internship) may be used.
   b. Not more than 9 hrs of 665 (Directed Studies) may be used.
   c. Not more than 3 hrs of 690 (Theory of Research) may be used.
   d. Not more than 3 hrs of 695 (Frontiers in Research) may be used.
5. No more than 2 hrs of 681 (Seminar) may be used.
6. No more than 9 hrs of advanced undergraduate courses (300-499) may be used.
7. No correspondence study may be used.
8. No credit hours of extension course work may be used.
9. No credit hours of 5601 or 5603 may be used.
10. No credit hours of 691 (Research) may be used.

Advisory Committee: The Advisory Committee consists of at least three members of the Graduate Faculty, one of which must be from outside the student's major department.

Residence Requirement: During one semester or 2 consecutive 5-week summer terms, 9 hrs of resident credit must be completed.

Final Examination: A final comprehensive examination is not required.

Program : MML (Grad Sr) Syr program
Campus : Galveston
College : Galveston Campus
Degree : Master of Maritime Admin & Log
Level : Graduate
Major : Maritime Admin & Logistics
Department : Maritime Administration

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<td>Overall GPA :</td>
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Other Course Information

Transfer : 0.000 | 0

This is NOT an official evaluation.

Area : Courses for Degree Plan SPR - Not Met
Description: A minimum degree plan GPR of 3.000 is required. Courses with grades of D, F or U are not acceptable for degree plan credit and must be repeated for a grade of C or better or Satisfactory (S).

Met Condition Rule Subject Attribute Low High Required Required Term Subject Course Title Attribute Credits Grade Source

No A. No Approved Degree Plan

unofficial evaluation

Area : Courses Not Applied - Met

Total Credits and GPA 0.000 | .00
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Area: Graded Degree Plan Courses - Not Met
Description: A grade of C or better is required in all courses listed.

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Unofficial Evaluation

Area: S/U Degree Plan Courses - Met
Description: A grade of S is required in all courses listed.

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Unofficial Evaluation

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COMMENTS:

1. Students may satisfy the 9 credit hour life and physical science requirement through any combination of one, two, or three credit hour courses.

2. The 6 hours communications electives requirement can be satisfied at TAMUG using COMM 203, ENGL 194 or ENGL 203.


4. Choose from Grad Level MATH electives: MATH 650, 652, 640, 616, 658, 660, 604, 605, 672, MATH 620, 640, 660, 672
Special Consideration Items
MEMORANDUM

June 25, 2015

TO: Mark Zoran, Ph.D.
    Chair, Graduate Council

THROUGH: Vernon Tesh, PhD
          HSC Vice President
          Office of Academic Affairs

FROM: Jay Maddock, Ph.D.
      Dean
      School of Public Health

RE: Closure of Low Producing Master of Science in Public Health Degree Programs

The School of Rural Public Health is initiating closure of five Master of Science in Public Health (MPSH) degrees. Attached you will find the following documents as agenda items for the Graduate Council:

- Teach-out Plan for Program Discontinuation for:
  - MSPH in Epidemiology
  - MSPH in Biostatistics
  - MSPH in Health Promotion and Community Health Sciences
  - MSPH in Occupational Health
  - MSPH in Environmental Health

- THECB Certification Form for Program Changes for:
  - MSPH in Epidemiology
  - MSPH in Biostatistics
  - MSPH in Health Promotion and Community Health Sciences
  - MSPH in Occupational Health
  - MSPH in Environmental Health

- A summary illustration of the THECB program inventory change.

Please note: Notification of closure for the MPSH in Health Policy and Management was submitted to the Texas Higher Education Coordinating Board and approved in 2014. This program, however, has not been removed from the THECB Program Inventory listing to date.

Attachments

Cc: Antonio A. René, PhD
    Amanda Allen
    Lois Rockwell

271 Administration Building
1256 TAMU
College Station, TX 77843-1266

Tel. 979.436-9421
aaren@sphtamhsc.edu
Teach-out Plan

Master of Science In Public Health (MSPH) degree in Epidemiology
School of Public Health
Texas A&M University

Adapted from the Southern Association of Colleges and Schools Commission on Colleges Substantive Change for Accredited Institutions of the Commission of Colleges.

1. **Date of program closure.**
   As of May 2015, application to the MSPH in Epidemiology was closed, and no new students will enter the program. The last student is expected to graduate in May 2016. The program is projected to close September 1, 2016.

2. **An explanation of how affected parties (students, faculty, staff) will be informed of the impending closure.**
   Faculty and staff were informed by the Department Head at a department meeting in May 2015. The current student was contacted by department advisors and informed that they would be able to complete the MSPH as planned.

3. **An explanation of how students will be helped to complete their programs of study with minimal disruption or additional expense.**
   All courses that students need for the MSPH program will continue to be offered for other degree programs in the School of Public Health, and faculty will be available to continue to supervise thesis work. All MSPH students will continue on their degree plans with no disruptions resulting from the program closure.

4. **Signed copies of teach-out agreements with other institutions, if any.**
   Not Applicable

5. **How faculty and staff will be redeployed or helped to find new employment**
   The closure of this program will not impact the faculty and staff in the Department of Epidemiology and Biostatistics. The faculty and staff will continue to operate the department’s other degree (MPH in Epidemiology, MPH in Biostatistics, DrPH).

6. **If closing an institution, arrangement for the storing of student records, disposition of final financial resources and other assets**
   Not Applicable

7. **Please provide the following additional information:**
   a. **How many students are currently enrolled in the program?** One
   b. **Projected graduation date for the last student(s) in the program?** May 2016
Teach-out Plan

Master of Science in Public Health (MSPH) degree in Biostatistics
School of Public Health
Texas A&M University

Adapted from the Southern Association of Colleges and Schools Commission on Colleges Substantive Change for Accredited Institutions of the Commission of Colleges.

1. **Date of program closure.**
   As of May 2015, application to the MSPH in Biostatistics was closed. The last students will begin in August 2015, with a projected graduation date of August 2017. The program is projected to close January 1, 2018.

2. **An explanation of how affected parties (students, faculty, staff) will be informed of the impending closure.**
   Faculty and staff were informed by the Department Head at a department meeting in May 2015. Current students were contacted by department advisors and informed that they would be able to complete the MSPH as planned. Students accepted for Fall 2015 were informed by department administration and the Office of Student Affairs that they would be able to complete the MSPH as planned, and were given the option of moving to the MPH in Biostatistics if they preferred.

3. **An explanation of how students will be helped to complete their programs of study with minimal disruption or additional expense.**
   All courses that students need for the MSPH program will continue to be offered for other degree programs in the School of Public Health, and faculty will be available to continue to supervise thesis work. All MSPH students will continue on their degree plans with no disruptions resulting from the program closure.

4. **Signed copies of teach-out agreements with other institutions, if any.**
   Not Applicable

5. **How faculty and staff will be redeployed or helped to find new employment**
   The closure of this program will not impact the faculty and staff in the Department of Epidemiology and Biostatistics. The faculty and staff will continue to operate the department’s other degree (MPH in Epidemiology, MPH in Biostatistics, DrPH).

6. **If closing an institution, arrangement for the storing of student records, disposition of final financial resources and other assets**
   Not Applicable

7. **Please provide the following additional information:**
   a. **How many students are currently enrolled in the program?**
      Three as of September 2015

   b. **Projected graduation date for the last student(s) in the program?** August 2017
Teach-out Plan

Master of Science in Public Health (MSPH) degree in Health Promotion and Community Health Sciences
School of Public Health
Texas A&M University

Adapted from the Southern Association of Colleges and Schools Commission on Colleges Substantive Change for Accredited Institutions of the Commission of Colleges.

1. Date of program closure.
   As of May 2015, application to the MSPH in Health Promotion and Community Health Sciences was closed. There are no students currently in the program. The program will close January 1, 2016.

2. An explanation of how affected parties (students, faculty, staff) will be informed of the impending closure.
   Faculty and staff were informed by the Department Head at a department meeting in May 2015. There are no current students.

3. An explanation of how students will be helped to complete their programs of study with minimal disruption or additional expense.
   Not Applicable. Since there are no students enrolled in the program, no students will be affected.

4. Signed copies of teach-out agreements with other institutions, if any.
   Not Applicable

5. How faculty and staff will be redeployed or helped to find new employment
   The closure of this program will not impact the faculty and staff in the Department of Health Promotion and Community Health. The faculty and staff will continue to operate the department’s other degrees (MPH, DrPH).

6. If closing an institution, arrangement for the storing of student records, disposition of final financial resources and other assets
   Not Applicable

7. Please provide the following additional information:
   a. How many students are currently enrolled in the program? None

   b. Projected graduation date for the last student(s) in the program? Not Applicable
Teach-out Plan

Master of Science in Public Health (MSPH) degree in Occupational Health
School of Public Health
Texas A&M University

Adapted from the Southern Association of Colleges and Schools Commission on Colleges Substantive Change for Accredited Institutions of the Commission of Colleges.

1. Date of program closure.
   As of May 2015, application to the MSPH in Occupational Health was closed, and no new students will enter the program. The last student is expected to graduate in December 2015. The program is projected to close May 1, 2016.

2. An explanation of how affected parties (students, faculty, staff) will be informed of the impending closure.
   Faculty and staff were informed by the Department Head at a department meeting in May 2015. Current students were contacted by department advisors and informed that they would be able to complete the MSPH as planned.

3. An explanation of how students will be helped to complete their programs of study with minimal disruption or additional expense.
   All courses that students need for the MSPH program will continue to be offered for other degree programs in the School of Public Health, and faculty will be available to continue to supervise thesis work. All MSPH students will continue on their degree plans with no disruptions resulting from the program closure.

4. Signed copies of teach-out agreements with other institutions, if any.
   Not Applicable

5. How faculty and staff will be redeployed or helped to find new employment
   The closure of this program will not impact the faculty and staff in the Department of Environmental and Occupational Health. The faculty and staff will continue to operate the department’s other degrees (MPH in Environmental Health, MPH in Occupational Safety and Health, DrPH).

6. If closing an institution, arrangement for the storing of student records, disposition of final financial resources and other assets
   Not Applicable

7. Please provide the following additional information:
   a. How many students are currently enrolled in the program? Two

   b. Projected graduation date for the last student(s) in the program? December 2015
Teach-out Plan

Master of Science in Public Health (MSPH) degree in Environmental Health
School of Public Health
Texas A&M University

Adapted from the Southern Association of Colleges and Schools Commission on Colleges Substantive Change for Accredited Institutions of the Commission of Colleges.

1. Date of program closure.
As of May 2015, application to the MSPH in Environmental Health was closed, and no new students will enter the program. The last student is expected to graduate in May 2016. The program is projected to close in September 1, 2016.

2. An explanation of how affected parties (students, faculty, staff) will be informed of the impending closure.
Faculty and staff were informed by the Department Head at a department meeting in May 2015. Current students were contacted by department advisors and informed that they would be able to complete the MSPH as planned.

3. An explanation of how students will be helped to complete their programs of study with minimal disruption or additional expense.
All courses that students need for the MSPH program will continue to be offered for other degree programs in the School of Public Health, and faculty will be available to continue to supervise thesis work. All MSPH students will continue on their degree plans with no disruptions resulting from the program closure.

4. Signed copies of teach-out agreements with other institutions, if any.
Not Applicable

5. How faculty and staff will be redeployed or helped to find new employment
The closure of this program will not impact the faculty and staff in the Department of Environmental and Occupational Health. The faculty and staff will continue to operate the department’s other degree (MPH in Environmental Health, MPH in Occupational Safety and Health, DrPH).

6. If closing an institution, arrangement for the storing of student records, disposition of final financial resources and other assets
Not Applicable

7. Please provide the following additional information:
a. How many students are currently enrolled in the program? Two

b. Projected graduation date for the last student(s) in the program? May 2016
Certification Form for Program Revisions  
Texas Higher Education Coordinating Board  

**Directions:** An institution shall use this form to request an administrative change that meets all criteria for automatic approval in Coordinating Board Rules, Chapter 5, Subchapter C, Section 5.44: (a) The administrative change has institutional and board of regents approval, (b) the institution certifies that adequate funds are available to cover the costs of the administrative change, (c) new costs during the first five years would not exceed $2 million, and (d) the administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests).

If an administrative change does not meet the criteria above, an institution must submit a request using the *Administrative Change Request Form*.

An institution may also use this form to report the creation or change to a unit that does not administer a certificate or degree program (e.g., a research center) to update the Program Inventory.

**Information:** Contact the Division of Academic Affairs and Research at 512/427-6200 for more information.

---

**Administrative Information**

1. **Institution:** Texas A&M University

2. **Description of Administrative Change:** Discontinue the Master of Science in Public Health (MSPH) degree in Epidemiology. Remove from the degree program inventory.

3. **Program Inventory – CIP for MSPH in Epidemiology to be removed is 26.1309.00**

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<th>CIP</th>
<th>Degree Levels</th>
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<td>SCHOOL OF PUBLIC HEALTH 10 2425</td>
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<tr>
<td>BIOSTATISTICS</td>
<td>26.1102.00</td>
<td>MSPH (45 SCH)</td>
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<tr>
<td><strong>EPIDEMIOLOGY</strong></td>
<td><strong>26.1309.00</strong></td>
<td><strong>MSPH (36 SCH)</strong></td>
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<tr>
<td>HEALTH SERVICES RESEARCH</td>
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<td>PHD (100 SCH)</td>
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<td>51.0701.00</td>
<td>MSPH (36 SCH)</td>
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<td>EPIDEMIOLOGY AND ENVIRONMENTAL HEALTH</td>
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<td>DRPH (99 SCH)</td>
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<td>OCCUPATIONAL SAFETY AND HEALTH</td>
<td>51.2206.00</td>
<td>MPH (48 SCH)</td>
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<tr>
<td>HEALTH ADMINISTRATION</td>
<td>51.2211.00</td>
<td>MHA (57 SCH)</td>
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4. **Implementation Date:** September 1, 2016

5. **Contact Person:** Provide contact information for the person who can answer specific questions about the program.  
   - **Name:** Dr. Karan L. Watson  
   - **Title:** Provost and Executive Vice President  
   - **E-mail:** watson@tamu.edu  
   - **Phone:** 979-845-4016
Signature Page

I hereby certify that all of the following criteria have been met in accordance with the procedures outlined in Coordinating Board Rules, Chapter 5, Subchapter C, Section 5.44:

(a) The administrative change has institutional approval.

(b) The institution certifies that adequate funds are available to cover the costs of the administrative change.

(c) New costs during the first five years would not exceed $2 million.

(d) The administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests):

(1) The administrative overhead of universities and health-related institutions should be kept low to insure that most of the funds appropriated for higher education go toward the costs of instruction.

(2) The administrative costs of new academic units, particularly colleges and schools, should not be so high as to detract from the quality of the programs the administrative unit contains.

I understand that the Coordinating Board will update the program inventory of the institution to reflect the administrative change if no objections to the proposed administrative change are received during the 30-day public comment period.

__________________________________________  ____________
Chief Executive Officer                          Date

2. TAMUS Office of Academic Affairs Approval

On behalf of the A&M System, I certify that the Office of Academic Affairs has approved the administrative unit.

__________________________________________  ____________
James R. Hallmark, Ph.D.                        Date
Certification Form for Program Revisions
Texas Higher Education Coordinating Board

Directions: An institution shall use this form to request an administrative change that meets all criteria for automatic approval in Coordinating Board Rules, Chapter 5, Subchapter C, Section 5.44: (a) The administrative change has institutional and board of regents approval, (b) the institution certifies that adequate funds are available to cover the costs of the administrative change, (c) new costs during the first five years would not exceed $2 million, and (d) the administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests).

If an administrative change does not meet the criteria above, an institution must submit a request using the Administrative Change Request Form.

An institution may also use this form to report the creation or change to a unit that does not administer a certificate or degree program (e.g., a research center) to update the Program Inventory.

Information: Contact the Division of Academic Affairs and Research at 512/427-6200 for more information.

Administrative Information

1. Institution: Texas A&M University

2. Description of Administrative Change: Discontinue the Master of Science in Public Health (MSPH) degree in Biostatistics. Remove from the degree program inventory.

3. Program Inventory – CIP for MSPH in Biostatistics to be removed is 26.1102.00

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</table>

4. Implementation Date: January 1, 2016

5. Contact Person: Provide contact information for the person who can answer specific questions about the program.
   Name: Dr. Karan L. Watson
   Title: Provost and Executive Vice President
   E-mail: watson@tamu.edu
   Phone: 979-845-4016

AAR Updated 7.30.09
Signature Page

I hereby certify that all of the following criteria have been met in accordance with the procedures outlined in Coordinating Board Rules, Chapter 5, Subchapter C, Section 5.44:

(a) The administrative change has institutional approval.

(b) The institution certifies that adequate funds are available to cover the costs of the administrative change.

(c) New costs during the first five years would not exceed $2 million.

(d) The administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests):

(1) The administrative overhead of universities and health-related institutions should be kept low to insure that most of the funds appropriated for higher education go toward the costs of instruction.

(2) The administrative costs of new academic units, particularly colleges and schools, should not be so high as to detract from the quality of the programs the administrative unit contains.

I understand that the Coordinating Board will update the program inventory of the institution to reflect the administrative change if no objections to the proposed administrative change are received during the 30-day public comment period.

________________________________________________________________________

Chief Executive Officer                                          Date

________________________________________________________________________

2. TAMUS Office of Academic Affairs Approval

On behalf of the A&M System, I certify that the Office of Academic Affairs has approved the administrative unit.

________________________________________________________________________

James R. Hallmark, Ph.D.                                          Date
Certification Form for Program Revisions
Texas Higher Education Coordinating Board

Directions: An institution shall use this form to request an administrative change that meets all criteria for automatic approval in Coordinating Board Rules, Chapter 5, Subchapter C, Section 5.44: (a) The administrative change has institutional and board of regents approval, (b) the institution certifies that adequate funds are available to cover the costs of the administrative change, (c) new costs during the first five years would not exceed $2 million, and (d) the administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests).

If an administrative change does not meet the criteria above, an institution must submit a request using the Administrative Change Request Form.

An institution may also use this form to report the creation or change to a unit that does not administer a certificate or degree program (e.g., a research center) to update the Program Inventory.

Information: Contact the Division of Academic Affairs and Research at 512/427-6200 for more information.

Administrative Information

1. Institution: Texas A&M University

2. Description of Administrative Change: Discontinue the Master of Science in Public Health (MSPH) degree in Health Promotion and Community Health Sciences. Remove from the degree program inventory.

3. Program Inventory – CIP for MSPH in Health Promotion and Community Health Sciences to be removed is 51.2212.00

<table>
<thead>
<tr>
<th>Administrative Structure</th>
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<th>Degree Levels</th>
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<tr>
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<td>DRPH (90 SCH)</td>
</tr>
</tbody>
</table>

4. Implementation Date: January 1, 2016

5. Contact Person: Provide contact information for the person who can answer specific questions about the program.
   Name: Dr. Karan L. Watson
   Title: Provost and Executive Vice President
   E-mail: watson@tamu.edu
   Phone: 979-845-4016
Signature Page

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(b) The institution certifies that adequate funds are available to cover the costs of the administrative change.

(c) New costs during the first five years would not exceed $2 million.

(d) The administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests):

   (1) The administrative overhead of universities and health-related institutions should be kept low to insure that most of the funds appropriated for higher education go toward the costs of instruction.

   (2) The administrative costs of new academic units, particularly colleges and schools, should not be so high as to detract from the quality of the programs the administrative unit contains.

I understand that the Coordinating Board will update the program inventory of the institution to reflect the administrative change if no objections to the proposed administrative change are received during the 30-day public comment period.

__________________________________________  ______________
Chief Executive Officer                      Date

2. TAMUS Office of Academic Affairs Approval

   On behalf of the A&M System, I certify that the Office of Academic Affairs has approved the administrative unit.

__________________________________________  ______________
James R. Hallmark, Ph.D.                     Date
Certification Form for Program Revisions  
Texas Higher Education Coordinating Board

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An institution may also use this form to report the creation or change to a unit that does not administer a certificate or degree program (e.g., a research center) to update the Program Inventory.

**Information:** Contact the Division of Academic Affairs and Research at 512/427-6200 for more information.

---

**Administrative Information**

1. **Institution:** Texas A&M University

2. **Description of Administrative Change:** Discontinue the Master of Science in Public Health (MSPH) degree in Occupational Health. Remove from the degree program inventory.

3. **Program Inventory** – CIP for MSPH in Occupational Health to be removed is 51.2206.00

<table>
<thead>
<tr>
<th>Administrative Structure</th>
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4. **Implementation Date:** May 1, 2016

5. **Contact Person:** Provide contact information for the person who can answer specific questions about the program.
   - **Name:** Dr. Karan L. Watson
   - **Title:** Provost and Executive Vice President
   - **E-mail:** watson@tamu.edu
   - **Phone:** 979-845-4016
Signature Page

I hereby certify that all of the following criteria have been met in accordance with the procedures outlined in Coordinating Board Rules, Chapter 5, Subchapter C, Section 5.44:

(a) The administrative change has institutional approval.

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(c) New costs during the first five years would not exceed $2 million.

(d) The administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests):

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(2) The administrative costs of new academic units, particularly colleges and schools, should not be so high as to detract from the quality of the programs the administrative unit contains.

I understand that the Coordinating Board will update the program inventory of the institution to reflect the administrative change if no objections to the proposed administrative change are received during the 30-day public comment period.

__________________________________________  __________________________
Chief Executive Officer                                  Date

2. TAMUS Office of Academic Affairs Approval

On behalf of the A&M System, I certify that the Office of Academic Affairs has approved the administrative unit.

__________________________________________  __________________________
James R. Hallmark, Ph.D.                                  Date
Certification Form for Program Revisions
Texas Higher Education Coordinating Board

Directions: An institution shall use this form to request an administrative change that meets all criteria for automatic approval in Coordinating Board Rules, Chapter 5, Subchapter C, Section 5.44: (a) The administrative change has institutional and board of regents approval, (b) the institution certifies that adequate funds are available to cover the costs of the administrative change, (c) new costs during the first five years would not exceed $2 million, and (d) the administrative change meets all other criteria in Section 5.47 of Board Rules (relating to Criteria for Administrative Change Requests).

If an administrative change does not meet the criteria above, an institution must submit a request using the Administrative Change Request Form.

An institution may also use this form to report the creation or change to a unit that does not administer a certificate or degree program (e.g., a research center) to update the Program Inventory.

Information: Contact the Division of Academic Affairs and Research at 512/427-6200 for more information.

Administrative Information

1. Institution: Texas A&M University

2. Description of Administrative Change: Discontinue the Master of Science in Public Health (MSPH) degree in Environmental Health. Remove from the degree program inventory.

3. Program Inventory – CIP for MSPH in Environmental Health to be removed is 51.2202.00

<table>
<thead>
<tr>
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4. Implementation Date: September 1, 2016

5. Contact Person: Provide contact information for the person who can answer specific questions about the program.
   Name: Dr. Karan L. Watson
   Title: Provost and Executive Vice President
   E-mail: watson@tamu.edu
   Phone: 979-845-4016
Signature Page

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___________________________________________  __________________________
Chief Executive Officer                      Date

2. TAMUS Office of Academic Affairs Approval

On behalf of the A&M System, I certify that the Office of Academic Affairs has approved the administrative unit.

__________________________________________  __________________________
James R. Hallmark, Ph.D.                       Date
Discontinue MSPH Degree Programs

Current Program Inventory:

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Discontinue MSPH Degree Programs (Continued)

**Proposed Changes to Program Inventory:**

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<td>MPH (45 SCH)</td>
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*NOTE: Request for closure of this program was submitted in 2014*
Discontinue MSPH Degree Programs (Continued)

**Final Program Inventory**

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| DEPARTMENT OF HEALTH PROMTN & COMM HEALTH SCIS 1418 |                  |                  |
| HEALTH PROMOTION AND COMMUNITY HEALTH SCIENCES    | 51.2212.00       | MPH (45 SCH)     |

| DEPARTMENT OF PUBLIC HEALTH STUDIES 2414         |                  |                  |
| PUBLIC HEALTH                                     | 51.2201.00       | BS (120 SCH)     |

| DEPARTMENT OF ENVIRONMENTAL & OCCUPATIONAL HLTH 1057 |                  |                  |
| ENVIRONMENTAL HEALTH                               | 51.2202.00       | MPH (45 SCH)     |

| DEPARTMENT OF EPIDEMIOLOGY AND BIOSTATISTICS 1076 |                  |                  |
| BIOSTATISTICS                                      | 26.1102.00       | MPH (45 SCH)     |
| EPIDEMIOLOGY                                       | 26.1309.00       | MPH (45 SCH)     |

| DEPARTMENT OF HEALTH POLICY AND MANAGEMENT 1431   |                  |                  |
| HEALTH POLICY AND MANAGEMENT                      | 51.2211.00       | MPH (45 SCH)     |
MEMORANDUM

TO:         Mark Zoran, Chair, Graduate Council
FROM:       Wendy Boswell, Department Head, Department of Management, Mays Business School
THROUGH:    Mary Lea McAnally, Associate Dean for Graduate Programs, Mays Business School
DATE:       July 29, 2015

SUBJECT:    Proposed Change in CIP Code for MS in Management

The Department of Management proposes a change to the name of the Master of Science in Management and the CIP code used to classify the degree. The original CIP code classification was not perfectly descriptive of the program content.

In particular, we propose to change the name from Master of Science in Management (MS-MGMT) to Master of Science in Human Resources Management (MS-HRM) and reclassify from the current CIP code of 52.0201 (Business Administration and Management, General) to 52.1001 (Human Resources Management/Personnel Administration, General).

These change requests, once approved, will create a short-term consequence to another Mays Master’s program. Our Professional Program in Accounting (PPA) also uses the current MS-MGMT degree for a program unrelated to Human Resources Management (HRM). PPA students’ program relates to entrepreneurship. Thus, the MS-HRM program name and CIP will not be appropriate for the PPA students.

With this memo, we are confirming our intention to create a new MS in Entrepreneurship degree program. Once approved, we will use that degree for PPA students as well as other students interested in such a course of study. However, during AY16, we will continue to use the MS MGMT degree for the PPA students.

We consulted Deena McConnell, Associate Vice President for Administration and Academic Affairs in the Office of the Provost and Executive Vice President, about this plan. In email dated July 22, she stated the following: “In our follow-up conversation you relayed a plan for a new MS in Entrepreneurship and a change in the current MS-Management to a MS in HR Management – essentially splitting the MS-Management into two degree programs. I believe that this is a good path forward and will accurately reflect the degree programs being offered, while not resulting in unintended consequences....”

We hope that this provides enough background for the Graduate Council to proceed with the name and CIP code request currently on your agenda for the next meeting.
The Mays GIC approves the CIP code change for the Master of Science in Management program, as attached.

Signatures required:

Annie McGowan – ACCT

Lanny Martindale – FINC

Rogello Oliva – INFO

Michael Wesson – MGMT

Stephen McDaniel – MKTG

Attachment
The Mays GIC approves the CIP code change for the Master of Science in Management program, as attached.

Signatures required:

Annie McGowan – ACCT

Lanny Martindale – FINC

Rogello Oliva – INFO

Michael Wesson – MGMT

Stephen McDaniel – MKTG

Attachment
Notification Form for Change to An Existing Degree Program
Texas Higher Education Coordinating Board

Administrative Information

1. **Institution:** Texas A&M University, College Station, Texas

2. **Description of Degree Program Change:**
   
   This proposed administrative change request seeks to change 1) the name and 2) the CIP code for the Master of Science in Management degree program. This change will not alter the curriculum or course content.

   We would like to rename the degree program from "Master of Science in Management" to "Master of Science in Human Resource Management." In addition, we propose to reclassify the degree program from the current CIP code of 52.0201 (Business Administration and Management, General) to 52.1001 (Human Resources Management/Personnel Administration, General). The proposed name and CIP code more accurately describe the content of the program being offered to students. This change will not alter the course content, curriculum, or program requirements in any way.

3. **Degree Program Inventory Change:**

   **Current:**
   
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<td>52.0201.00</td>
<td>BBA (120 SCH)</td>
<td>MS (32 SCH)</td>
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   **Proposed Changes:**
   
<table>
<thead>
<tr>
<th>MAYS BUSINESS SCHOOL 03 0490</th>
<th></th>
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<tbody>
<tr>
<td>DEPARTMENT OF MANAGEMENT 1780</td>
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<tr>
<td>MANAGEMENT</td>
<td>52.0201.00</td>
<td>BBA (120 SCH)</td>
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<tr>
<td>HUMAN RESOURCE MANAGEMENT</td>
<td>52.1001.00</td>
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<td>MS (32 SCH)</td>
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   **Final:**
   
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<tr>
<th>MAYS BUSINESS SCHOOL 03 0490</th>
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<tr>
<td>HUMAN RESOURCE MANAGEMENT</td>
<td></td>
<td></td>
<td>MS (32 SCH)</td>
</tr>
</tbody>
</table>

4. **Implementation Date:** September 1, 2015

5. **Phase Out Date:** Not applicable

6. **Contact Person:**
   
   Name: Murray Barrick
   
   Title: University Distinguished Professor, Paul M. & Rosalie Robertson Chair in Business, Director of Center for Human Resource Management
   
   Email: mbarrick@mays.tamu.edu
   
   Phone: 979.845.0329
Signature Page

Institutional Approval:

Karan L. Watson
Provost and Executive Vice President

The Texas A&M University System Approval:

James R. Hallmark
Vice Chancellor for Academic Affairs
The Texas A&M University System
Administrative Change Request
Change to An Existing Degree Program

I. Current Degree Information:

Master of Science in Management

CIP Code 52.0201: Business Administration and Management, General.

The program is administered entirely by the Department of Management at Mays Business School.

II. Proposed Change:

A. Program Identification:

We propose two changes to the MS in Management degree program:

1. Change the name from Master of Science in Management to Master of Science in Human Resource Management.
2. Reclassify the degree program from the current CIP code of 52.0201 (Business Administration and Management, General) to 52.1001 (Human Resources Management/Personnel Administration, General).

The original name and CIP code classification is no longer appropriately descriptive of the program content. Changes in the program’s content that have occurred are a product of our efforts to provide students with the skills required to succeed as human resource management professionals. There is strong student demand to gain these skills and there is strong demand among employers to hire graduates from our program.

B. Justification for Change:

The existing degree program, as originally authorized by the Coordinating Board, is to cover managerial tools, techniques, and concepts through which individuals enhance various skills including those related to planning, organizing, directing, and controlling. In addition to conveying knowledge regarding management theory, organization and production, and purchasing and logistics, the originally authorized degree program includes a focus on human resources management and behavior.

Across time and in light of enhanced interests from students, the content of the MS in Management degree program has shifted to concentrate more specifically on Human Resource Management as a part of the managerial process. The change in degree program name and CIP code allows us to more precisely capture the nature of the program that serves an expressed need from students.

We request that the name of the degree program be changed to Master of Science in Human Resource Management and that the CIP code for our degree program be changed to 52.1001: Human Resources Management / Personnel Administration, General. (Definition: A program that generally prepares individuals to manage the development of human capital in organizations, and to provide related services to individuals and groups. Includes instruction in personnel and organization policy, human resource dynamics and flows, labor relations, sex roles, civil rights, human resources law
and regulations, motivation and compensation systems, work systems, career management, employee testing and assessment, recruitment and selection, managing employee and job training programs, and the management of human resources programs and operations.\(^1\) This name and code more accurately describes the degree program being offered to masters' students.

The requested changes would not alter the course content, curriculum, or program requirements in any way.

C. Other Changes Associated With Request.
   1. Focus/purpose or objectives/mission of degree. \textbf{NONE}
   2. Additional areas of employment available to graduates. \textbf{NONE}

D. Describe changes in the curriculum:
   1. Degree completion requirements. \textbf{NONE}
   2. Additional new courses to be added: \textbf{NONE}
   3. Changes to existing courses: \textbf{NONE}
   4. Courses common to all students in the degree plan: \textbf{NONE}
   5. How will the set of courses required of all students in the degree program change? \textbf{NO SUCH CHANGE}
   6. New specializations (tracks, concentrations, focus areas, emphases, etc.): \textbf{NONE}

E. Describe new accreditation, licensure & certification
   1. What new program accreditation would become available? \textbf{NONE}
   2. What new professional licensure or certification would become available? \textbf{NONE}

F. Describe changes needed in core faculty
   1. New faculty needed to implement proposed change: \textbf{NONE}
   2. New areas of expertise sought in additional faculty during past three years that have contributed to degree program change: \textbf{NONE}
   3. New areas of expertise in additional faculty that will be hired during the upcoming three year: \textbf{NONE}
   4. Existing faculty that will be reassigned to a different program or terminated. Other faculty that would become responsible for program delivery: \textbf{NONE}

G. Cost:
   1. Please indicate \textbf{new} costs that will be incurred with the modification to the degree program during the first five years after the changes: \textbf{NONE}
   2. How will these costs be met? \textbf{NO ADDITIONAL COSTS}

\(^1\) National Center for Education Statistics, Classification of Instructional Programs, available at http://nces.ed.gov/ipeds/clpcode/
Informational Items
First Professional Programs
Informational Review
August 2015

College of Medicine

New Courses

MEID 700. Becoming a Physician II.

Lecture contact hours and semester credit hours
From: (5-0). Credit 5.
To: (3-0). Credit 3.

MEID 701. Hematology and Oncology.

Lecture contact hours and semester credit hours
From: (4-0). Credit 4.
To: Credit 1 to 10.

COMPASS course title
From: HEMATOLOGY/ONCOLOGY
To: HEMATOLOGY AND ONCOLOGY

MEID 705. Seminar Day.

Lecture contact hours and semester credit hours
From: (0.5-0). Credit .5.
To: Credit 0.5 to 5.

Course title
From: Seminar Day
To: Medical Student Grand Rounds

MEID 705. Seminar Day.

Lecture contact hours and semester credit hours
From: (0.5-0). Credit 0.5.
To: Credit 0.5 to 5.

Course title
From: Seminar Day
To: Medical Student Grand Rounds

MFCM 700. O.C. Cooper Preceptorship.

Course prefix and number
From: MFCM 700.
To: MEID 709.

Lecture contact hours and semester credit hours
From: (4-0). Credit 4.
To: Credit 1 to 10.
INFORMATIONAL REVIEW

COLLEGE OF MEDICINE
CHANGE IN COURSES
Texas A&M University
Departmental Request for a Change in Course
Undergraduate • Graduate • Professional
• Submit original form and attachments •

Form Instructions
1. Course request type: [ ] Undergraduate  [ ] Graduate  [X] First Professional (DDS, MD, JD, PharmD, DVM)
2. Request submitted by (Department or Program Name): Select or Type Department/Program Name
3. Course prefix, number and complete title of course: MEID 700 - Becoming a Physician II

   Attach a brief supporting statement for changes made to items 4a thru 4d and 10 below.

4. Change requested
   a. Prerequisite(s): From: ____________________________ To: ____________________________
   b. Withdrawal (reason): ____________________________
   c. Cross-list with: ____________________________

   Cross-listed courses require the signature of both department heads.
   d. Change in course title and description. Enter complete current course title and current course description in item 9; enter proposed course title and proposed course description in item 10. Complete item 11a and b for a change in title.
   e. Change in course number, contact hours (lab & lecture), and semester credit hours. Complete item 11a and b. Attach a course syllabus.
5. Is this an existing core curriculum course? [X] Yes  [ ] No
6. If grade type is changing for existing course, indicate the new grade type: [ ] Grade  [ ] S/U  [ ] P/F (CLMB)
7. If this course will be stacked, indicate the course number of the stacked course: ________________________________________________________________________________________________
   [X] I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).
8. Complete current course title and current catalog course description:

9. Complete proposed course title and proposed catalog course description (not to exceed 50 words):

10. Complete proposed course title and proposed catalog course description (not to exceed 50 words):

   a. As currently in course inventory:
      Prefix  Course #  Title (excluding punctuation)
      MEID  700  Becoming a Physician II
      Lect.  Lab  Other  SCL1  CIP and Fund Code  Admin. Unit  FICE Code  Level
      80.00  5.00  51.1201.00  0  0  3  6  3  2

   b. Change to:
      Prefix  Course #  Title (excluding punctuation)
      MEID  700  Becoming a Physician II
      Lect.  Lab  Other  SCL1  CIP and Fund Code  Admin. Unit  Acad. Year  FICE Code  Level
      48.00  3.00  51.1201.00  -  0  0  3  6  3  2

      Approval recommended by:

      [Signature]  [Signature]
      [Name]  [Name]
      [Title]  [Title]
      [Date]  [Date]

   Submitted to Coordinating Board by:

   [Signature]  [Name]
   [Title]  [Date]

   Questions regarding this form should be directed to Sandra Williams at 845 8201 or sandra.williams@tamu.edu.
   Curricular Services – 08/14
Course title and number  MIED 700- Becoming a Physician (BAP II)
Term (e.g., Fall 200X)  Fall & Spring AY 2015-2016
Meeting times and location  Tuesday’s 10:00 AM LL30/LH1 unless otherwise noted

Course Description and Prerequisites

This course is designed to be the link between the science of medicine and the art of patient care; Course topics address aspects of the human experience that pertain to medicine and correspond to the scientific topics taught in the second year of the Phase II curriculum; This course will demonstrate how even in the molecular and microscopic dimension of medicine, human values are manifest in the life of the patient and the patient’s family.

College Station Campus

<table>
<thead>
<tr>
<th></th>
<th>Course Co-Director</th>
<th>Course Coordinator</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Craig Borchardt, Ph.D.</td>
<td>Jessica Clements</td>
</tr>
<tr>
<td>Email</td>
<td><a href="mailto:cwborchardt@medicine.tamhsc.edu">cwborchardt@medicine.tamhsc.edu</a></td>
<td><a href="mailto:jclements@medicine.tamhsc.edu">jclements@medicine.tamhsc.edu</a></td>
</tr>
<tr>
<td>Phone</td>
<td>979.821.2266</td>
<td>979.436.9114</td>
</tr>
<tr>
<td>Office location</td>
<td>Clinical Bldg. 1, Suite 1400</td>
<td>CB1, Suite 4100</td>
</tr>
<tr>
<td>Office hours</td>
<td>By appointment</td>
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Temple Campus

<table>
<thead>
<tr>
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</tr>
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<tbody>
<tr>
<td>Name</td>
<td>Tresa McNeal, M.D.</td>
<td>Keeouka Knighton</td>
</tr>
<tr>
<td>Email</td>
<td><a href="mailto:tmcneal@sw.org">tmcneal@sw.org</a></td>
<td><a href="mailto:krivera@medicine.tamhsc.edu">krivera@medicine.tamhsc.edu</a></td>
</tr>
<tr>
<td>Phone</td>
<td>254-724-4926</td>
<td>254-724-2368</td>
</tr>
<tr>
<td>Office location</td>
<td>Medical Education Center 411A</td>
<td>Medical Education Center 411</td>
</tr>
<tr>
<td>Office hours</td>
<td>By Appointment</td>
<td>By appointment</td>
</tr>
</tbody>
</table>

Learning Outcomes & Objectives

Overall Course Goals:
This is a professional formation course designed to:
- Increase the student's understanding of the foundational principles of medical ethics, professionalism and communication;
- Enhance the student's practical use of evidence based medicine and basic research tools;
- Assist in the continued development of the student's recognition of the importance of the doctor-patient relationship.
- Increase the student's understanding of the role of palliative care in the practice of medicine, including end-of-life care.

Upon completion of the course, students will be able to:

COM Competency Based Learning Objectives: [http://medicine.tamhsc.edu/academic-affairs/curriculum/objectives/](http://medicine.tamhsc.edu/academic-affairs/curriculum/objectives/)

Principles and Guidelines for Curriculum Development:

Date Created/Revised: 5/27/2015 By: K.Knighton
<table>
<thead>
<tr>
<th>Course Objective:</th>
<th>COM Competency Based Learning Objectives (CBLO):</th>
<th>Taught (T) and/or Evaluated (E):</th>
<th>Evaluation:</th>
</tr>
</thead>
<tbody>
<tr>
<td>CO #1: Utilize and demonstrate effective communication skills with standardized patients and peers.</td>
<td>ICS1: Demonstrate effective listening skills</td>
<td>Taught AND Evaluated</td>
<td>Participation</td>
</tr>
<tr>
<td>CO #1: Utilize and demonstrate effective communication skills with standardized patients and peers.</td>
<td>ICS2: Discuss diagnostic and treatment options in a manner comprehensible to the patient</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
</tr>
<tr>
<td>CO #1: Utilize and demonstrate effective communication skills with standardized patients and peers.</td>
<td>ICS3: Communicate effectively with patients, patients' family members, peers, and other members of the health care team</td>
<td>Taught AND Evaluated</td>
<td>Participation</td>
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<tr>
<td>CO #1: Utilize and demonstrate effective communication skills with standardized patients and peers.</td>
<td>ICS4: Educate patients, patients' family members, peers, and other members of the health care team at an appropriate level using appropriate technologies</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
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<tr>
<td>CO #1: Utilize and demonstrate effective communication skills with standardized patients and peers.</td>
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<td>Participation</td>
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<tr>
<td>CO #2: Recognize health care system deficiencies and various approaches to the delivery of health care.</td>
<td>SBP3: Demonstrate an understanding of cost containment principles and their application in the delivery of health care</td>
<td>Taught AND Evaluated</td>
<td>Quiz (written/computer-based)</td>
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<tr>
<td>CO #2: Recognize health care system deficiencies and various approaches to the delivery of health care.</td>
<td>SBP4: Demonstrate an understanding of the legal and regulatory frameworks governing the</td>
<td>Taught AND Evaluated</td>
<td>Quiz (written/computer-based)</td>
</tr>
</tbody>
</table>

Date Created/Revised: 5/27/2015 By: K.Knighton
| CO #2: Recognize health care system deficiencies and various approaches to the delivery of health care | SBP5: Recognize various approaches to the organization, financing, and delivery of health care | Taught AND Evaluated | Quiz (written/computer-based) |
| CO #3: Utilize critical thinking skills when locating and using information. | PBL14: Utilize information resources and available data to support life-long learning | Taught AND Evaluated | Research or Project Assessment |
| CO #4: Explain important aspects of cultural competence to ensure recognition of cultural biases, and cultural perceptions of illness. | CC2: Recognize and appropriately address gender and cultural biases in themselves, in others, and in the process of health care delivery. | Taught AND Evaluated | Participation |
| CO #4: Explain important aspects of cultural competence to ensure recognition of cultural biases, and cultural perceptions of illness. | PROF5: Respect the privacy of patients | Taught AND Evaluated | Participation |
| CO #4: Explain important aspects of cultural competence to ensure recognition of cultural biases, and cultural perceptions of illness. | PROF6: Work with other health professionals in a collaborative fashion | Taught AND Evaluated | Clinical Performance Rating/Checklist |
| CO #4: Explain important aspects of cultural competence to ensure recognition of cultural biases, and cultural perceptions of illness. | PROF11: Respond to conflicts in a professional manner | Evaluated | Participation |

Date Created/Revised: 5/27/2015 By: K.Knighton
<table>
<thead>
<tr>
<th>CO #4: Explain important aspects of cultural competence to ensure recognition of cultural biases, and cultural perceptions of illness.</th>
<th>PROF12: Project a professional image in demeanor and personal appearance</th>
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<th>Participation</th>
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</thead>
<tbody>
<tr>
<td>CO #5: Review patient cases and make recommendations for patient care which reflect sound ethical decision making.</td>
<td>PROF1: Demonstrate an understanding of legal and ethical principles governing the physician-patient relationship</td>
<td>Taught AND Evaluated</td>
<td>Participation</td>
</tr>
<tr>
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</tr>
<tr>
<td>CO #5: Review patient cases and make recommendations for patient care which reflect sound ethical decision making.</td>
<td>PROF2: Display honesty, integrity and ethical behavior</td>
<td>Evaluated</td>
<td>Participation</td>
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<tr>
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<tr>
<td>CO #6: Explain the distinction between palliative care and curative care and its importance to the medical profession</td>
<td>PC15: Formulate preventive, curative, rehabilitative, and palliative therapeutic strategies for common disorders</td>
<td>Taught AND Evaluated</td>
<td>Participation</td>
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<td>Clinical Performance Rating/Checklist</td>
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<tr>
<td>CO #6: Explain the distinction between palliative care and curative care and its importance to the medical profession</td>
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<td>Quiz (written/computer-based)</td>
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<tr>
<td>CO #7: Explain how medical humanities relate to the doctor-patient relationship, the conceptualization of illness, palliative care, and professionalism.</td>
<td>ICS1: Demonstrate effective listening skills</td>
<td>Taught AND Evaluated</td>
<td>Research or Project Assessment</td>
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<td>Participation</td>
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<td>Quiz (written/computer-based)</td>
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</table>
to the doctor-patient relationship, the conceptualization of illness, palliative care, and professionalism.

<table>
<thead>
<tr>
<th>Grading and Evaluation Methods</th>
<th>Points Assigned to Course Components</th>
<th>Percentage of Total Course Grade</th>
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</thead>
<tbody>
<tr>
<td>Selectives</td>
<td>25%</td>
<td></td>
</tr>
<tr>
<td>Selective 1</td>
<td>125 pts</td>
<td></td>
</tr>
<tr>
<td>Selective 2</td>
<td>125 pts</td>
<td></td>
</tr>
<tr>
<td>Palliative Care</td>
<td>20%</td>
<td></td>
</tr>
<tr>
<td>SP evaluation</td>
<td>100 pts</td>
<td>Students will earn a percentage of 75 pts based on the SP evaluation form (for example 20/20 on the SP form will earn 75 pts; 18/20 will earn 67.5 pts)</td>
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<tr>
<td>Student Self Evaluation</td>
<td>75 pts</td>
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<tr>
<td>SP Pre-Quiz</td>
<td>50 pts</td>
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<tr>
<td>Didactic</td>
<td>10%</td>
<td></td>
</tr>
<tr>
<td>Pre-Quizzes</td>
<td>60 pts</td>
<td>3 quizzes, 20 pts per quiz</td>
</tr>
<tr>
<td>Panels</td>
<td>15%</td>
<td></td>
</tr>
<tr>
<td>Paper</td>
<td>140 pts</td>
<td>35 pts per paper for 4 panels</td>
</tr>
</tbody>
</table>

Date Created/Revised: 5/27/2015 By: K.Knighton
Panel quizzes | 20 pts | 5 questions per quiz for each panel |  
---|---|---|---
**Patient Encounter** |  |  | 15%  
Paper | 155 pts |  |  
Quiz | 0 pts |  |  
**EBM** |  |  |  
Epidemiology Quiz | 5 pts | Due Dec. 1st in class | 15%  
Biostatistics Modules | 80 pts | 8 pts per 10 modules Modules 1-3 due by Dec. 1st Modules 4-6 due by Dec. 15th Modules 7-10 due by Jan. 5th |  
“Ask the Clinical Question” Module | 5 pts | Due by Feb. 2nd |  
**PICO Assignment** | 15 pts | Due by Feb. 2nd |  
**Critical Appraisal Assignment** | 45 pts | Due by March 1st |  
**Total** | 1000 pts |  | 100%  

**GRADING SCALE**

- **Pass**: Pass / F 70-100
- **Fail**: Fail/ F 69 and below

**Attendance and Make-up Policies**

Attendance is mandatory for all BAP II sessions. If a student arrives to class more than 10 minutes after the scheduled class time, the student will be considered absent. It is up to the discretion of the faculty member whether the student will be admitted to class.

If a student is absent, he or she must follow the Phase II absence policy and submit the required form(s). If an absence is excused, a student may complete a make-up assignment for full credit and may receive an extension for any pre-test associated with the missed class. If an absence is unexcused, a student may complete a make-up assignment for up to 70% credit, but the student will not be given an extension for any pre-test associated with the missed class.

**Phase I and II Overall Mandatory Class Attendance Requirements**

For ALL Phase I and II Blocks, class attendance is required for all laboratory sessions, clinical correlations, patient encounters, and other activities indicated as "Mandatory" on the class schedule. Attendance at all class sessions in the Introduction to Clinical Skills (ICS) I, ICS II, Preceptorship, and Becoming a Physician I and II is also required. Lectures designated as "Mandatory" will require you to sign an attendance sheet that will be available for you to sign at the beginning of the presentation. It is your responsibility to make sure that you have signed the attendance sheet. Any missing signatures on the attendance sheet will be regarded as unexcused absences. Signing in for someone other than yourself will be considered a serious breach of professionalism and academic dishonesty, and will be subject to disciplinary action, including dismissal.

Students missing any of these required class sessions without an excused absence will be subject to the following:

- First (1st) unexcused absence – a point will be deducted from the numerical block or course grade in which the unexcused absence occurred and the student is required to meet with Phase Leaders regarding this unexcused absence to address any professionalism concerns that may be associated with the absence.

- For the Second (2nd), Third (3rd) and Fourth (4th) cumulative unexcused absences within a Phase – a point will be further deducted from the numerical block or course grade in which each of the
unexcused absences occurred and the student is required to meet with the Assistant/Associate Dean for Student Affairs. The second, third, and fourth unexcused absences are cumulative for each Phase.

In addition, upon incurring the third (3rd) cumulative unexcused absence, the Phase Leaders will recommend to the Student Promotions Committee the student be placed on the Concern List. If the student is already on the Promotions Committee Concern List, he/she may be placed on probation.

For the fourth (4th) cumulative unexcused absence, a report will be written by the Phase Leaders about the student’s chronic absence behavior and sent directly to the College of Medicine Student Promotions Committee with the recommendation that the student be considered to be placed on probation. Website link to student rule 7 [http://student-rules.tamu.edu/rule07](http://student-rules.tamu.edu/rule07).

### Course Topics, Calendar of Activities, Major Assignment Dates

<table>
<thead>
<tr>
<th>Week</th>
<th>Date</th>
<th>Method</th>
<th>Topic(s)</th>
<th>Primary Instructor</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Jul 27</td>
<td>No Class</td>
<td>First Week of Phase II</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>Aug 4</td>
<td>Selective 1</td>
<td>Intro to Course Reception (10:00 AM – 11:00 AM only)</td>
<td>All MHUM Faculty</td>
</tr>
<tr>
<td>3</td>
<td>Aug 11</td>
<td>Selective 1</td>
<td>As per student registration</td>
<td>MHUM &amp; Guest Faculty</td>
</tr>
<tr>
<td>4</td>
<td>Aug 18</td>
<td>Selective 1</td>
<td>As per student registration</td>
<td>MHUM &amp; Guest Faculty</td>
</tr>
<tr>
<td>5</td>
<td>Aug 25</td>
<td>Selective 1</td>
<td>As per student registration</td>
<td>MHUM &amp; Guest Faculty</td>
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<tr>
<td>6</td>
<td>Sep 1</td>
<td>Selective 1</td>
<td>As per student registration</td>
<td>MHUM &amp; Guest Faculty</td>
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<tr>
<td>7</td>
<td>Sep 8</td>
<td>Selective 1</td>
<td>As per student registration</td>
<td>MHUM &amp; Guest Faculty</td>
</tr>
<tr>
<td>8</td>
<td>Sep 15</td>
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<td>MHUM &amp; Guest Faculty</td>
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<td>As per student registration</td>
<td>MHUM &amp; Guest Faculty</td>
</tr>
<tr>
<td>10</td>
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<td>MHUM &amp; Guest Faculty</td>
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<tr>
<td>11</td>
<td>Oct 6</td>
<td>Selective 1</td>
<td>As per student registration</td>
<td>MHUM &amp; Guest Faculty</td>
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<tr>
<td>12</td>
<td>Oct 13</td>
<td>Selective 1</td>
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<td>MHUM &amp; Guest Faculty</td>
</tr>
<tr>
<td>13</td>
<td>Oct 20</td>
<td>Didactic Case</td>
<td>Palliative Care – Prognostication</td>
<td>Lux (Temple) TBD (Bryan)</td>
</tr>
<tr>
<td>14</td>
<td>Oct 27</td>
<td>SIM</td>
<td>Palliative Care (Group A) TeamSTEPPS (Groups B&amp;C)</td>
<td>Borchardt Bentley</td>
</tr>
<tr>
<td>15</td>
<td>Nov 3</td>
<td>SIM</td>
<td>Palliative Care (Group B) TeamSTEPPS (Groups A&amp;D)</td>
<td>Borchardt Bentley</td>
</tr>
<tr>
<td>16</td>
<td>Nov 10</td>
<td>SIM</td>
<td>Palliative Care</td>
<td>Borchardt</td>
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Date Created/Revised: 5/27/2015 By: K. Knighton
<table>
<thead>
<tr>
<th>Week</th>
<th>Date</th>
<th>Method</th>
<th>Topic(s)</th>
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<tr>
<td>17</td>
<td>Nov 17</td>
<td>SIM</td>
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<td>18</td>
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<td>No Class</td>
<td>Self-Study</td>
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<td></td>
<td>Thanksgiving Break (11/26/15 – 11/29/15)</td>
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<td>19</td>
<td>Dec 1</td>
<td>Didactic</td>
<td>EBM</td>
<td>Shurtz</td>
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<tr>
<td>20</td>
<td>Dec 8</td>
<td>No Class</td>
<td>Self-Study</td>
<td>N/A</td>
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<tr>
<td>21</td>
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<td>Winter Break (12/21/15-1/4/16)</td>
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<tr>
<td>22</td>
<td>Jan 6</td>
<td>Small Group</td>
<td>Patient Encounter (Group A) EBM (Groups C,D)</td>
<td>Stramaski</td>
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<tr>
<td>23</td>
<td>Jan 12</td>
<td>Small Group</td>
<td>Patient Encounter (Group B) EBM (Groups C, D)</td>
<td>Shurtz</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>MLK Holiday (1/19/15)</td>
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<tr>
<td>24</td>
<td>Jan 19</td>
<td>Small Group</td>
<td>Patient Encounter (Group C) EBM (Groups A,B)</td>
<td>Stramaski</td>
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<td>25</td>
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<td>Small Group</td>
<td>Patient Encounter (Group D) EBM (Groups A,B)</td>
<td>Shurtz</td>
</tr>
<tr>
<td>26</td>
<td>Feb 2</td>
<td>Didactic</td>
<td>Rehab Medicine and Discharge Planning (Bryan) Medical Law (Temple)</td>
<td>Aval Green</td>
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<tr>
<td>27</td>
<td>Feb 9</td>
<td>Didactic</td>
<td>Rehab Medicine and Discharge Planning (Temple) Medical Law (Bryan)</td>
<td>Aval Green</td>
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<tr>
<td>28</td>
<td>Feb 16</td>
<td>No Class</td>
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<tr>
<td>29</td>
<td>Feb 23</td>
<td>Didactic</td>
<td>Cost-Conscious Care</td>
<td>McNeal (Temple)</td>
</tr>
<tr>
<td>30</td>
<td>Mar 1</td>
<td>Panel</td>
<td>Understanding Your GLBT Patients</td>
<td>TBD (Bryan)</td>
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<tr>
<td>31</td>
<td>Mar 8</td>
<td>Panel</td>
<td>Domestic Violence (APS &amp; CPS)</td>
<td>Guest Panelists</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Spring Break (3/14/15 – 3/18/15)</td>
<td></td>
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<tr>
<td>32</td>
<td>Mar 22</td>
<td>Panel</td>
<td>Continuum of Care (SNF, LTAC, HH, etc.)</td>
<td>Guest Panelists</td>
</tr>
<tr>
<td>33</td>
<td>Mar 29</td>
<td>Panel</td>
<td>What Nurses Wish Physicians Knew</td>
<td>Guest Panelists</td>
</tr>
<tr>
<td>34</td>
<td>Apr 5</td>
<td>Panel</td>
<td>Clerkship Professionalism</td>
<td>McNeal (Temple)</td>
</tr>
<tr>
<td>35</td>
<td>Apr 12</td>
<td>Didactic</td>
<td>Black-Zanveld Lecture</td>
<td>TBD</td>
</tr>
</tbody>
</table>

**Teaching & Evaluation Methods:**

Several teaching and evaluation methods will be employed in this course. Examples of some of the evaluation forms are included within this syllabus in Appendix A.

- **Didactics.** The entire class will meet at the assigned class time (Tuesday, 10-12 pm), for a lecture, followed by a small group exercise. The lectures will be given by content-experts, including humanities faculty, TAMHSC faculty, and guest lecturers regarding the topics referenced in the course objectives above.

Date Created/Revised: 5/27/2015 By: K.Knighton
• EVALUATION METHOD:
  ▪ Pre-readings for each didactic will be assigned and a pre-reading quiz will be completed in class at 10:00 am the day of the didactic. Pre-readings will be posted on Blackboard at least two weeks prior to quiz due date.
  ▪ Students will be graded on their performance in small group by the Small Group Leader. (See Appendix A)

• Selectives. Selectives are 4-week mini courses that are a part of the BAP II course. Selectives will be offered twice during the course. Students will be able to choose from a variety of topics in the Selective session. Every effort will be made to place students in one of their top three preferences for each Selective. Selective course topics are available on Blackboard.

• EVALUATION METHOD:
  ▪ Evaluation methods are determined by each selective instructor and will be presented in the first session of each selective.

• Palliative Care – After a didactic preparatory session, students will complete a patient encounter on an assigned palliative care case in the SIM Center at assigned class times. Palliative care lab times will be clearly indicated in the pertinent block schedules for Phase II

• EVALUATION METHOD:
  • SP Evaluation – Standardized Patients (SPs) will complete the Standardized Patient Evaluation Form (see Appendix A below) for each student following each session.
  • Pre-lab Quiz – Students will complete a quiz on assigned readings prior to each lab, due by 5:00 pm the day before the lab. Pre-readings will be posted on Blackboard at least two weeks prior to the quiz due date.
  • Self-Evaluation - Students will view a video of their SP exercise and complete a self-evaluation form.

• Patient Encounters – are guided encounters with patients, jointly led by science and humanities faculty, addressing scientific, ethical, and patient care issues as they pertain to specific diseases and illness.

• EVALUATION METHOD:
  • Students will write a one-page response paper to a prompt question provided by faculty after each encounter.
  • Students will complete a Pre-encounter Quiz on assigned readings in class at 10:00 am the day of the encounter. Pre-readings will be posted on Blackboard at least two weeks prior to the quiz due date.
  • Students will complete a two-part EBM assignment related to the patient encounter:
    1. Write a clinical question related to the patient encounter (in PICO format).
    2. Search for and appraise evidence answering their patient-related (PICO) question.

• Panels – Each panel addresses a topic that will be helpful to students in their clerkship year, specifically dealing with patient care issues. Each panel will consist of health care professionals who are experts in each subject to be addressed.

• EVALUATION METHOD:
  • Pre-readings for each panel will be assigned and a pre-reading quiz will be completed in class at 10:00 am the day of the panel. Pre-readings will be posted on Blackboard at least two weeks prior to the quiz due date.
  • A one page paper responding to a prompt question will also be required after the completion of each panel.

• Evidence Based Medicine (EBM) – EBM sessions will be case-based, group activities preparing students to formulate effective clinical questions and to search for/appraise evidence to guide in clinical decision-making. Sessions will integrate the epidemiology/biostatistics concepts covered

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on the USMLE Step 1 while teaching critical appraisal of evidence.

- **EVALUATION METHOD:**
  - EBM self-directed learning modules (within Blackboard):
    1. Assigned modules and readings from the Jekel’s textbook will introduce concepts and fundamentals of the EBM process to be practiced during each session.
    2. Biostatistics modules with pre-test(s) and post-test(s) will help students prepare for Step 1 biostatistics questions, and for appraising evidence in EBM sessions. Two opportunities provided for post-test(s).
  - EBM assignments related to Patient Encounter: 2-part assignment (to be completed within Blackboard):
    1. Part 1—formulating a clinical question in PICO format
    2. Part 2—searching for/appraising evidence to answer the PICO question

- TeamSTEPPS—The TeamSTEPPS Fundamental training prepares students for inter and intra professional teamwork and communication. Teamwork training improves the culture for professional collaboration with a shared mental model for excellence in quality and safety. TeamSTEPPS, is an evidence-based team training and implementation toolkit that demonstrates techniques of effective communication and other teamwork skills to improve patient safety. The goal for effective teamwork and communication is higher quality, safer patient care through highly effective medical teams that optimize the use of resources, information, and people to achieve the best clinical outcomes for patients. Assignments and activities are conducted in class.

**Evaluation Method** - Assigned modules and activities are presented and guided by faculty during class sessions.

**Attendance Policy**
Attendance is mandatory for all BAP II sessions. If a student arrives to class more than 10 minutes after the scheduled class time, the student will be considered absent. It is up to the discretion of the faculty member whether the student will be admitted to class.

If a student is absent, he or she must follow the Phase II absence policy and submit the required form(s). If an absence is excused, a student may complete a make-up assignment for full credit and may receive an extension for any pre-test associated with the missed class. If an absence is unexcused, a student may complete a make-up assignment for up to 70% credit, but the student will not be given an extension for any pre-test associated with the missed class.

**Other Pertinent Course Information**

**Syllabus Disclaimer**
While the provisions of this syllabus are as accurate and complete as possible, the faculty reserve the right to change any provisions herein without actual notice if circumstances so warrant. Every effort will be made to keep students advised of such changes and information about such changes will be available via a Blackboard announcement posting. It is the responsibility of each student to access Blackboard regularly and know what changes, if any, have been made to the provisions of this syllabus and to successfully complete the requirements of the course.

**Learning Materials and Activities**
Course materials are available on our Blackboard Course (MFD) 700 Becoming A Physician II) website 24/7 at [https://tamhs.c.Blackboard.com/](https://tamhs.c.Blackboard.com/). Additional readings may be assigned via email.

**Textbooks (Required and Recommended Resources)**

The following book is **required** for the EBM component of the course:


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Students may purchase either:

1. A print copy of the 4th edition, which includes online access to the practice problems, such is available here: [http://www.amazon.com/Jekels-Epidemiology-Biostatistics-Preventive-Medicine/dp/1455706582](http://www.amazon.com/Jekels-Epidemiology-Biostatistics-Preventive-Medicine/dp/1455706582)


All required materials are also found on the MEID 700 Becoming A Physician II website.

**Americans with Disabilities Act (ADA)**

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit [http://disability.tamu.edu](http://disability.tamu.edu)

Any student with a disability who needs accommodation should inform the instructor at the beginning of the course.

**Academic Integrity**

For additional information please visit: [http://aggiehonor.tamu.edu](http://aggiehonor.tamu.edu)

"An Aggie does not lie, cheat, or steal, or tolerate those who do."

**College of Medicine**

**Professionalism and integrity Statement (Academic Honesty and Plagiarism)**

All College of Medicine students are required to comply with the student code of conduct and the academic integrity and honesty standards published in each component’s Student Handbook. Disciplinary action will be taken in accordance with the policies of each component. Students found guilty of Academic Dishonesty will receive an "F"/Unsatisfactory in the course. For a full list of actions qualifying as academic dishonesty, please review the College of Medicine Student Handbook at [http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf](http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf)

According to the Aggie Honor System Office, plagiarism is defined as the appropriation of another person's ideas, processes, results, or words without giving appropriate credit. Intentionally, knowingly, or carelessly presenting the work of another as one's own (i.e., without crediting the author or creator). Plagiarism and other academic misconduct definitions can be viewed on the Aggie Honor System Office website: [http://aggiehonor.tamu.edu/RulesAndProcedures/HonorSystemRules.aspx#definitions](http://aggiehonor.tamu.edu/RulesAndProcedures/HonorSystemRules.aspx#definitions)

**E-mail Access and FERPA**

The College of Medicine is communicating all official information to students through the students’ TAMHSC e-mail accounts. Please check the account frequently during the semester for updates.

This course is supported with web-based and/or e-mail activities. In order to take advantage of these additional resources and participate fully in the course, you have been assigned an e-mail address by the Texas A&M Health Science Center. This e-mail address is for internal use only, so that faculty may

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communicate with you and the entire class. By registering for this course, you are agreeing to allow your classmates to have access to this e-mail address. Should you have any questions, please contact the TAMU’s Office of the Registrar at 979-845-1031.

The Family Educational Rights and Privacy Act of 1974 (FERPA), which the HSC complies fully, is intended to protect the privacy of education records, to establish the rights of students to inspect and review their education records and to provide guidelines for the correction of inaccurate or misleading data through informal and formal hearings. Students also have the right to file complaints with the Family Educational Rights and Privacy Act Office of the Department of Education in Washington, D.C., concerning alleged failures by the HSC to comply with the act.

**Mistreatment of Students**

The College of Medicine is committed to providing a positive learning environment in which students can meet their academic goals based on mutual respect in the teacher/learner relationship. Both parties must be sensitive to the needs of others and differences in gender, race, sexual orientation, religion, age or disability. As outlined in the Student Handbook under the section titled Standards of Conduct in the Teacher-Learner Relationship, belittlement, intimidation and humiliation are unacceptable for effective learning and undermine self-esteem. Breaches involving student mistreatment may result in a faculty or staff member being sanctioned or the loss of faculty and/or staff appointment. These policies address student mistreatment involving College of Medicine employees, residents, affiliate staff, or patients. Mistreatment may be reported through the College of Medicine telephone hotline, 1(855)-397-9835 or through an online form at [http://medicine.tamhsc.edu/current/student-mistreatment-form.html](http://medicine.tamhsc.edu/current/student-mistreatment-form.html). For a full list of reporting avenues, please refer to the Student Handbook under the Mistreatment Policy.

**Exposure and Occupational Hazard**

The Needle Stick Policy and Bloodborne Pathogen Exposure information for Medical Students may be accessed in the Student Handbook at: [http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf](http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf)

**Note:** More information is available on the aforementioned topics to all students on the College of Medicine website.

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### Standardized Patient Evaluation Form

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<thead>
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<th>1</th>
<th>2</th>
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<tr>
<td>1. The student established rapport with me by listening attentively.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. The student showed a genuine interest in me by being concerned and respectful.</td>
<td></td>
<td></td>
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</table>

Date Created/Revised: 5/27/2015 By: K.Knighton
3. The student asked me to explain how my health issues have affected my life.

4. The student explained clearly (without medical jargon) what is going on with me medically.

5. The student explained clearly (without medical jargon) what the next steps will be.

6. The student provided information and content which were appropriate for me.

7. The student asked specific questions to confirm my understanding of the findings.

8. The student assessed my ability and/or willingness to carry out the next steps.

9. The student demonstrated an understanding of the reason for my visit and/or any concerns I had.

10. The student used statements of understanding and support to acknowledge my emotions.

Scoring Key:
0 – No, the student did not accomplish this item.
1 – Yes, the student accomplished the item.
2 – The student excelled at this item.
BAP II – Palliative Care Simulation

Student Self-Evaluation Form

❖ After reviewing my video of the recent palliative care standardized patient exercise, I believe that I did the following three things well:

1. 

2. 

3. 

❖ I believe I could improve in the following areas:

1. 

2. 

3. 

❖ The most significant thing I learned from the exercise:

1. 

2. 

3. 

4. 

Date Created/Revised: 5/27/2015 By: K.Knighton
Texas A&M University  
Departmental Request for a Change in Course  
Undergraduate • Graduate • Professional  
Submit original form and attachments  

Form Instructions  
1. Course request type:  
   - Undergraduate  
   - Graduate  
   - First Professional (DDS, MD, JD, PharmD, DVM)  
2. Request submitted by (Department or Program Name):  
   Select or Type Department/Program Name  
3. Course prefix, number and complete title of course:  
   MEID 701 - Hematology and Oncology  

Attach a brief supporting statement for changes made to items 4a thru 4d, and 10 below.  

4. Change requested  
   a. Prerequisite(s): From:  
   b. Withdrawal (reason):  
   c. Cross-list with:  
      Cross-listed courses require the signature of both department heads.  
   d. Change in course title and description. Enter complete current course title and current course description in item 9; enter proposed course title and proposed course description in item 10. Complete item 11a and b for a change in title.  
   e. Change in course number, contact hours (lab & lecture), and semester credit hours. Complete item 11a and b. Attach a course syllabus.  
5. Is this an existing core curriculum course?  
   - Yes  
   - No  
6. If grade type is changing for existing course, indicate the new grade type:  
   - Grade  
   - S/U  
   - P/F (CLMD)  
7. If this course will be stacked, indicate the course number of the stacked course:  
   - I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://www.tamu.edu/resources/export-controlbasics-for-distance-education).  
8. Complete current course title and current catalog course description:  
   Hematology and Oncology. Credit 4.  
9. Complete proposed course title and proposed catalog course description (not to exceed 50 words):  
   Hematology and Oncology. Credit 1 to 10.  
10.  
11.  
   a. As currently in course inventory:  
      | Prefix | Course # | Title (excluding punctuation) |
      |--------|----------|--------------------------------|
      | MEID   | 701      | HEMATOLOGY/ONCOLOGY            |
      | Lec.   | Lab      | Other                          |
      | 64.00  |          | 4.00                           |
      | SCH    | CIP and Fund Code | Admin. Unit | FICE Code | Level |
      | 51.1201.00 |          | 0 | 0 | 3 | 6 | 3 | 2 |
   b. Change to:  
      | Prefix | Course # | Title (excluding punctuation) |
      |--------|----------|--------------------------------|
      | MEID   | 701      | Hematology and Oncology        |
      | Lec.   | Lab      | Other                          |
      | 160.00 |          | 10.00                          |
      | SCH    | CIP and Fund Code | Admin. Unit | Acad. Year | FICE Code | Level |
      | 51.1201.00 |          | - | 0 | 0 | 3 | 6 | 3 | 2 |
   Approval recommended by:  
   - Department Head or Program Chair (Type Name & Sign)  
   - Date  
   - Chair, College Review Committee  
   - Date  
   - Dean of College  
   - Date  
   Submitted to Coordinating Board by:  
   - Chair, GC or UCC  
   - Date  
   - Effective Date  

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu  
Curricular Services - 08/14
Course title and number: MEID 701 Hematology/Oncology
Term (e.g., Fall 200X): Fall 2015
Meeting times and location: July 27, 2015 – August 24, 2015

Course Description and Prerequisites

(Prerequisites, even if none should be given and must match course form and catalog. In addition to material chosen by instructor, the course description should closely follow the catalog description for the course. In some instances, the course description may include a rationale or context for the subject matter within the discipline. Catalog course description must not be more than 50 words long, and consist of short phrases connected by semicolons; use commas to separate a series. No sentences. Reference Style Guide at [http://curriculumservices.tamu.edu](http://curriculumservices.tamu.edu) and/or catalog course descriptions for examples. THIS INFORMATION HAS BEEN PLACED HERE FOR REFERENCE ONLY. PLEASE REMOVE BEFORE PREPARING SYLLABUS.)

Successful completion of Phase I courses.

### Instructor Information

<table>
<thead>
<tr>
<th>Name</th>
<th>Block Director</th>
<th>Coordinator</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Rania Cannaday, M.D.</td>
<td>Melissa Sodolak</td>
</tr>
<tr>
<td>Telephone number</td>
<td>979-496-0578</td>
<td>979-436-0227</td>
</tr>
<tr>
<td>Email address</td>
<td><a href="mailto:cannaday@medicine.tamhsce.edu">cannaday@medicine.tamhsce.edu</a></td>
<td><a href="mailto:Sodolak@medicine.tamhsce.edu">Sodolak@medicine.tamhsce.edu</a></td>
</tr>
<tr>
<td>Office hours</td>
<td>MWF 1:30-2:30 pm</td>
<td>M-F 8-5</td>
</tr>
<tr>
<td>Office location</td>
<td>HPEB 3066</td>
<td>CB1 4th Floor Suite 4100 Office #4108</td>
</tr>
</tbody>
</table>

| Name                | John Pippen, M.D.               | Name                |
| Telephone number    | 214-370-1000                    | Telephone number    |
| Email address       | John.pippen@usoncology.com      | Email address       |
| Office hours        | By appointment                  | Office hours        |
| Office location     | 3410 Worth Suite 400 Simmons Cancer | Office location     |

Other participating Faculty:

- Bondos, Sarah Molecular and Cellular Medicine sebondos@medicine.tamhsce.edu
- Brandt, Paul Pharmacology pbrandt@medicine.tamhsce.edu
- Burch, Micah Medicine Micah.burch@usoncology.com
- Cannaday, Rania Pathology cannaday@medicine.tamhsce.edu

Date Created/Revised: _____ By: _____
Learning Outcomes & Objectives

(A learning outcome is defined as a statement of what the student will know or be able to do upon successfully completing the course. It must be both observable and measurable. The outcomes may include competencies developed in the course. Learning outcomes define what students need to do to show mastery of course materials. Additional assistance with learning outcomes is available through the Center for Teaching Excellence http://kte.tamu.edu and the Office of Institutional Assessment https://assessment.tamu.edu/) THIS INFORMATION HAS BEEN PLACED HERE FOR REFERENCE ONLY. PLEASE REMOVE BEFORE PREPARING SYLLABUS.

(To add a line to course objectives chart, put your cursor in the last column of the chart then click the blue plus sign (+) that appears at the bottom right of the table. To link more CBLO or Evaluation method to a course objective, go to the next line of the table and choose an additional CBLO and/or Evaluation method without adding a course objective to that line or repeating the objective. See below for an example. THIS INFORMATION HAS BEEN PLACED HERE FOR REFERENCE ONLY. PLEASE REMOVE BEFORE PREPARING SYLLABUS.)

COM Competency Based Learning Objectives: http://medicine.tamhsc.edu/academic-affairs/curriculum/objectives/

Principles and Guidelines for Curriculum Development:
<table>
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<th>Hematology</th>
<th>MK1</th>
<th>MK2</th>
<th>PC3</th>
<th>PC4</th>
<th>PC5</th>
<th>PC14</th>
<th>PBL13</th>
<th>PBL14</th>
<th>T/E</th>
<th>Exam</th>
<th>SDL Assignment</th>
<th>Lab</th>
</tr>
</thead>
<tbody>
<tr>
<td>List the components of blood and the laboratory values which are encountered on the complete blood count, with recognizing how to utilize them in clinical practice.</td>
<td></td>
<td></td>
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<td></td>
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<td>List the laboratory methods used to obtain CBC values and the different compounds that bind hemoglobin.</td>
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<td>Recognize the morphologic spectrum of red blood cells, white blood cells, inclusions and abnormal forms on a peripheral blood smear.</td>
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<td>List the differences between a bone marrow biopsy and a bone marrow aspirate.</td>
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<td>List the myeloid to erythroid ratio.</td>
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<td>Diagram different classification schemes for anemia.</td>
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<td>Detail the pathophysiology, underlying mechanisms, clinical manifestations, clinical syndromes, relevant genetics, laboratory findings, and treatment modalities for iron deficiency anemia, B12/Folic acid deficiency anemia, anemia of chronic disease, aplastic anemia, marrow failure/damage anemia, anemia related to renal failure, thalassemia, sickle cell anemia, hereditary spherocytosis, G-6-PD deficiency, PNH, immunohemolytic anemia, microangiopathic anemia and acute and chronic blood loss.</td>
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</table>
- List and recognize the pharmacologic principles in drugs used to treat anemia.
  MK1 MK2 T/E Exam

- List bacterial, viral, and parasitic blood borne pathogens and their mode of infection, clinical manifestations, diagnostic principles and treatment.
  MK2 PC14 T/E Exam

### Transfusion Medicine

- Describe the process of blood donation and procedures utilized to obtain a suitable blood unit and/or blood component for transfusion.
  MK1 T/E Exam

- Explain the principles and functions of blood compatibility testing
  PC6 MK1 T/E Exam

- Identify the laboratory procedures to determine a person’s blood type with emphasis on ABO and Rh blood groups.
  PC6 MK1 T/E Exam

- List the type of blood products that are currently available in Transfusion Services for patient use as therapy.
  MK1 T/E Exam

- Discuss the major indications, special precautions, hazards and potential complications of blood product transfusions.
  PC8 MK2 T/E Exam

- Describe the principles of major blood type incompatibility.
  PC8 MK2 T/E Exam

- Describe the principles of Rh incompatibility and the purpose and criteria for Rh immunoglobulin administration to a woman.
  PC6 MK2 T/E Exam

### Coagulation
- Detail the pathophysiology, underlying mechanisms, clinical manifestations, clinical syndromes, relevant genetics, laboratory findings, and treatment modalities for ITP, TTP, HUS, thrombocytopenia, DIC, Von Willebrand Disease, Hemophilia and disorders related to thrombosis.
- Detail the coagulation cascade and hemostasis.
- List and recognize the pharmacologic principles in drugs used to treat coagulation disorders.

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<th>MK1</th>
<th>MK2</th>
<th>PC3</th>
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<th>PC5</th>
<th>PC14</th>
<th>PBL13</th>
<th>PBL14</th>
<th>T/E</th>
<th>Exam</th>
<th>SDL Assignment Lab</th>
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</table>

### Oncology

- Identify the basic neoplastic pathways
- Detail the normal and abnormal histological features for blood, lymph nodes, breast, prostate and colon
- Identify elements of a surgical pathology report as it pertains to breast/prostate/colon malignancies

Hematologic Malignancies:

- Detail the pathophysiology, underlying mechanisms, relevant genetics, clinical, diagnostic and laboratory findings, and treatment modalities of stem cell clonal disorders, myeloproliferative disorders, acute leukemia, chronic leukemia, indolent and aggressive non-Hodgkin lymphoma, Hodgkin lymphoma and plasma cell dyscrasia.

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<th>Exam</th>
<th>SDL Assignment Lab</th>
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Date Created/Revised: _____  By: _____
**Breast Cancer:**
- Explain controversies related to screening. List supplemental screening methods.
- Understand the surgical options for early stage breast cancer, and the role of radiation therapy.
- Know the basic tissue types of breast cancer, and be able to list what is in the pathology breast panel.
- Explain what adjuvant treatment is, and list the different types of adjuvant treatments.
- List the basic chemotherapy drugs used in early-stage breast cancer, including side effects.
- Explain the differences between commonly used hormonal treatments for breast cancer. Know mechanisms of action and common side effects.
- List available targeted therapies for HER2 positive patients, and their side effects as well as interactions.

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<td>Exam</td>
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**Colon Cancer:**
- List acceptable screening methods.
- Know the evolution of colon cancer from polyp to actual invasion.
- List genetic polyposis syndromes, and explain their mode of inheritance and management differences.
- List the different forms of Lynch Syndrome, and the types of cancers that this predisposes to.
- Discuss which patients are appropriate for adjuvant therapy, and what testing colon cancer survivors should undergo.
- In metastatic disease, discuss the role of wild type and mutated ras, and how this may help guide therapy.

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### Prostate Cancer:
- Discuss screening of prostate cancer, and be aware of racial differences in incidence and mortality.
- Explain lead time bias and length time bias, and how this influences screening.
- List options for the treatment of early stage disease, and discuss when "watchful waiting" may be appropriate.
- Discuss which type of patient is appropriate for adjuvant therapy, and list available options.
- Discuss options for palliative treatment, including hormonal treatment, chemotherapy, and immunotherapy.

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<td>Demonstrate knowledge of normal human structure and function at the organ-system, tissue, cellular and molecular level; and of the interaction of human systems in maintaining homeostasis</td>
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- Detail the process of hematopoiesis, its embryology, structure, microenvironment, and regulatory mechanisms with recognition of all the immature and mature hematopoietic cells within the bone marrow and peripheral blood.
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- List the myeloid to erythroid ratio.

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<td>Develop appropriate differential diagnoses by integrating</td>
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<th>collected clinical information</th>
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<td>PC5: Interpret the results of commonly used laboratory and radiologic studies</td>
<td>Exam - Institutionally Developed, Written/ Computer-based</td>
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<td>Choose an item</td>
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**Textbook and/or Resource Material**

- Robbins and Cotran Pathologic basis of Disease, 9th edition (available as an eBook)
- Junqueira’s Basic Histology Text and Atlas
- Lippincott’s Biochemistry, 5th edition
- Marks’ Basic Medical Biochemistry, 3rd

**Grading Policies**

(Must: include a grading scale (COM courses must be Honors/Pass/Fail OR Pass/Fail) Ensure grading follows COM and Phase policies. Include weights as applicable to exams, laboratory assignments, field student work, projects, papers, homework, class attendance and participation, and other graded activities in the calculation of the course grade. If more than 10% of grades is based on participation, syllabus should explicitly define and outline how grade is determined. Stacked courses – syllabus must clearly indicate additional work required for graduate students. Changing grading policies should occur only under extraordinary circumstances. THIS INFORMATION HAS BEEN PLACED HERE FOR REFERENCE ONLY. PLEASE REMOVE BEFORE PREPARING SYLLABUS.)

Blood and Hematopoiesis Lab Quiz: 1%
Red Cell Physiology Lab Quiz: 1%
Anemia I Cases Quiz: 2%
Anemia II Cases Quiz: 2%
Coagulation Cases Quiz: 2%
Hematologic Malignancies Assignment: 1%
CSIE Interactive session I: 3%
CSIE Interactive session II: 3%
Exam I: 40%
Exam II (comprehensive): 45%
Total: 100%
GRADING SCALE

| Honors | Pass | Fail |

Attendance and Make-up Policies

(Include website link to student rule 7 http://student-rules.tamu.edu/rule07. Make sure this information complies with COM policies and Student Handbook. Must include attendance and make-up policy, especially if attendance/class participation will count as a grade. Policies should detail excused absences, unexcused absences, and make-up policies. Attendance and make-up policies should not contradict student rules. REMEDIATION process and policy should be included HERE. THIS INFORMATION HAS BEEN PLACED HERE FOR REFERENCE ONLY. PLEASE REMOVE BEFORE PREPARING SYLLABUS.)

Course Topics, Calendar of Activities, Major Assignment Dates

(Must include dates on which major exams will be given and assignments will be due and should not be changed without notification of all students in the course. Include a statement that all dates are subject to change. Include major topics, assignments, etc. Reference where an up to date schedule can be accessed. INCLUDE an INITIAL or REPRESENTATIVE schedule in the appendix. THIS INFORMATION HAS BEEN PLACED HERE FOR REFERENCE ONLY. PLEASE REMOVE BEFORE PREPARING SYLLABUS.)

See Schedule

<table>
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<tr>
<th>Week</th>
<th>Topic</th>
<th>Required Reading</th>
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Other Pertinent Course Information

Clerkship Courses MUST include patient encounter and Log Information here. Actual log list can be included in the appendix. Include information that is pertinent to ALL campus locations here like processes and procedures. If there are campus specifics, include those locally not in this syllabus. Indicate where course materials can be accessed for example Blackboard, One45, etc.)

Blackboard

Date Created/Revised: _____ By: _____
Americans with Disabilities Act (ADA)

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu

Any student with a disability who needs accommodation should inform the instructor at the beginning of the course.

Academic Integrity

For additional information please visit: http://aggiehonor.tamu.edu

"An Aggie does not lie, cheat, or steal, or tolerate those who do."

College of Medicine

Professionalism and integrity Statement (Academic Honesty and Plagiarism)

All College of Medicine students are required to comply with the student code of conduct and the academic integrity and honesty standards published in each component's Student Handbook. Disciplinary action will be taken in accordance with the policies of each component. Students found guilty of Academic Dishonesty will receive an "F"/Unsatisfactory in the course. For a full list of actions qualifying as academic dishonesty, please review the College of Medicine Student Handbook at http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf.

According to the Aggie Honor System Office, plagiarism is defined as the appropriation of another person's ideas, processes, results, or words without giving appropriate credit. Intentionally, knowingly, or carelessly presenting the work of another as one's own (i.e., without crediting the author or creator). Plagiarism and other academic misconduct definitions can be viewed on the Aggie Honor System Office website; http://aggiehonor.tamu.edu/RulesAndProcedures/HonorSystemRules.aspx#definitions.

E-mail Access and FERPA

The College of Medicine is communicating all official information to students through the students' TAMHSC e-mail accounts. Please check the account frequently during the semester for updates. This course is supported with web-based and/or e-mail activities. In order to take advantage of these additional resources and participate fully in the course, you have been assigned an e-mail address by the Texas A&M Health Science Center. This e-mail address is for internal use only, so that faculty may communicate with you and the entire class. By registering for this course, you are agreeing to allow your classmates to have access to this e-mail address. Should you have any questions, please contact the TAMU's Office of the Registrar at 979-845-1031.

The Family Educational Rights and Privacy Act of 1974 (FERPA), which the HSC complies fully, is intended to protect the privacy of education records, to establish the rights of students to inspect and review their education records and to provide guidelines for the correction of inaccurate or misleading data through informal and formal hearings. Students also have the right to file complaints with the Family Educational Rights and Privacy Act Office of the Department of Education in Washington, D.C., concerning alleged failures by the HSC to comply with the act.

Mistreatment of Students

The College of Medicine is committed to providing a positive learning environment in which students can meet their academic goals based on mutual respect in the teacher/learner relationship. Both parties must be sensitive to the needs of others and differences in gender, race, sexual orientation, religion, age or disability. As outlined in the Student Handbook under the section titled Standards of Conduct in the Teacher-Learner Relationship, belittlement, intimidation and humiliation are unacceptable for effective learning and undermine self-esteem. Breaches involving student mistreatment may result in a faculty or staff member being sanctioned or the loss of faculty and/or staff appointment. These policies address student mistreatment involving College of Medicine employees, residents, affiliate staff, or patients. Mistreatment may be reported through the College of Medicine telephone hotline, 1(855)-397-9835 or through

Date Created/Revised: ____  By: _____
an online form at http://medicine.tamhsc.edu/current/student-mistreatment-form.html. For a full list of reporting avenues, please refer to the Student Handbook under the Mistreatment Policy.

**Exposure and Occupational Hazard**

The Needle Stick Policy and Bloodborne Pathogen Exposure information for Medical Students may be accessed in the Student Handbook at: http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf

**Note:** More information is available on the aforementioned topics to all students on the College of Medicine website.
Texas A&M University

Departmental Request for a Change in Course
Undergraduate • Graduate • Professional
• Submit original form and attachments •

Form Instructions:
1. Course request type:  □ Undergraduate  □ Graduate  □ First Professional (DDS, MD, JD, PharmD, DVM)
2. Request submitted by (Department or Program Name): Select or Type Department/Program Name
3. Course prefix, number and complete title of course:  MEID 705 - Medical Student Grand Rounds

Attach a brief supporting statement for changes made to items 4a through 4d and 10 below.

4. Change requested
a. Prerequisite(s): From:  ___________________________  To:  ___________________________
    Withdrawal (reason):  ___________________________

c. Cross-list with:  ___________________________

   Cross-listed courses require the signature of both department heads.

d. Change in course title and description. Enter complete current course title and current course description in item 9; enter proposed course title and proposed course description in item 10. Complete item 11a and b for a change in title.

e. Change in course number, contact hours (lab & lecture), and semester credit hours. Complete item 11a and b. Attach a course syllabus.

5. Is this an existing core curriculum course?  □ Yes  □ No

6. If grade type is changing for existing course, indicate the new grade type:  □ Grade  □ S/U  □ P/F (C/MD)

7. If this course will be stacked, please indicate the course number of the stacked course:

   I verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

8. Complete current course title and current catalog course description:
SEMINAR DAY. Credit 0.5.

9. Complete proposed course title and proposed catalog course description (not to exceed 50 words):
Medical Student Grand Rounds. Credit .5 to 5.

10. Complete proposed course title and proposed catalog course description (not to exceed 50 words):
Medical Student Grand Rounds. Credit .5 to 5.

11. a. As currently in course inventory:

   Prefix  Course #  Title (excluding punctuation)  Lec.  Lab  Other  SCH  CIP and Fund Code  Admin. Unit  FICE Code  Level
   MEID  705  SEMINAR DAY  8.00  0.50  51.1201.00  0  0  3  6  3  2

b. Change to:

   Prefix  Course #  Title (excluding punctuation)  Lec.  Lab  Other  SCH  CIP and Fund Code  Admin. Unit  Acad. Year  FICE Code  Level
   MEID  705  Medical Student Grand Rounds  80.00  5.00  51.1201.00  -  0  0  3  6  3  2

Approval recommended by:

Diane Chico PhD  Date
Chair, College Review Committee

Regina Bentley PhD  Date
Dean of College

Submitted to Coordinating Board by:

Chair, GC or UCC  Date

Questions regarding this form should be directed to Sandra Williams at 845-8201 or sandra.williams@tamu.edu
Curriculum Services – 08/14

CURRICULAR SERVICES

RECEIVED JUN 25 2015
Course title and number  MEID 705 Medical Student Grand Rounds
Term (e.g., Fall 200X)  Fall 2015
Meeting times and location  July 27-December 18, 2015

Instructor Information

Course Director
Name  Steve Maxwell, Ph.D.
Telephone number  979-436-0804
Email address  smaxwell@medicine.tamhsc.edu
Office hours  By appointment
Office location  252 Reynolds Medical Bldg., College Station

Course Co-Director
Name  Robin Fuchs Young, Ph.D.
Telephone number  979-436-0778
Email address  fuchs-young@medicine.tamhsc.edu
Office hours  By appointment
Office location  208 Reynolds Medical Bldg., College Station

Coordinator
Name  Janis Chmiel
Telephone number  979-436-0856
Email address  jchmiel@tamu.edu
Office hours  By appointment
Office location  440 Reynolds Medical Bldg., College Station

Course Description and Prerequisites

http://www.tamhsc.edu/education/catalog/

In this course, students will apply, primarily, their knowledge of biochemistry and genetics. Students will receive didactic instruction in literature search skills and examine a specific medically relevant topic in depth. Students will then give a presentation about this topic to their peers and faculty in a small group setting.

Prerequisite: Completion of Phase I curriculum

Learning Outcomes & Objectives
Upon completion of the course, students will be able to:

**COM Competency Based Learning Objectives:** [http://medicine.tamhsc.edu/academic-affairs/curriculum/objectives/](http://medicine.tamhsc.edu/academic-affairs/curriculum/objectives/)


<table>
<thead>
<tr>
<th>Course Objective:</th>
<th>COM Competency Based Learning Objectives (CBLO):</th>
<th>Taught (T) and/or Evaluated (E):</th>
<th>Evaluation:</th>
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<tr>
<td>Students will conduct independent research on a current and relevant disease topic, focusing on the primary scientific literature. They will prepare and present their findings to a small group of their peers, and answer questions. In researching their topic, students will apply their knowledge of anatomy, biochemistry, genetics, immunology, microbiology, pharmacology, and physiology to examine a relevant biomedical research topic in depth. Students will be evaluated based on content, critical analysis, presentation and delivery, written summary, peer review, and class participation.</td>
<td>MK4: Apply evidenced-based methods to clinical problem solving</td>
<td>Taught AND Evaluated</td>
<td>Research or Project Assessment</td>
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<tr>
<td>The student will read the literature and develop a fundamental understanding of the current research in the area, which will be effectively communicated to their peers. The students will develop a 20 minute PowerPoint presentation, following accepted formats. The presentation must clearly describe recent research findings, including state of the art developments and current experimental approaches used to determine the underlying mechanistic basis of the disease, leading to new strategies for prevention, diagnosis, prognosis and/or treatment.</td>
<td>MK1: Demonstrate knowledge of normal human structure and function at the organ-system, tissue, cellular and molecular level; and of the interaction of human systems in maintaining homeostasis</td>
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<td>Research or Project Assessment</td>
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<td>The student will read the literature and develop a fundamental understanding of the current research in the area, which will be effectively communicated to their peers.</td>
<td>ICS1: Demonstrate effective listening skills</td>
<td>Taught AND Evaluated</td>
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The students will develop a 20 minute PowerPoint presentation, following accepted formats. The presentation must clearly describe recent research findings, including state of the art developments and current experimental approaches used to determine the underlying mechanistic basis of the disease, leading to new strategies for prevention, diagnosis, prognosis and/or treatment.

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| The students will develop a 20 minute PowerPoint presentation, following accepted formats. The presentation must clearly describe recent research findings, including state of the art developments and current experimental approaches used to determine the underlying mechanistic basis of the disease, leading to new strategies for prevention, diagnosis, prognosis and/or treatment. | PROF12: Project a professional image in demeanor and personal appearance | Taught AND Evaluated | Research or Project Assessment |
| The student will read the literature and develop a fundamental understanding of the current research in the area, which will be effectively communicated to their peers. The students will develop a 20 minute PowerPoint presentation, following accepted formats. The presentation must clearly describe recent research findings, including state of the art developments and current experimental approaches used to determine the underlying mechanistic basis of the disease, leading to new strategies for prevention, diagnosis, prognosis and/or treatment. | PBL13: Accomplish learning and improvement goals with appropriate self-directed activities | Taught AND Evaluated | Research or Project Assessment |
| The student will read the literature and develop a fundamental understanding of the current research in the area, which will be effectively communicated to their peers. The students will develop a 20 minute PowerPoint presentation, following accepted formats. The presentation must clearly describe recent research findings, including state of the art developments and current experimental approaches used to determine the underlying mechanistic basis of the disease, leading to new strategies for prevention, diagnosis, prognosis and/or treatment. | PBL14: Utilize information resources and available data to support life-long learning | Taught AND Evaluated | Research or Project Assessment |
| The student will read the literature and develop a fundamental understanding of the current research in the area, which will be effectively communicated to their peers. The students will develop a 20 minute PowerPoint presentation, following accepted formats. The presentation must clearly describe recent research findings, including state of the art developments and current experimental approaches used to determine the underlying mechanistic basis of the disease, leading to new strategies for prevention, diagnosis, prognosis and/or treatment. | PBL16: Demonstrate an understanding of the basic principles and importance of scholarly activity and Translational Research in the practice of medicine | Taught AND Evaluated | Research or Project Assessment |
the underlying mechanistic basis of the disease, leading to new strategies for prevention, diagnosis, prognosis and/or treatment.

Purpose and Goals: The intention is to encourage students to access, critically assess, and understand the research literature relevant to a disease/disorder of interest, and then tie emerging science to clinical medicine. While reviews, clinical studies and epidemiologic reports are useful, they cannot alone form the basis for the presentation. Students should access, read, interpret the primary literature, and communicate it effectively to their peers. Recent (within the last 5 years), high quality, research publications must be included.

Textbook and/or Resource Material

Textbooks (Required and Recommended Resources)

The following books and case study materials will be used in this course.

Title: N/A
Author: N/A
Edition/Copyright: N/A
Publisher: N/A
ISBN: N/A

Gathering Information:

Information for presentations should come from authoritative resources, particularly recently published journals, and be cited. You are expected to use PubMed MEDLINE to obtain your journal references. MEDLINE is the premier source for biomedical literature and an information resource you will use throughout your professional career. PubMed is the National Library of Medicine’s free search interface for the citations in Medline. Anyone can get to PubMed via
http://pubmed.gov, but to get links to full text articles already paid for by the library follow the instructions below:

**Getting Full Text Articles through the Medical Sciences Library**

1. Go to [http://guides.library.tamu.edu/Medicine](http://guides.library.tamu.edu/Medicine) and click on PubMed MEDLINE under “Databases for Finding Articles”

2. You will be asked to login. Choose “TAMHSC username” to login with the same username and password as your HSC email, and then click the “Select” button (see below).

3. Do your search in PubMed, click on an article title, and then on the button to get to the free full-text through the library.

4. A screen will open showing if the library has an online copy of the article. Click on the link under “Online copy available from” to get to the PDF:
If the library does not have it, you will see:

Click on “Get it for me” to have the library get a copy for you. You will receive an email notification when the PDF is in your Get it for me account.

**Citing Your Sources**

*If you use ideas or concepts that are not your own, you must cite your source or it is considered as plagiarism.* **Make sure that you cite all sources you use, including images, websites, e-books, and articles in both the PowerPoint presentation and written handout.** You will use the American Medical Association (AMA) citation style for all your sources, both in your PowerPoint and on your handout. A summary showing how to cite using AMA style is available at: [http://library.tamu.edu/help/help-yourself/citing-sources/files/Using-the-AMA-Style.pdf](http://library.tamu.edu/help/help-yourself/citing-sources/files/Using-the-AMA-Style.pdf). You can view the electronic AMA Manual of Style for additional examples. Some journals and databases will create a citation of the source for you that you can copy and paste; either choose AMA style or you may need to make edits to the citation based on AMA style.

**PowerPoint slides:** On *every* slide for which you use a source, write *Source:* or *Sources:* somewhere on the slide (does not have to be at the bottom of slide), then list the citation(s) in AMA style. Example:
Handout: Insert references numbered within the text and list references at the end.

Type 2 Diabetes

Current Treatments:

- Metformin
- Aminoflavin B

References


Help with Searches and Citing Sources

Medical librarians from MSL and the Scott & White Medical Library in Temple are available to assist you one-on-one with your search and citing your sources. Let them know if you have questions, suggestions, or comments. The library contacts are:

<table>
<thead>
<tr>
<th>Librarian’s Name</th>
<th>Email</th>
<th>Phone</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>Becky McKay</td>
<td><a href="mailto:rlmckay@library.tamu.edu">rlmckay@library.tamu.edu</a></td>
<td>979-436-0279</td>
<td>1037 HPEB</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Bryan Campus</td>
</tr>
<tr>
<td>Cathy Pepper</td>
<td><a href="mailto:cpepper@library.tamu.edu">cpepper@library.tamu.edu</a></td>
<td>817-395-2446</td>
<td>S316A</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Round Rock Campus</td>
</tr>
</tbody>
</table>
### Medical Library Staff

<table>
<thead>
<tr>
<th>Name</th>
<th>Email</th>
<th>Phone</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>Jeff Swindoll</td>
<td><a href="mailto:jswindoll@sw.org">jswindoll@sw.org</a></td>
<td>254-724-2374</td>
<td>S&amp;W, Richard D. Haines Medical Library, Temple</td>
</tr>
<tr>
<td>Julie Bolin</td>
<td><a href="mailto:jbolin@sw.org">jbolin@sw.org</a></td>
<td>254-724-2255</td>
<td>S&amp;W, Richard D. Haines Medical Library, Temple</td>
</tr>
<tr>
<td>June Lubowinski</td>
<td><a href="mailto:jalubowinski@sw.org">jalubowinski@sw.org</a></td>
<td>254-724-6271</td>
<td>S&amp;W, Richard D. Haines Medical Library, Temple</td>
</tr>
<tr>
<td>Lauren Wojcik</td>
<td><a href="mailto:lwojcik@sw.org">lwojcik@sw.org</a></td>
<td>254-935-4116</td>
<td>S&amp;W, McLane Children’s Hospital, 1901 SW H.K. Dodgen Loop, Temple</td>
</tr>
<tr>
<td>Margaret Foster</td>
<td><a href="mailto:margaretfoster@library.tamu.edu">margaretfoster@library.tamu.edu</a></td>
<td>979-862-1893</td>
<td>171 Medical Sciences Library, College Station</td>
</tr>
<tr>
<td>Suzanne Shurtz</td>
<td><a href="mailto:sshurtz@library.tamu.edu">sshurtz@library.tamu.edu</a></td>
<td>979-845-7439</td>
<td>174E Medical Sciences Library, College Station</td>
</tr>
<tr>
<td>S&amp;W Library</td>
<td><a href="mailto:medicallibrary@sw.org">medicallibrary@sw.org</a></td>
<td>254-724-2228</td>
<td>S&amp;W, Richard D. Haines Medical Library, Temple</td>
</tr>
</tbody>
</table>

**NOTE:** Don't leave searching the literature until the last minute. It only causes stress. Search for articles as soon as you know your topic and you will get a sense if there will be a lot or very few. A goal of this assignment is to give you positive experience in locating current, quality information from the peer-reviewed medical literature. If you spend more than 30 minutes trying to find relevant articles, stop and get assistance.
Grading Policies

The final course grade will be based on the following:

<table>
<thead>
<tr>
<th>Milestone</th>
<th>Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>Milestone I: PubMed library search exercise (Wednesday, August 12 by 5 pm)</td>
<td>2</td>
</tr>
<tr>
<td>Milestone II: Choosing a topic (Wednesday, August 26 by 5 pm)</td>
<td>5</td>
</tr>
<tr>
<td>Milestone III: Pre-presentation Outline Part A (Wednesday, September 16 by 5 pm)</td>
<td>10</td>
</tr>
<tr>
<td>Milestone IV: Pre-presentation Outline Part B with annotated bibliography (Wednesday, October 21 by 5 pm)</td>
<td>10</td>
</tr>
<tr>
<td>Milestone V: Presentation</td>
<td>69</td>
</tr>
<tr>
<td>• Written Research Summary submit by 5 pm Tuesday, December 1</td>
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</tr>
<tr>
<td>• PowerPoint submit by 5 pm Tuesday, December 1</td>
<td></td>
</tr>
<tr>
<td>• Oral Presentation – Friday, December 11</td>
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Presentation Grading rubric (69 points total):

1. Written (summary) handout (15 points)
   a. Content (quality, completeness, logical organization) – 4.5
   b. Critical analysis of the topic – 4.5
   c. Quality, relevance and proper use of references -4.5
   d. Format – appearance, spelling, correct grammar – 1.5

2. Grand Rounds Oral Presentation (50 points)
   a. Content (quality, logical organization and flow, connection between current research and clinical practice) – 12.5
   b. Critical understanding and analysis of the topic – 12.5
   c. Appearance of slides – clarify, readability and effectiveness - 12.5
d. Overall quality of the presentation (correct time, familiarity with the material, able to effectively and accurately answer questions, clearly practiced) – 12.5

3. Class participation (4 points)

<table>
<thead>
<tr>
<th>Peer Review/Self Evaluation (Monday, December 14 by 5 pm)</th>
<th>4</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>100 pts</td>
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</table>

**GRADING SCALE**

<table>
<thead>
<tr>
<th>Grade</th>
<th>Description</th>
</tr>
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<tbody>
<tr>
<td>Honors</td>
<td>Top 15%</td>
</tr>
<tr>
<td>Pass</td>
<td>70-100</td>
</tr>
<tr>
<td>Fail</td>
<td>69 and below</td>
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</table>

**Grading:**

Please note: MEID 705 Medical Student Grand Rounds is worth **1.5 credit hours**. This grade is part of your GPA. It **WILL BE** a Honors/Pass/Fail course. **All Milestones are mandatory. If you do not complete assigned Milestones I-V you WILL NOT PASS the course.** A minimum grade of 70 is needed to pass the course. Anything below that score will require you to retake the course. All components will be judged on critical thinking and analysis, independent thought, organization and effective written and/or oral communication.

Peer reviews (see Appendix) will consist of student evaluations of the presentations. The peer reviews and self-evaluations will be available online. Students will be emailed a link to the forms at their medicine account. **Details on how to submit evaluations will be posted on Medical Student Grand Rounds website in Blackboard.**

Obtain a significant depth of coverage for the background materials, and devote as much time as possible to current advances in the subject area. For broad topics, identify a facet that will be the main topic of the
presentation and prioritize the material. Prioritize the background discussion to include issues that are particularly relevant to the main part of the talk, which will focus on new discoveries in the field, new models, and new insights. Clarity and organization are the keys to a good oral presentation and handout.

The grading will reflect how well these objectives have been met. Point deductions for students arriving late to either morning or afternoon sessions of Medical Student Grand Rounds will depend on length of delay.

**Students failing to attend the conference without prior approval risk a 50-point deduction on their final grade, essentially failing the course.** Students also risk point deductions for late submission of topics, late submission of pre-presentation outline, and for late submission of handouts/PowerPoint Presentations. The online peer review and self-assessment forms must be completed and submitted **by 5 pm Monday, December 14.** If not submitted by the deadline points will be deducted. A summary of the penalties is listed below.

*No makeups allowed for unexcused absences or incomplete milestone assignments. If a student fails to complete any of the Milestones I through V this will result in failure of the course. If a student fails the course a remediation plan will be prepared for the student to retake the course the following year.*
Penalties

Possible point deductions include:

Unexcused absence at mandatory lectures (July 30) 2 points

Late submission of topic (5 pm Wednesday, August 26) 2 points

Changing topic after 5 pm Wednesday, September 16 deadline 2 points

Late submission of pre-presentation outline Part A (5 pm Wednesday, September 16) 2 points

Late submission of pre-presentation outline with annotated bibliography Part B (5 pm Wednesday, October 21) 2 points

Failure to view mandatory online module and complete the assessment quiz with a 90% will result in an incomplete and penalty (8 am Thursday, October 29) 2 points

Late submission of presentation handout (5 pm Tuesday, December 1) 5 points

Late submission of presentation ppt file (5 pm Tuesday, December 1) 5 points

Arriving late at Medical Student Grand Rounds presentations (December 11) 2 to 10 points

Unexcused absence at Medical Student Grand Rounds on December 11 50 points

Late submission of peer review form (5 pm Monday, December 14) 1 point

Late submission of self-evaluation form (5 pm Monday, December 14) 1 point

ALL MILESTONES ARE MANDATORY AND MUST BE COMPLETED TO RECEIVE A PASSING GRADE IN THE COURSE.
Attendance and Make-up Policies

Please refer to COM student rule #7 (link below) for procedures regarding requesting sick leave and unexcused/excused absence policies:

http://student-rules.tamu.edu/rule07.

*All students are required to attend each session, arrive on time and participate in discussions.*

**Mandatory attendance is required at:**

- **the course orientation and lecture on “How to Find Scientific Information” on Thursday, July 30 from 8:00-9:00 am**
- **both the morning and afternoon sessions of the Medical Student Grand Rounds on Friday, December 11**

**Completion of mandatory online module (available Thursday, October 22):**

- “How to Give an Effective Presentation” assessment quiz due by Thursday, October 29 at 8 am.

In the case of illness or other emergencies that may affect your participation in Medical Student Grand Rounds, notify the Curriculum leaders by completing the excused absence form online as described in the Student Manual. **Attendance is mandatory at these lectures.** Unexcused absences will result in a penalty on the final grade.

Course Topics, Calendar of Activities, Major Assignment Dates

a. **Overview**

Preparing and presenting in the **Medical Student Grand Rounds: Advanced Topics in Medical Research** (formerly called Seminar Day) conference provides a foundation for the development of skills needed for clinical case and grand rounds presentations required during medical school and post-graduate training. This experience also builds proficiency and establishes processes for the regular review of the scientific literature throughout the medical
career.

Each student will choose and present an independently researched topic to a small group of their peers. For these presentations, the class will be divided into approximately 12 small groups in Bryan and 8 small groups in Temple. These groups will meet on Friday, December 11 (rooms to be determined) with each session consisting of four to six 20 minute (plus 10 minutes for questions) presentations per morning/afternoon meeting.

**Attendance is MANDATORY at both morning and afternoon sessions.**

Professional dress is required. Presenting students will submit written summaries (see below for instructions) with properly annotated references and their PowerPoint presentation to the faculty advisor and students in their group.

The overall score for the course will be determined on a 100 point scale, apportioned as follows: a PubMed Search exercise (2%), topic selection (5%), on time submission of the pre-presentation outlines (Part A - 10 %, Part B – 10 %), oral and written presentations and class participation (69%), and assessments/evaluations (4%).

In researching the topic, students will apply their knowledge of basic sciences (anatomy, biochemistry, genetics, immunology, microbiology, pharmacology, or physiology) to examine a medically relevant topic in depth and then transmit this knowledge in an oral presentation and written summary.

**b. Course Objectives**

The **first objective** of the oral presentation is to provide a basic foundation of background information on the topic. This should include the etiology, diagnosis, and treatment of the disease, with an emphasis on the underlying problems and mechanistic causes.

The **second objective** is to summarize current research, including state of the art investigations aimed at elucidating the underlying mechanistic basis of the disease and new approaches to prevention, diagnosis, prognosis and/or treatment. Please take special note that this second objective requires students to access the primary literature rather than textbooks,
websites, and review articles. Students will be expected to develop an in-depth understanding of specific aspects of the disease, avoiding a superficial coverage of the topic. For example, a presentation on hypertension may focus in on a discussion of a specific transgenic animal model, specific areas of basic science research or novel and innovative clinical patient trials. Some topics are very broad. Students should not attempt to provide a comprehensive summary of the entire field. Instead, a brief general overview should be developed, but the bulk of the presentation should focus on a particular aspect of the topic in much greater detail. The presentation should include important new information on ongoing research, not just a superficial synopsis.

**c. Medical Student Grand Rounds Orientation (July 30)**

On **Thursday July 30 (8:00 am)** the course coordinators, Drs. Maxwell and Fuchs-Young will explain in more detail the expectations for the Medical Student Grand Rounds, and answer any questions about topic choice and development. Ms. Suzanne Shurtz will then give a presentation on “How to Find Scientific Information” using MEDLINE/PubMed to research your topic.
d. Medical Student Grand Rounds Milestones

Students will complete a series of milestones to prepare for their research presentations (see below and section C). The first milestone (completion due by 5 pm Wednesday August 12)
will require students to complete a literature database search exercise. The **second milestone** (completion by 5 pm Wednesday August 26) requires the students to choose a topic for their research presentations. The **third milestone** (completion due Wednesday, September 16 at 5 pm) involves preparation of a pre-presentation outline that will include a brief overview/background of the disease topic and will identify the specific areas that will be addressed in more detail in the next outline and in the final presentation (see Appendix B for example and Appendix C for the faculty grading rubric). The **fourth milestone** (completion due by 5 pm Wednesday October 21) will be preparation of more in-depth outline, focusing on the underlying mechanistic basis/etiology of the disease, and state-of-the-art research leading to new diagnostic, prognostic, prevention and/or treatment strategies. This outline must include a minimum of 5 annotated, primary literature references and a summary of the hypotheses, methods, conclusions, and significance of each (see Appendix D for example and Appendix E for the faculty grading rubric). The **fifth milestone** includes written and oral presentations. Both the written summary handout and PowerPoint presentation files are due by 5 pm Tuesday December 1. The oral presentation will be on Friday, December 11.

Examples of written handouts are posted on Blackboard. **PLEASE NOTE: ALL MILESTONES ARE MANDATORY AND MUST BE COMPLETED TO RECEIVE A PASSING GRADE IN THE COURSE. PENALTIES WILL BE GIVEN FOR LATE SUBMISSIONS AND COMPLETION OF MILESTONES. FAILURE TO COMPLETE ANY MILESTONE WILL RESULT IN FAILING THE COURSE.**

e. **Detailed Description of Milestones**

**MILESTONE I: PubMed/Literature Search Exercise – due August 12 (2% of the final grade).**

- **Students to complete a literature database search exercise by 5 pm Wednesday, August 12 (2 points).**

At the Orientation on July 30, a medical librarian will provide instruction on how to effectively
search PubMed for good quality references and cite your sources. Afterwards, a self-guided exercise, “Effective PubMed Searching” will be available in the course Blackboard site within Assignments. **Complete and submit this exercise within Blackboard by 5 pm on August 12.** Librarians will review these assignments by 5 pm Tuesday August 25 to provide feedback and suggestions on your search. A penalty will be assessed for late submissions.

**MILESTONE II: Choosing a Topic - due by 5 pm Wednesday August 26 (5% of the final grade).**

- Students choose an approved topic and email a formal commitment to Janis Chmiel at jchmiel@tamu.edu by 5 pm Wednesday August 26 (5 points). If not submitted by the deadline, 2 points will be deducted.

An extensive list of acceptable medical disease topics have been compiled for students to choose from. Some of these are may be quite broad, i.e., “breast cancer,” so the final presentation must focus on a narrowed aspect of this disease (i.e., BRCA1 or 2 mutations in breast cancer). A section in the Blackboard learning site (https://tamhsc.blackboard.com) will have the disease topics posted. If none of the listed topics is of interest, identify one or more topics with a strong basic science foundation, and submit to the course directors for approval of the topic (email: Dr. Steve Maxwell (smaxwell@medicine.tamhsc.edu) and Dr. Robin Fuchs-Young (fuchs-young@medicine.tamhsc.edu).

**The deadline for making a formal commitment to a topic is 5 p.m., Wednesday, August 26.** The text in the body of the email should include your name, campus location, and choice of topic. Late submissions will not be accepted without a valid excuse. A 2 point penalty will be charged for failure to complete this component by the deadline. Changes in selection of topics will be allowed only until pre-presentation Part A outline submission on Wednesday, September 16 by 5 pm, but a 2 point penalty will be assessed.

**MILESTONE III: Pre-Presentation Outline Part A - due by 5 pm Wednesday, September 16 (10% of the final grade).**

- **Complete and submit the Pre-presentation outline Part A by 5 pm Wednesday, September 16 (10 points).** If not submitted by the deadline, 2 points will be
The Part A outline should include a brief overview of the background information for the selected disease topic and a summary of the current knowledge about the systemic, cellular and molecular basis of the disease. An example of a Pre-Presentation Outline Part A is located in the Appendix. The summary should include the current knowledge of etiology, diagnosis, and treatment of the disease, with an emphasis on anatomy, biochemistry, genetics, immunology, microbiology, pharmacology and/or physiology. This outline should identify the aspect of the research that will be focused on in more detail in the next outline and in the presentation. Note that this outline is NOT intended to be a broad or general in its scope.

This outline should be **one page in length plus one additional page for references (minimum of 5 references from good quality and/or high impact publications)**.

While reviews are allowed, at least one primary research paper must be included in the references. Using Medscape, Wikipedia or other very broad and general references is discouraged. Part A should utilize an outline format with: single-spacing, 1 inch margins and Arial 12 point font. Refer to the Pre-presentation “Outline Grading” rubric in the Appendix for more information.

Details on how to submit your outline will be posted on the Medical Student Grand Rounds website in Blackboard in the Assignment section. If problems are encountered with submission then an email with the outline file can be sent to Janis Chmiel (jchmiel@tamu.edu) before the deadline. Late submissions will not be accepted without a valid excuse and a 2 point penalty will be assessed for late outline part A. Each student will be assigned to a faculty member who will provide mentorship feedback and grade the pre-presentation outlines. Students are welcomed to communicate with the faculty mentors through Blackboard or by email.

**MILESTONE IV: Pre-Presentation Outline Part B with Annotated**
References- Due by 5 pm Wednesday, October 21 (10% of final grade).

- Complete and submit Pre-Presentation Outline Part B with AMA Style Annotated bibliography by 5 pm Wednesday, October 21 (10 points). If not submitted by the deadline, 2 points will be deducted.

In Pre-Presentation Outline Part B the student will go into greater depth on the specific issues/questions that will be discussed in the presentation. This exercise requires more detail and focus than the Pre-presentation Outline Part A. Students should describe current laboratory, animal, or clinical research studies pertinent to their topic. Part B must also include one or more aspects of molecular pathogenesis of the disease. The outline should also demonstrate how basic science knowledge is translated into new approaches to prevention, prognosis, diagnosis, and/or treatment of patients. The title of the presentation should reflect the focus of the presentation. For instance, the title “Breast Cancer” is too broad. An example of a better title is one that reflects the focused area of presentation, “Mechanisms of BRCA-1 Mutations in Breast Cancer Development (or Progression)”.

A minimum of 5 new references from good quality primary research articles should be included (different from those selected in the Pre-presentation Outline Part A). Do not include the references that were listed in the Part A pre-presentation outline. The five most authoritative, relevant additional references should be annotated as described below. These new references should be no older than 5 years and must focus on current, emerging basic science and research that is translatable to patient care and treatment. Under certain conditions where a discovery is very new, there may be less than 5 references, and this should be noted (justified) in the text. The pre-presentation outline Part B should be five pages in length for content plus additional pages (no limit) for the annotated references. An outline format, single-spaced, with 1 inch margins and 12 point Arial font should be used. Late submissions will not be accepted without a valid excuse and a 2 point penalty will be assessed for late outline part B. Refer to the grading rubric in the Appendix for more information.
Annotated References Guidelines: The Annotated References should follow the American Medical Association (AMA) citation style for all your sources. **Under each reference, provide a few sentences detailing the purpose of the work, the hypothesis, experimental strategy, and significance of the work.** An example of annotated references is given in the Appendix. Details on how to submit your annotated references will be posted on the Medical Student Grand Rounds website in Blackboard in the Assignment section. If problems are encountered with submission then an email with the file can be sent to Janis Chmiel (jchmiel@tamu.edu) by the deadline by 5 pm on Wednesday, October 21.

MILESTONE V: Written Handouts/Research Presentations – due 5 pm Tuesday, December 1 (69% of the final grade).

- This final milestone includes the preparation of a written summary, the PowerPoint slides, and the oral presentation as described in the points below.
- Prepare and distribute a written summary (5 pages maximum plus reference page) of the presentation to members of your group and faculty mentor. A minimum of 5 primary references are required (15 points of final grade). A PDF version must be emailed to Janis Chmiel at jchmiel@tamu.edu by **5 pm Tuesday, December 1.** If not submitted by the deadline, 5 points will be deducted.
- Prepare and submit the PowerPoint file (15 points of final grade) of the oral presentation slides by email to Janis Chmiel at jchmiel@tamu.edu and Faculty Mentors by **5 pm Tuesday, December 1.** If not submitted by the deadline, 5 points will be deducted.
- Grand Rounds oral presentations are on Friday December 11. Oral presentation should be 20 minutes in length and should utilize the prepared PowerPoint slides.
- All students are expected to participate in the discussion on Medical Student Grand Rounds December 11, and attendance is mandatory for both morning and afternoon sessions. Professional dress is required. Penalty for unexcused or late arrivals or early departure.
- Student Peer Reviews and Self-Evaluation forms should be completed by students 72 hrs after Grand Rounds. (Due by 5 pm December 14). A 1 point penalty will be assessed for late submission of the Peer Review and a 1 point penalty will be assessed for late submission of the Self-Evaluation.

a. Mandatory Online Lecture

On Thursday **October 22 at 8 am** the online module on “How to Give an Effective Scientific Presentation” presented by Dr. Barbara Gastel will be open for access. The purpose is to help you prepare your PowerPoint presentation. Completion of this mandatory online module and
assessment quiz is by 8 am Thursday, October 29. Students must score no less than 90% on the assessment quiz to get credit for completing the module. Failure to score at least 90% or for not completing the quiz will result in a 2 point penalty off final course grade.

b. **Scope of Research Topics**

Some topics may be very broad. Do not attempt to provide a comprehensive summary of the entire field. Instead, give a brief general overview, and then focus the main part of your talk on a specific area on mechanistic basic science that will be covered in much greater detail. Be sure that your presentation has important new information and is not just a superficial synopsis.

c. **Written Summary Guidelines**

Each student should prepare a written summary of the key points of their presentation. A PDF version of the handout must be emailed to Janis Chmiel at jchmiel@tamu.edu by 5 pm December 1. **Students in your group can be given either an electronic or hard copy of your handout.**

Details on submission will be posted on Medical Student Grand Rounds website in Blackboard. The title format for each PDF should be: disease.presenter.pdf (i.e. schizophrenia.maxwell.pdf). This summary should contain no more than 5 pages of content not including references. List the key references at the end of the paper in the AMA style. - **Be sure to reference citations in the text.**

The written summary should not consist of only the slides in your PowerPoint presentation. It should be written in a narrative format with correct grammar and spelling. Figures should be cited with the publication source. This written summary can serve as a useful study guide in preparing for the USMLE step 1 examination. Some examples of good handouts will be posted on the Blackboard website.

The teaching faculty will select the top three presentations from each group for publication on the Genetic Disease Information Resources (GDIR) website, which is useful for board
preparation of the M3/M4 students. This website is only accessible to 3rd and 4th year medical students and COM faculty.

d. Research Presentation Format

Each student must submit to Janis Chmiel a copy of your PowerPoint presentation by 5 pm Tuesday, December 1. Please send to jchmiel@tamu.edu

In the introduction of the presentation, provide a brief overview of the basic foundation for the subject including important aspects of the basic sciences. Clinical aspects of the disease, such as incidence, determinants of susceptibility, diagnosis, prognosis and treatment should also be covered. **The majority of your presentation should cover recent advances in understanding of molecular and cellular mechanisms, etiology, and pathophysiology of the disease.** The presentation should translate the basic science information to clinical medicine, either current or anticipated. It is essential that the information be summarized on the handout and presented clearly, so that the class gains a better understanding of the critical aspects, studies, and results.

Some proposed areas are very broad. **Do not attempt to provide a comprehensive summary of the entire field. Instead, give a brief general overview (description, incidence, prevalence, susceptibility, diagnosis, prognosis, current treatment regimen) and then focus the main part of your talk on a specific area that will be covered in much greater detail. Be sure that your presentation has important new mechanistic scientific information, such as cutting edge basic and/or translational research, and is not just a superficial synopsis.** If video clips from YouTube or other sources are included, do not include more than one or two minutes of them in the presentation.

e. Grand Rounds Presentations
During the morning and afternoon conference sessions, four to six students will make oral presentations on their assigned topic. **Attendance is MANDATORY at both morning and afternoon sessions.**

f. **Technical details:**

Projectors will be available in each conference group room. Students should bring their computers as backup in case the room computer fails. **The presentation should be brought to the Medical Student Grand Rounds on a flash drive.** On time attendance at all conferences is **mandatory.** Students arriving late to a session or failing to attend without prior approval risk a **50 point** deduction on their final grade, essentially failing the course.
MEDICAL STUDENT GRAND ROUNDS: ADVANCED TOPICS IN MEDICAL RESEARCH MILESTONES

July 30: Orientation (Maxwell)/How to Find Scientific Information (Shurtz). Mandatory attendance. Penalties assessed.

August 12: MILESTONE I: PubMed/literature search exercise due by 5 pm (2% of final grade - late submissions not accepted without valid excuse. Penalties assessed.)

August 25: PubMed literature search feedback to students by 5 pm

August 26: MILESTONE II: Deadline for choosing a topic due by 5 pm (5% of final grade - late submissions not accepted without valid excuse. Penalties assessed.)

September 16: MILESTONE III: Pre-presentation outline Part A deadline is 5 pm (10% of final grade – late submissions not accepted without valid excuse. Penalties assessed.) Topics cannot be changed after this date.

September 30: Outline Part A feedback to students.

October 21: MILESTONE IV: Annotated references Part B due by 5 pm (10% of final grade – late submissions not accepted without valid excuse. Penalties assessed.)

October 22: How to Prepare a Scientific Presentation Available at 8 am (Gastel). MANDATORY ONLINE MODULE.

October 29: How to Prepare a Scientific Presentation (Gastel) Mandatory ONLINE Quiz Due by 8 am. Penalties assessed if score less than 90% or late submission.

November 4: Outline Part B feedback to students.

MILESTONE V:

December 1: Written Handouts due (15% of final grade – late submissions not accepted without valid excuse. Penalties assessed)

December 1: Research Presentations/PowerPoint/Oral Delivery/Critical Analysis/ Content/Participation (54% of final grade – late PowerPoint submissions not accepted without valid excuse. Penalties assessed.)

December 14: Peer Reviews/Self Evaluation Due at 5 pm (4% of final grade – late submissions not accepted without valid excuse. Penalties assessed.)
Other Pertinent Course Information

Course materials are available online 24/7 on Blackboard.

Americans with Disabilities Act (ADA)

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit http://disability.tamu.edu

Any student with a disability who needs accommodation should inform the instructor at the beginning of the course.

Academic Integrity

For additional information please visit: http://aggiehonor.tamu.edu
"An Aggie does not lie, cheat, or steal, or tolerate those who do."

College of Medicine Professionalism and integrity Statement (Academic Honesty and Plagiarism)

All College of Medicine students are required to comply with the student code of conduct and the academic integrity and honesty standards published in each component’s Student Handbook. Disciplinary action will be taken in accordance with the policies of each component. Students found guilty of Academic Dishonesty will receive an "F"/Unsatisfactory in the course. For a full list of actions qualifying as academic dishonesty, please review the College of Medicine Student Handbook at http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf.

According to the Aggie Honor System Office, plagiarism is defined as the appropriation of another person's ideas, processes, results, or words without giving appropriate credit. Intentionally, knowingly, or carelessly presenting the work of another as one’s own (i.e., without crediting the author or creator). Plagiarism and other academic misconduct definitions can be viewed on the Aggie Honor System Office website; http://aggiehonor.tamu.edu/RulesAndProcedures/HonorSystemRules.aspx#definitions.

E-mail Access and FERPA

The College of Medicine is communicating all official information to students through the students’ TAMHSC e-mail accounts. Please check the account frequently during the semester for updates. This course is supported with web-based and/or e-mail activities. In order to take advantage of these additional resources and participate fully in the course, you have been assigned an e-mail address by the Texas A&M Health Science Center. This e-mail address is for internal use only, so that faculty may communicate with you and the entire class. By registering for this course, you are agreeing to allow your
classmates to have access to this e-mail address. Should you have any questions, please contact the TAMU’s Office of the Registrar at 979-845-1031.

The Family Educational Rights and Privacy Act of 1974 (FERPA), which the HSC complies fully, is intended to protect the privacy of education records, to establish the rights of students to inspect and review their education records and to provide guidelines for the correction of inaccurate or misleading data through informal and formal hearings. Students also have the right to file complaints with the Family Educational Rights and Privacy Act Office of the Department of Education in Washington, D.C., concerning alleged failures by the HSC to comply with the act.

**Mistreatment of Students**

The College of Medicine is committed to providing a positive learning environment in which students can meet their academic goals based on mutual respect in the teacher/learner relationship. Both parties must be sensitive to the needs of others and differences in gender, race, sexual orientation, religion, age or disability. As outlined in the Student Handbook under the section titled Standards of Conduct in the Teacher-Learner Relationship, belittlement, intimidation and humiliation are unacceptable for effective learning and undermine self-esteem. Breaches involving student mistreatment may result in a faculty or staff member being sanctioned or the loss of faculty and/or staff appointment. These policies address student mistreatment involving College of Medicine employees, residents, affiliate staff, or patients. Mistreatment may be reported through the College of Medicine telephone hotline, 1(855)-397-9835 or through an online form at [http://medicine.tamhsc.edu/current/student-mistreatment-form.html](http://medicine.tamhsc.edu/current/student-mistreatment-form.html). For a full list of reporting avenues, please refer to the Student Handbook under the Mistreatment Policy.

**Exposure and Occupational Hazard**

The Needle Stick Policy and Bloodborne Pathogen Exposure information for Medical Students may be accessed in the Student Handbook at: [http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf](http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf)

**Note:** More information is available on the aforementioned topics to all students on the College of Medicine website.

**OTHER**

**Appendices**

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Appendix A. **Student Presentation Guidelines: Synopsis**

1) Students to complete a literature database search exercise by **Wednesday, August 12** to receive 2% of your final grade. Penalty for late submission.

2) Students should make a formal commitment to a topic by **email to Janis Chmiel at jchmiel@tamu.edu by 5 pm Wednesday, August 26**. If not submitted by the deadline 2 points will be deducted.

3) Students should provide the Pre-presentation outline Part A by **5 pm Wednesday, September 16**. If not submitted by the deadline 2 points will be deducted.

4) Submit Pre-Presentation Outline Part B with AMA Style Annotated bibliography by **5 pm Wednesday, October 21**. If not submitted by the deadline 2 points will be deducted.

5) Students should provide written summaries (5 pages maximum with or without reference page) of their presentation to members of their group and faculty mentor. A minimum of 5 references are required. A PDF version must be emailed to Janis Chmiel at jchmiel@tamu.edu by **5 pm Tuesday, December 1**. If not submitted by the deadline 5 points will be deducted.

6) Students should provide the PowerPoint file of their presentation by email to Janis Chmiel at jchmiel@tamu.edu and faculty mentors by **5 pm Tuesday, December 1**. If not submitted by the deadline 5 points will be deducted.

7) Attendance is mandatory for both morning and afternoon sessions and all students are expected to participate in the discussion on Medical Student Grand Rounds Friday, December 11. Professional dress is required. Penalty for unexcused or late arrivals.

8) Oral presentation should be 20 minutes in length and should use PowerPoint.

9) Projectors will be available in each conference room. Students should bring their computers as backup in case the room computer fails. In addition the presentation should be brought on a flash drive in case there are technical problems with the equipment.

10) Online peer reviews (1 point penalty late submission) and self-evaluations (1 point penalty late submission) are due by **5 pm Monday, December 14**.
Appendix B. PRE-PRESENTATION OUTLINE PART A

An example of a Pre-Presentation Outline Part A is given below. Note that your outline should give a general overview and background information of the disease. **At least five references should be included.**

*The outline should be in the “bullet” format as shown below in the examples.*

**EXAMPLE I**

Title: Investigation of Breast Cancer Cells with BRCA1/2 mutations using PARP1 inhibitors as therapeutic agents

Presenter: Krystha Cantú

Mentor: Dr. Gregg Wells

Introduction:
- Hereditary breast and ovarian cancer syndrome (HBOC), caused by a germline mutation in BRCA1 or BRCA2, is characterized by an increased risk for breast cancer, ovarian cancer, prostate cancer, and pancreatic cancer.
- Treatment of breast and ovarian cancer in individuals with BRCA1- or BRCA2-related tumors is similar to that for sporadic forms of these cancers; however, new classes of drugs that specifically target the BRCA1/2 signaling pathways are being studied.
- The inhibition of poly(adenosine diphosphate [ADP]–ribose) polymerase (PARP) is a potential synthetic lethal therapeutic strategy for the treatment of cancers with specific DNA-repair defects, including those arising in carriers of a BRCA1 or BRCA2 mutation.

Etiology:
- BRCA1 and BRCA2 are human genes that code for tumor suppressor proteins. These proteins help repair damaged DNA and, therefore, play a role in ensuring the stability of the cell’s genetic material. When either of these genes is mutated, or altered, such that its protein product is not made or does not function correctly, DNA damage may not be repaired properly. As a result, cells are more likely to develop additional genetic alterations that can lead to cancer.
- Germline mutations in BRCA1 and BRCA2 are inherited in an autosomal dominant manner.
- A mutation in BRCA1 or BRCA2 should be suspected in individuals with a personal or family history (1st, 2nd, or 3rd degree relative in either lineage) of any of the following characteristics: Ashkenazi Jewish ancestry, breast cancer diagnosed at 50 or younger, three or more relatives with breast cancer at any age, or a previously identified BRCA1/ BRCA2 gene mutation in the family.
- Some sporadic tumors appear to be phenocopies of BRCA1- or BRCA2-deficient tumors without actually bearing germline mutations in either the BRCA1 or BRCA2 gene, a phenomenon that has been described as “BRCAness.”

History:
- Early genetic research by NCI-supported investigators Mary-Claire King, Ph.D., Mark Skolnick, Ph.D., and their colleagues associated a DNA region with hereditary breast cancer in 1990.
- Researchers then identified the BRCA1 gene within this region, which established a clear association between inheriting the mutant forms of the gene (known as germline mutations) with increased cases of cancer. Later, germline mutations identified in another gene, BRCA2, were also associated with an increased risk of breast and ovarian cancers.
- Soon after their discovery in 1994 and 1995, genetically-engineered mouse models (GEMs) for BRCA1 and BRCA2 deficiency were generated.
The inhibition of poly(adenosine diphosphate [ADP]-ribose) polymerase (PARP) is a potential synthetic lethal therapeutic strategy for the treatment of cancers with specific DNA-repair defects, including those arising in carriers of a \textit{BRCA1} or \textit{BRCA2} mutation. There have been clinical evaluations in humans of olaparib (AZD2281), a novel, potent, orally active PARP inhibitor.

**Clinical Presentation:**
- Breast cancer often presents as a lump on the breast with or without associated itching, burning, skin dimpling, or pain in the breast region.
- Several studies have found that lumps are the dominant symptom noticed by women with breast cancer.

**Pathology:**
- The distribution of histologic types of \textit{BRCA1}-associated breast cancers differs from sporadic breast cancers in various aspects, but \textit{BRCA2}-associated breast cancers do not appear to exhibit a specific pathologic phenotype.
- The majority of the \textit{BRCA1} associated tumors are invasive ductal carcinomas, but approximately 15% are classified as medullary and are grade 3 and they often show lymphocytic infiltration and ‘pushing’ margins.
- The majority of \textit{BRCA1}-associated breast cancers are ER-negative, PR-negative, and ERBB2-negative but only about 10% of early-onset triple-negative breast cancers are \textit{BRCA1}-positive.

**Treatment:**
- Prophylactic surgery (mastectomy and oophorectomy) has been proposed as a means of reducing cancer risk in people with genetic susceptibility to breast and ovarian cancer.
- A randomized clinical trial of treatment with tamoxifen (a partial estrogen antagonist) in women identified by the Gail model to have an increased breast cancer risk reported a 49% reduction in breast cancer in the treated group. However, tamoxifen reduced the incidence of breast cancers that were estrogen receptor positive, but not estrogen receptor negative.
- Using PARP inhibition to target a specific DNA-repair pathway has the necessary selectivity profile and a wide therapeutic window for \textit{BRCA}-deficient cells.

**References:**
Bryant, Helen; Schultz, Niklas; Thomas, Huw; Kayan, Parker; Flower, Dan; Lopez, Elena; Kyle, Suzanne; Meuth, Mark; Curtin, Nikola; Helleday, Thomas. Specific killing of \textit{BRCA2}-deficient tumours with inhibitors of poly(ADP-ribose) polymerase. Nature. 2005; 434: 913-917.
Farmer, Hannah; McCabe, Nuala; Lord, Christopher: Tutt, Andrew; Johnson, Damian; Santarosa, Manuela; Knights, Charlotte; Smith, GRAeme; Ashworth, Alan; Dillon, Krystyna; Martin, Niall; Richardson, Tobias; Hickson, Ian; Jackson, Stephen. Targeting the DNA repair defect in \textit{BRCA} mutant cells as a therapeutic strategy. Nature. 434: 917-921.
Fong, Peter; Boss, David, Yap; Timothy; Tutt, Andrew; Wu, Peiju; Mergui-Roelvink, Marja; Mortimer, Peter; Swaisland, Helen; Lau, Alan; O’Connor, Mark; Ashworth, Alan; Carmichael, James; Kaye, Stan; Schellens, Jan; de Bono, Johann. Inhibition of Poly(ADP-Ribose) Polymerase in Tumors from \textit{BRCA4} Mutation Carriers. The New England Journal of Medicine. 2009; 361: 123-134.
EXAMPLE II

Title: Psoriasis: Role and targeting of IL-17 to reduce disease severity
Presenter: Katie E. Benjegerdes

Introduction

- Psoriasis is a common, chronic, immune-mediated, inflammatory skin disease affecting approximately 2% of the population worldwide.
- There are a number of clinical variants of psoriasis with plaque-type psoriasis being the most common and affecting 85-90% of those suffering from psoriasis.
- Psoriasis is associated with a high degree of morbidity including other health complications such as cardiovascular disease, obesity, and type II diabetes, as well as reduced levels of employment, and decreased quality of life.
- Although there are many characteristic features, there are no diagnostic criteria established for the clinical spectrum of psoriasis.

Etiology

- The pathogenesis of psoriasis is not yet completely understood although it likely involves an immune response including both innate and adaptive immunity, a genetic predisposition, as well as the involvement of variable environmental triggers.
- A genetic predisposition to the development of psoriasis has been linked to at least nine chromosomal loci named psoriasis susceptibility 1 through 9 (PSORS1-PSORS9) as well as IL12B and IL23R genes. PSORS1, IL12B, and IL23R are considered the major genetic determinants.

Clinical Presentation

- Psoriasis characteristically presents as well-demarcated, erythematous plaques on the skin in variable shapes and sizes with adherent silvery scale.
- There are some sites which seem to have a predilection for developing psoriatic plaques such as the knees, elbows, and scalp. However, in severe psoriasis, the plaques can involve the entirety of the surface of the body.
- Psoriasis can also involve the joints (psoriatic arthritis) and nails with psoriatic lesions of the nail bed and matrix.

Pathology

- The scales of psoriatic lesions are a manifestation of a hyperproliferative epidermis with premature maturation of keratinocytes and parakeratosis as indicated by incomplete cornification and a stratum corneum with retained nuclei.
- The histopathological manifestation of psoriasis includes epidermal thickening, parakeratosis, rete ridge elongation, and mixed cellular infiltration.
- The inflammatory infiltrate includes macrophages, dendritic cells, and T cells in the dermis along with neutrophils and some T cells within the epidermis.
• Erythema of the psoriatic plaques results from increased numbers of capillaries which reach the surface of the skin through a thinned epidermis.

Immunopathology

• Psoriatic keratinocytes are a source of cytokines including TNF-α, IF-γ, IL-1β, and IL-6 that activate dermal dendritic cells.
• Activated dermal dendritic cells release a number of cytokines, including IL-12 and IL-23.
• IL-23 induces the production of type 17 T helper (T_h17) cells, which are increased in number in psoriatic lesions. T_h17 cells also secrete a number of proinflammatory cytokines, including IL-17A, IL-22, and TNF-α.
• IL-17A, secreted by T_h17 cells, is a proinflammatory cytokine that induces the production of other cytokines and angiogenic factors.
• IL-17A provides a positive feedback system for the activation of T_h17 cell-mediated inflammation and is found in increased levels in psoriatic skin lesions.
• Keratinocytes also respond to the dendritic cell-derived and T cell-derived cytokines IL-17 and IL-22.

Treatment

• Treatment options for psoriasis include topical medications, phototherapy, oral systemic therapy, and biological agents dependent on disease severity.
• Biological agents target specific inflammatory mediators in the pathogenesis of psoriasis and are classified according to their targets: anti-TNF-α agents, anti-IL-12/23p40 agents, anti-IL-23p19 agents, and anti-IL-17 agents.

Novel Anti-IL-17 Biological Agents Targeting T_h17/IL-23 Pathway

• Brodalumab is a human monoclonal antibody against the IL-17A receptor and inhibits the activity of different IL-17 cytokines.
• Ixekizumab and secukinumab are human monoclonal antibodies that bind soluble IL-17A.
• Each of these three biological medications target key mediators in the T_h17/IL-23 pathway, the central pathway responsible for the immunopathogenesis of psoriasis.

References


Appendix C. PRE-PRESENTATION OUTLINE PART A GRADING RUBRIC

Medical Student Grand Rounds Faculty Grading Rubric Form – Pre-Presentation Outline

Student Name:

Faculty Mentor:

Topic:

Guidelines for grading:
Guidelines for grading are below. 10% of grade. Each section is worth ~ 2 points.

______1. (2.0 pts) Introduce the topic and its relationship to human health and disease.

Comments:

______2. (2.0 pts) Identify one or more aspects of the topic that will be addressed (example - cardiac disease: plaque formation in atherosclerosis).

Comments:

______3 (2 pts.) Outline relevant clinical aspects (for example for a disease: diagnosis, prognosis, therapeutics, and patient care; for example for a drug or substance: history, development, mechanism, indications for use, off-label uses, side effects, interactions with other substances, contraindications, dosage and routes of administration, clinical trials).

Comments:

______4. (2 pts.) Outline cellular and molecular pathogenesis.

Comments:

______5. (2 pts.) Reference at least five good quality sources.

Comments

_________________________________________________________________

Comments and Grade: __________
Appendix D: PRE-PRESENTATION OUTLINE PART B WITH ANNOTATED REFERENCES

An example of a Pre-Presentation Outline Part B with Annotated References is given below. Note that your outline should be more polished with additional details and more in-depth descriptions of the underlying basis of disease than that presented in the Pre-Presentation Outline Part A. The Part B Outline should be five pages in length for content plus additional pages (no limit) for the annotated references. At least five references should be included. To annotate each reference, provide the following information under each reference:

- What is the purpose or hypothesis of the study and why was it important to test?
- What specific techniques / reagents / strategies are used to test the hypothesis?
- What are the major conclusions of the study?
- What is the significance?

The outline should be in the “bullet” format as shown below in the example.

Title: Psoriasis: Role and targeting of the IL-23/T$_h$17 pathway to reduce disease severity

Presenter: Katie E. Benjegerdes

Introduction

- Psoriasis is a common, chronic, immune-mediated, inflammatory skin disease affecting approximately 2% of the population worldwide.
- There are a number of clinical variants of psoriasis with plaque-type psoriasis being the most common and affecting 85-90% of those suffering from psoriasis.
- Psoriasis is associated with a high degree of morbidity including other health complications such as cardiovascular disease, obesity, and type II diabetes, as well as reduced levels of employment, and decreased quality of life.
- Although there are many characteristic features, there are no diagnostic criteria established for the clinical spectrum of psoriasis.

Etiology

- The pathogenesis of psoriasis is not yet completely understood although it likely involves an immune response including both innate and adaptive immunity, a genetic predisposition, as well as the involvement of variable environmental triggers.
- A genetic predisposition to the development of psoriasis has been linked to at least nine chromosomal loci named psoriasis susceptibility 1 through 9 (PSORS1-PSORS9) as well as IL12B and IL23R genes. PSORS1, IL12B, and IL23R are considered the major genetic determinants.

Clinical Presentation

- Psoriasis characteristically presents as well-demarcated, erythematous plaques on the skin in variable shapes and sizes with adherent silvery scale.
- There are some sites which seem to have a predilection for developing psoriatic plaques such as the knees, elbows, and scalp. However, in severe psoriasis, the plaques can involve the entirety of the surface of the body.
- Psoriasis can also involve the joints (psoriatic arthritis) and nails with psoriatic lesions of the nail bed and matrix.

**Pathology**

- The scales of psoriatic lesions are a manifestation of a hyperproliferative epidermis with premature maturation of keratinocytes and parakeratosis as indicated by incomplete cornification and a stratum corneum with retained nuclei.
- The histopathological manifestation of psoriasis includes epidermal thickening, parakeratosis, rete ridge elongation, and mixed cellular infiltration.
- The inflammatory infiltrate includes macrophages, dendritic cells, and T cells in the dermis along with neutrophils and some T cells within the epidermis.
- Erythema of the psoriatic plaques results from increased numbers of capillaries which reach the surface of the skin through a thinned epidermis.

**Immunopathology**

- The cascade of events in the development of psoriatic lesions is not completely understood. One hypothesis to the development of psoriatic lesions involves the coexistence of a genetic predisposition and a potentiating environmental trigger.
  - An environmental trigger causes innate immune cells in the skin to produce and secrete a number of cytokines.
- Psoriatic keratinocytes have been shown to be a source of these cytokines including TNF-α, IF-γ, IL-1β, and IL-6. These cytokines activate dermal dendritic cells.
- Activated dermal dendritic cells release a number of cytokines including IL-12 and IL-23.
- IL-23 is an activating cytokine for the production of type 17 T helper (T\textsubscript{h17}) cells.
- T\textsubscript{h17} cells and the characteristic set of cytokines they produce, including IL-17 (IL-17A), have been shown to act on keratinocytes leading to an increase in the expression of various chemokines.
- These chemokines attract other immune cells such as dendritic cells, T\textsubscript{h17} cells, and neutrophils to the site of the lesion leading to the characteristic chronic inflammation of psoriasis.
- Studies involving *in vivo* characterization of T cell populations in psoriatic lesions have shown that IL-17-producing T\textsubscript{h17} cells are present in elevated numbers in the leukocyte infiltrate characteristic to psoriasis.
- For this reason, the most recent research in the immunopathology and pathogenesis of psoriasis has focused on targeting the specific IL-23/T\textsubscript{h17} pathway in the hypothesized cascade of events of psoriasis pathogenesis.

**IL-23/T\textsubscript{h17} Pathway in the Psoriasis Pathogenesis Cascade**

- **Role of IL-23 in the Pathogenesis of Psoriasis**
  - IL-23 is known to induce the production of T\textsubscript{h17} cells, which are increased in number in psoriatic lesions.
o IL-23 and IL-12 (both released from activated dermal dendritic cells) are structurally related.
  ▪ Both molecules share a p40 subunit. IL-12 has a unique p35 subunit while IL-23 has a unique p19 subunit.
o Studies have shown that there is an increase in the presence of both IL-12 and IL-23 in psoriatic lesions.
  ▪ However, these studies analyzed the presence of the p40 subunit shared by both molecules.
o Further investigative studies indicate that there is an increase in RNA expression of the IL-23p19 subunit without a corresponding increase in expression of the IL-12p35 subunit.
  ▪ This supports the hypothesis that IL-23 plays a more central role in the pathogenesis of psoriasis than does IL-12.

- **Role of T\(_{h}\)17 Cells in Psoriasis**
  o T\(_{h}\)17 cell production is induced by IL-23 which is secreted by dermal dendritic cells.
o T\(_{h}\)17 cells in turn secrete a number of proinflammatory cytokines, including IL-17A, IL-22, TNF-\(\alpha\), and IL-1\(\beta\).
o IL-17A is a proinflammatory cytokine that induces the production of other cytokines and angiogenic factors.
o IL-17A provides a positive feedback system for the activation of T\(_{h}\)17 cell-mediated inflammation and is found in increased levels in psoriatic skin lesions making it a key contributor to the pathogenesis of psoriasis.
o Keratinocytes also respond to the dendritic cell-derived and T cell-derived cytokines IL-17A and IL-22.

**Treatment**

- Treatment options for psoriasis include topical medications, phototherapy, oral systemic therapy, and biological agents dependent on disease severity.
- Biological agents target specific inflammatory mediators in the pathogenesis of psoriasis and are classified according to their targets: anti-TNF-\(\alpha\) agents, anti-IL-12/23p40 agents, anti-IL-23p19 agents, and anti-IL-17 agents.
- With recent research leading to an increased understanding of the pathogenesis of psoriasis, the most recent development of therapeutic agents has shifted focus to the targeting of the IL-23/T\(_{h}\)17 pathway.

**Novel Biological Agents Targeting the IL-23/T\(_{h}\)17 Pathway of Psoriasis Pathogenesis**

**Anti-IL-17 Biological Agents**

- **Ixekizumab** and **secukinumab** are human monoclonal antibodies that bind soluble IL-17A.
o **Brodalumab** is a human monoclonal antibody against the IL-17A receptor and inhibits the activity of different IL-17 cytokines in the IL-17 cytokine family.
o Each of these three biological medications target key mediators in the IL-23/T\(_{h}\)17 pathway, the central pathway responsible for the immunopathogenesis of psoriasis.
- **Ixekizumab and Secukinumab**
- **Ixekizumab** is a monoclonal IgG₄ antibody. In Phase II clinical trials, 82.8% of patients receiving 75 mg of ixekizumab every two weeks had achieved a PASI 75 (75% reduction in Psoriasis Area and Severity Index score, a standard metric used to assess psoriasis disease severity) by week 16 of the trial. Phase III clinical trials for ixekizumab are currently being conducted to further analyze the efficacy of the anti-IL-17 agent and compare its safety and efficacy to current biological therapies used in the treatment of psoriasis.
  - Ixekizumab has also been utilized in additional studies to investigate the role of IL-17A in the pathogenesis of psoriasis. Ixekizumab therapy has been shown to confer rapid and significant improvements in the clinical manifestations of psoriasis. Neutralization of IL-17 has also been shown to cause a reversal of epidermal hyperplasia, hyperproliferation of keratinocytes, and leukocyte infiltration of the dermis, all of which are key features of psoriatic lesional inflammation.
  - Additionally, studies investigating IL-17 neutralization with ixekizumab have indicated that the inhibition of cytokine expression (as illustrated with PCR and microarray analysis) in a number of T cell populations results in the suppression of inflammatory pathways that use these specific cytokines as signaling molecules.

- **Secukinumab** is a monoclonal IgG₁ antibody. In Phase II clinical trials, the primary trial end point of PASI 75 was reached by 82% of patients receiving 450 mg of secukinumab subcutaneously every 4 weeks. Phase III clinical trials were completed in July 2014 and results further validated IL-17A as a therapeutic target in the treatment of psoriasis. Additionally, the superiority of secukinumab over other agents currently used as therapy (such as etanercept, an anti-TNF-α agent) was indicated by evidence of more efficiently sustained response rates.

- **Brodalumab**
  - **Brodalumab** is a human IgG₂ monoclonal antibody that selectively binds IL-17RA (the IL-17 Receptor A subunit) and blocks signaling through the receptor. Blockade of the receptor results in inhibition of the IL-17 family of cytokines. In Phase II clinical trials, 82% of patients receiving 140 mg of brodalumab achieved PASI 75 at 12 weeks, with injections every 2 weeks.
  - Furthermore, brodalumab therapy also resulted in significant improvements in the molecular and cellular abnormalities of psoriasis. Analysis of microarray and gene expression provides evidence of inflammatory pathway suppression resulting from IL-17R blockade. These changes in genetic expression with brodalumab therapy result in reduced keratinocyte production of inflammatory factors and reduced infiltration of other leukocytes.
  - The unique and broad-range effects of anti-IL-17RA therapy compared to anti-IL-17 therapy may drive the future development of therapeutic agents in the direction of receptor blockade rather than ligand neutralization.
Anti-IL-23p19 Biological Agents

- The most recent advancements in the development of therapeutic agents for the treatment of psoriasis have led to the targeting of IL-23.

- **Guselkumab**
  - **Guselkumab** is a human monoclonal antibody to the p19 subunit of IL-23. Targeting of the p19 subunit of IL-23, rather than the shared p40 unit of IL-23 and IL-12, spares IL-12 which may have the beneficial effect of fewer side effects.
  - Clinical trials indicated that 100% of patients receiving 300 mg of guselkumab achieved PASI 75 by week 12 of therapy. Analysis of lesional and nonlesional skin biopsy specimens obtained from patients indicated that guselkumab resulted in a decreased epidermal thickness, as well as a decrease in dendritic and T cell expression.
  - Furthermore, guselkumab-treated patients had decreased levels of serum IL-17A. This may suggest that targeting of IL-23 alone can have effects of IL-23 neutralization (leading to decreased Th17 cell activation) as well as effects similar to those of anti-IL-17A drugs such as ixekizumab and secukinumab.

- Additional anti-IL-23p19 human monoclonal antibody therapeutic agents are in the early stages of clinical trials to determine their safety and efficacy in the treatment of psoriasis. MK-3222 is a humanized IgG1 antibody targeting the IL-23p19 subunit and preventing the binding of IL-23 to its receptor. BI655066 is also a humanized IgG1 monoclonal antibody against IL-23p19 and is currently in Phase I clinical trials.

Annotated References


- **Purpose or hypothesis**: This study attempts to illustrate the effects of neutralization of IL-17 on the clinical characteristics of psoriasis. Additionally, the role of IL-17 in the inflammatory pathway central to the development of psoriasis is explored.
- **Specific techniques/strategies used**: Skin lesions obtained via biopsy from 40 patients participating in a clinical drug trial were studied. Patients participating in the trial received 5, 15, 50, or 150 mg subcutaneously of ixekizumab or placebo at weeks 0, 2, and 4. Ixekizumab is an anti-IL-17 IgG4 humanized monoclonal antibody that selectively binds and neutralizes IL-17.
- **Major conclusions**: Treatment with ixekizumab showed significant dose-dependent reductions in keratinocyte proliferation, hyperplasia, epidermal thickness, T cell and dendritic cell infiltration into the dermis and epidermis, and the expression of defense molecules by keratinocytes. Each of these features contributes to the pathogenesis of psoriasis.
- **Significance**: The results of this trial portray IL-17 as a principle cytokine that activates inflammation leading to the pathogenesis of psoriasis. Neutralization of IL-17 with anti-IL-17 agents such as ixekizumab, therefore, could be an effective way to treat psoriasis.

• **Purpose or hypothesis:** Previous studies indicated an increase in the p40 subunit shared between IL-12 and IL-23 in psoriatic lesions. Further investigation, however, showed no increase in the IL-12-specific p35 subunit and it is thought that the increase in p40 expression was incorrectly attributed to an increase in IL-12 in psoriasis. This study, therefore, investigated the expression of p19 compared to the expression of p35 in psoriatic skin lesions.

• **Specific techniques/strategies used:** Lesional and nonlesional skin biopsy specimens were obtained from 22 patients with untreated active psoriasis. RNA isolation, PCR, and monoclonal mouse anti-human antibodies in immunohistochemistry were used to analyze the expression of p40, p19, and p35 subunits in lesional and nonlesional specimens.

• **Major conclusions:** Expression of p40 and p19 (IL-23) subunits were increased in lesional psoriatic specimens. Conversely, levels of p35 (IL-12) were not increased. Additionally, most of the mRNA for the expression of p19 and p40 were found in the dermal cells of the lesional biopsies.

• **Significance:** Expression of IL-23 is increased to a greater extent in psoriatic lesions than is IL-12 and infiltrating monocytes are likely the source of the increased IL-23. While IL-12 and IL-23 may both play a role in the pathogenesis of psoriasis, this study provides evidence that IL-23 is central to psoriatic immunopathology and may lead to increased IL-17 production. Therefore, anti-IL-23 agents could prove to be appropriate and promising treatment options for psoriasis.


• **Purpose or hypothesis:** T helper cells characteristically provoke the pathogenesis of chronic inflammatory diseases such as psoriasis by producing characteristic sets of cytokines. The purpose of this study was to phenotypically and functionally characterize in vivo differentiated Th17 cells taken from inflamed tissues of patients with chronic inflammatory disease in order to appropriately mimic the in vivo inflammatory environment that drives tissue inflammation.

• **Specific techniques/strategies used:** Biopsies from inflammatory locations of patients suffering from psoriasis, asthma, Crohn’s disease, or rheumatoid arthritis were obtained and provided the populations of in vivo differentiated human T cells to be studied. ELISA, immunofluorescence and flow cytometry analysis, PCR analysis, and Western blotting analysis were used to characterize the populations of T cells. The cytokine and cytokine receptor profile of the Th17 cells infiltrating the inflammatory tissues were further characterized using quantitative PCR.

• **Major conclusions:** Type 17 helper T cells were isolated from the inflamed tissue samples obtained. Additionally, the Th17 cells isolated from the in vivo inflammatory sites were shown to express IL-17 and IL-22 mRNA.

• **Significance:** In contrast to in vitro studies, IL-17 levels were elevated in chronically inflamed lesions obtained from human subjects. Additionally, this study provides evidence that the Th17 cells infiltrating chronically inflamed tissues are highly differentiated cells with a specific cytokine secretion profile in chronic inflammatory diseases such as psoriasis.

Purpose or hypothesis: This study seeks to show the effects of blocking IL-17RA (the receptor for IL-17A) on the molecular and cellular effects of psoriasis. Additionally, changes in the lesional psoriasis transcriptome following IL-17RA blocking therapy were analyzed.

Specific techniques/strategies used: Twenty-five patients with moderate-to-severe plaque psoriasis were treated with a single dose of 140 mg subcutaneously, 350 mg subcutaneously, or 700 mg intravenously of brodalumab or placebo. Brodalumab is a human IgG2 monoclonal antibody that selectively binds and blocks signaling through IL-17RA. Biopsies were obtained from lesional and nonlesional sites before and after therapy and analyzed histologically and with RNA expression profiling via quantitative PCR and microarray analysis.

Major conclusions: IL-17RA blockade by brodalumab resulted in rapid and extensive changes in gene expression and cellular characteristics of inflammatory lesions in psoriasis. The most immediate effects were seen in keratinocyte-associated genes, especially gene expression involving inflammation and hyperproliferation.

Significance: The data from this study suggest that keratinocytes are a primary site of action for IL-17RA blockade. Therefore, IL-17RA blockade with therapeutic agents such as brodalumab is a promising treatment target for normalization of the gene expressions resulting in hyperproliferation of keratinocytes and production of inflammatory cytokines in psoriasis.


Purpose or hypothesis: The expression of IL-23 is thought to play a role in the regulation of Th17 cell counts in psoriatic lesions. This study attempts to determine the effect of an IL-23-specific therapy for the treatment of psoriasis.

Specific techniques/strategies used: A total of 24 patients received a single dose of 10, 30, 100, or 300 mg of guselkumab or a single dose of placebo. Guselkumab is an anti-IL-23-specific monoclonal antibody. The clinical response of each patient was assessed using the Psoriasis Area and Severity Index (PASI). Additionally, skin biopsy specimens from both the guselkumab-treated group and the placebo-treated group were used for histological analysis and gene expression comparison.

Major conclusions: Results showed a dose-dependent improvement in PASI scores in guselkumab-treated patients compared to no improvement in PASI scores for those receiving placebo. Analysis of the skin specimens obtained from the patients indicated a decrease in epidermal thickness, T cell expression, and dendritic cell expression in patients treated with guselkumab compared to those treated with placebo. Significant reductions in psoriasis gene expression and serum IL-17 levels were also seen in patients treated with the anti-IL-23-specific agent guselkumab.

Significance: The results of this study indicate that a single dose of the IL-23-inhibiting agent guselkumab can lead to clinical improvements in psoriasis. This suggests that neutralization of IL-23 alone could be an effective therapy for psoriasis.

References


APPENDIX E: Annotated Reference Outline Part B Grading Rubric

Medical Student Grand Rounds Faculty Grading Rubric Form – Pre-Presentation Outline Part B

Student Name:

Faculty Mentor:

Topic:

Guidelines for grading:
Guidelines for grading are below. 10% of final grade.

1. (2.0 points) Appropriately focuses topic on a specific area. Describes one or more aspects of molecular pathogenesis of disease, emphasizing the mechanistic basis of the disease or action of a drug.

Comments:

2. (2.0 points) Prepares clear and well-organized outline, using appropriate format, correct spelling, etc.

3. (3.0 points) Outlines recent advances in the field/subject/area: for example, new approaches, models, drug trials, mechanistic insights. Describes one or more research studies or clinical trials from literature.

Comments:

4. (3.0 points) Added at least five new annotated references from good quality sources (these should be new references apart from those included in the Part A outline). Only five new references need to be annotated.

Comments

____________________________________________________________________________

Comments and Grade: __________
Appendix F: Faculty Grading Rubric – Medical Student Grand Rounds Presentation Evaluation Form

Name of presenter: 

Topic: 

Guidelines for grading:

Pre-presentation Outlines (~20 points) ________

Pubmed Library Search Exercise (~2 points) ________

Choosing a Topic (~5 points) ________

The above grades for the pre-presentation outlines, topic selection, and PubMed Search were determined before the research presentation.

Presentation (~69 points total) ________

A. Oral Presentation and Delivery (50 points) ________

1. Content (quality, logical organization and flow, connection between current research and clinical practice) ~ 12.5

   a. Demonstrates scholarly knowledge of topic.

   b. Introduction of the topic, including incidence, prevalence, risks, and necessary background that allows a full understanding and appreciation of the presentation. A clear scientific focus should be indicated and rationalized. Material was well-organized and clear. It included proper grammar, diction, punctuation and spelling.

   c. Clinical aspects and overview, including diagnosis, prognosis, prevention strategies and/or therapeutic approaches. If novel therapies are the focus, then mechanisms of action, indications for use, off-label uses, side effects, interactions with other substances, contraindications, dosage and clinical trials should be included.

   d. Basic Science aspects of the disease/disorder - mechanisms of pathogenesis, progression and/or scientific rationale for new approaches. This includes basic science aspects in multiple categories/areas: anatomy, biochemistry, cellular/molecular biology, genetics, pharmacology, physiology, immunology, and/or microbiology.

   e. New information on current, basic, mechanistic research in the field/subject, leading to new approaches to diagnosis, prognosis, prevention and/or therapy. This can include, but is not limited to: in vivo or in vitro modes, laboratory based studies, novel hypotheses, etc. The emphasis is on the relevance of basic research to the advancement of clinical medicine. If the
main focus is on a new treatment, the student should describe how basic, mechanistic investigations lead to the discovery or use of the new therapeutic approach and the advantages/disadvantages over conventional therapies.

2. Critical understanding and analysis of the topic – 12.5
   a. Demonstrates an independent critical analysis of the published literature/research, above and beyond just relaying information verbatim to the audience. Mastery of the subject area with ability to assess contradictory findings, assess strengths/weaknesses of models and studies and ability to field questions.

3. Appearance of slides – clarify, readability and effectiveness - 12.5

4. Overall quality of the presentation (correct time – 20 minutes, familiarity with the material, able to effectively and accurately answer questions, clearly practiced) – 12.5

B. Written summary handout (Five page maximum) (~15 points) ______

Prepared a concise summary of the topic.

1. Content (quality, completeness, logical organization of the paper) – 4.5

2. Critical analysis of the topic – 4.5

3. Quality, relevance and proper use of references – 4.5.
   a. Required to have a minimum of five references that are relevant to the material that was covered. A list of numerous references on material that was not discussed in the talk should not be awarded the maximal grade.

4. Format – appearance, spelling, correct grammar – 1.5

C. Class Participation (~4 points) ______

1. Present and listening

2. Seemed interested and attentive

3. Asked pertinent and insightful questions
Student Peer Review (~2 points) ______
Adequate
Below Adequate
Did not participate

Student Self Review (~2 points) ______
Adequate
Below Adequate
Did not participate

Comments and Grade: __________
Appendix G: Student Peer Review Rubric- Medical Student Grand Rounds Presentation

Student Peer Review Form

Name of presenter: 
Topic: 

Presentation of Basic Science (anatomy, biochemistry, cellular/molecular biology, genetics, pharmacology, physiology, immunology, and/or microbiology) aspects of disease/disorder.

A. Outstanding 
B. Excellent 
C. Very Good 
D. Good 
E. Marginal 

Comments: 

Presentation of clinical aspects and overview, including diagnosis, prognosis, prevention strategies and/or therapeutic approaches. If novel therapies are the focus, then mechanisms of action, indications for use, off-label uses, side effects, interactions with other substances, contraindications, dosage and clinical trials should be included.

A. Outstanding 
B. Excellent 
C. Very Good 
D. Good 
E. Marginal 

Comments: 

Presentation of new information on current, basic, mechanistic research in the field/subject, leading to new approaches to diagnosis, prognosis, prevention and/or therapy. This can include, but is not limited to: in vivo or in vitro modes, laboratory based studies, novel hypotheses, etc. The emphasis is on the relevance of basic research to the advancement of clinical medicine.

A. Outstanding 
B. Excellent 
C. Very Good 
D. Good 
E. Marginal 

Comments: 

Overall clarity of oral presentation

A. Outstanding 
B. Excellent 
C. Very Good 
D. Good 
E. Marginal 

Comments:
Clarity of slides
   A. Outstanding
   B. Excellent
   C. Very Good
   D. Good
   E. Marginal

Comments:

Please provide feedback about what went well and what could be improved:

Comments and Grade: ________ (based on 100 point scale)
Appendix H: Student Self Evaluation-Medical Student Grand Rounds Presentation Review Form

Name of self-evaluator:

Topic:

OBJECTIVE: To critically reflect upon, summarize, and synthesize both your own and your colleagues’ feedback.

Please address the following:

- What worked well (i.e., you would not change next time)?

- What things did not go so well during the preparation of and/or the delivery of the presentation (and how might you approach this differently next time)?

- What did you learn as a result of this experience?
# Texas A&M University
## Departmental Request for a Change in Course
### Undergraduate • Graduate • Professional
- Submit original form and attachments

### Form Instructions
1. **Course request type:**
   - [ ] Undergraduate
   - [ ] Graduate
   - [x] First Professional (DDS, MD, JD, PharmD, DVM)

2. **Request submitted by**: (Department or Program Name): Select or Type Department/Program Name

3. **Course prefix, number and complete title of course:** MEID 709 - O. C. Cooper Preceptorship

   **Attach a brief supporting statement for changes made to items 4a thru 4d, and 10 below.**

4. **Change requested**
   a. **Prerequisite(s):** From: _______________________ To: _______________________
   b. **Withdrawal (reason):**
   c. **Cross-list with:**
   d. **Cross-listed courses require the signature of both department heads.**
   e. **Change in course title and description.** Enter complete current course title and current course description in item 9; enter proposed course title and proposed course description in item 10. Complete item 11a and b for a change in title.
   f. **Change in course number, contact hours (lab & lecture), and semester credit hours.** Complete item 11a and b. **Attach a course syllabus.**

5. **Is this an existing core curriculum course?**
   - [x] Yes
   - [ ] No

6. **If grade type is changing for existing course, indicate the new grade type:**
   - [ ] Grade
   - [ ] S/U
   - [ ] P/F (CLMD)

7. **If this course will be stacked, please indicate the course number of the stacked course:**
   
   [ ] 1 verify that I have reviewed the FAQ for Export Control Basics for Distance Education (http://vpr.tamu.edu/resources/export-controls/export-controls-basics-for-distance-education).

8. **Complete current course title and current catalog course description:**
   O. C. Cooper Preceptorship. Credit 4.

9. **Complete proposed course title and proposed catalog course description (not to exceed 50 words):**
   O. C. Cooper Preceptorship. Credit 1 to 10.

10. **Approval recommended by:**
    - **Department Head or Program Chair (Type Name & Sign)**
    - **Date**

11. **Submitted to Coordinating Board by:**
    - **Associate Director, Curricular Services**
    - **Date**
Course title and number: MEUD 709. O.C. Cooper Preceptorship
Term (e.g., Fall 200X): Fall 2015-Spring 2016
Meeting times and location: Tuesday’s and Wednesday’s 1:00 PM-5:00 PM/ Unless otherwise stated

Course Description and Prerequisites

O.C. Cooper Preceptorship. (4-0). Credit 4. Students rotate through primary care experiences in family medicine, internal medicine, pediatrics, gynecology, otolaryngology, obstetrics, ophthalmology, dermatology and orthopedics. Prerequisite: Completion of Phase 1.

Course Directors

<table>
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<tr>
<th>Name</th>
<th>Email</th>
<th>Phone</th>
<th>Office location</th>
<th>Office hours</th>
<th>Campus</th>
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<tbody>
<tr>
<td>Rachel Bramson, MD, MS</td>
<td><a href="mailto:Bramson@medicine.tambsc.edu">Bramson@medicine.tambsc.edu</a></td>
<td>979-436-0533</td>
<td>Clinical 1 Bldg, Suite 4100</td>
<td>By appointment</td>
<td>Bryan</td>
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<tr>
<td>Robert Wiprud, MD</td>
<td><a href="mailto:Wiprud@medicine.tambsc.edu">Wiprud@medicine.tambsc.edu</a></td>
<td>979-436-0539</td>
<td>Clinical 1 Bldg, Suite 4100</td>
<td>By appointment</td>
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<tr>
<td>Penny Holland-Barkis, MD</td>
<td><a href="mailto:pholland@sw.org">pholland@sw.org</a></td>
<td>254-771-7707</td>
<td>Medical Education Center</td>
<td>By appointment</td>
<td>Temple</td>
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<tr>
<td>Robin Dauterive, MD</td>
<td><a href="mailto:RDAUTERIVE@sw.org">RDAUTERIVE@sw.org</a></td>
<td>254-724-0454</td>
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<td>By appointment</td>
<td>Temple</td>
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<tr>
<td>Stephen Sewell, MD</td>
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<td>By appointment</td>
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<tr>
<td>Shane Maxwell, MD</td>
<td><a href="mailto:srmaxwell@sw.org">srmaxwell@sw.org</a></td>
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<tr>
<td>Kassie Kolinek</td>
<td><a href="mailto:kolinek@medicine.tambsc.edu">kolinek@medicine.tambsc.edu</a></td>
<td>979-436-0535</td>
<td>Clinical 1 Bldg, Suite 4100</td>
<td>By appointment</td>
<td>Bryan-College Station</td>
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<tr>
<td>Keeouka Rivera</td>
<td><a href="mailto:krivera@medicine.tambsc.edu">krivera@medicine.tambsc.edu</a></td>
<td>254-724-2368</td>
<td>411 Medical Education Center</td>
<td>By appointment</td>
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### Learning Outcomes & Objectives

**COM Competency Based Learning Objectives:** [http://medicine.tamhsc.edu/academic-affairs/curriculum/objectives/](http://medicine.tamhsc.edu/academic-affairs/curriculum/objectives/)


<table>
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<tr>
<th>Course Objective:</th>
<th>COM Competency Based Learning Objectives (CBLO):</th>
<th>Taught (T) and/or Evaluated (E):</th>
<th>Evaluation:</th>
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<tbody>
<tr>
<td>1. Demonstrate caring and respectful behavior when interacting with patients and their families.</td>
<td>PC1: Obtain both complete and system-focused medical histories that include psychosocial and behavioral determinants of health</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
</tr>
<tr>
<td>2. Perform an accurate complete history and physical on a standardized patient and an accurate Focused Patient Encounter examination on a standardized patient.</td>
<td>PC1: Obtain both complete and system-focused medical histories that include psychosocial and behavioral determinants of health</td>
<td>Taught AND Evaluated</td>
<td>Exam - Institutionally Developed, Written/ Computer-based</td>
</tr>
<tr>
<td>3. Using clinical reasoning skills to integrate and synthesize clinical information, develop a differential diagnosis and plans for determining the diagnosis, providing preliminary treatment, and health maintenance.</td>
<td>PC2: Perform both complete and system-focused physical examinations</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
</tr>
<tr>
<td>3. Using clinical reasoning skills to integrate and synthesize clinical information, develop a differential diagnosis and plans for determining the diagnosis, providing preliminary treatment, and health maintenance.</td>
<td>PC3: Develop appropriate differential diagnoses by integrating collected clinical information</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
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<tr>
<td>3. Using clinical reasoning skills to integrate and synthesize clinical information, develop a differential diagnosis and plans for determining the diagnosis, providing preliminary treatment, and health maintenance.</td>
<td>PC4: Develop contextual and individualized diagnostic and treatment plans based upon collected clinical information</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
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<tr>
<td>3. Using clinical reasoning skills to integrate and synthesize clinical information, develop a differential diagnosis and plans for determining the diagnosis, providing preliminary treatment, and health maintenance.</td>
<td>PC6: Recognize common immediately life-threatening conditions and initiate therapy</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
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<td>3. Using clinical reasoning skills to integrate and synthesize clinical information, develop a differential diagnosis and plans for</td>
<td>PC12: Educate patients in personalized health</td>
<td>Taught AND Evaluated</td>
<td>Exam - Institutionally Developed,</td>
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Date created/Revised: 05/26/2015 By: K.Knighton
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<tr>
<td>4. Write an accurate complete history and physical on a standardized patient and write an accurate Focused Patient Encounter.</td>
<td>MK1: Demonstrate knowledge of normal human structure and function at the organ-system, tissue, cellular and molecular level; and of the interaction of human systems in maintaining homeostasis</td>
<td>Taught AND Evaluated</td>
<td>Exam - Institutionally Developed, Clinical Performance</td>
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<tr>
<td>5. Demonstrate mastery of basic medical vocabulary.</td>
<td>MK1: Demonstrate knowledge of normal human structure and function at the organ-system, tissue, cellular and molecular level; and of the interaction of human systems in maintaining homeostasis</td>
<td>Taught AND Evaluated</td>
<td>Clinical Documentation Review</td>
</tr>
<tr>
<td>6. Apply germane basic and clinical science knowledge to the history, physical, and differential diagnosis</td>
<td>MK2: Describe the basic mechanisms involved in the causation of human disease and their influence on clinical presentation and therapy</td>
<td>Taught AND Evaluated</td>
<td>Clinical Documentation Review</td>
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<td>7. Use effective listening and communication skills to elicit a thorough medical history from a patient.</td>
<td>ICS1: Demonstrate effective listening skills</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
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<td>7. Use effective listening and communication skills to elicit a thorough medical history from a patient.</td>
<td>ICS3: Communicate effectively with patients, patients'</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
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Date created/Revised: 05/26/2015 By: K.Knighton
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<tr>
<td><strong>7. Use effective listening and communication skills to elicit a thorough medical history from a patient.</strong></td>
<td>family members, peers, and other members of the health care team</td>
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<td>Exam - Institutionally Developed, Written/Computer-based</td>
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<td><strong>8. Demonstrate effective listening skills and positive interaction with colleagues in the medical setting.</strong></td>
<td>ICS1: Demonstrate effective listening skills</td>
<td>Taught AND Evaluated</td>
<td>Clinical Documentation Review</td>
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<td></td>
<td>ICS3: Communicate effectively with patients, patients' family members, peers, and other members of the health care team</td>
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<td>Clinical Performance Rating/Checklist</td>
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<td><strong>9. Present a concise Focused Patient Encounter oral presentation to the attending physician.</strong></td>
<td>ICS3: Communicate effectively with patients, patients' family members, peers, and other members of the health care team</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
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<tr>
<td><strong>10. Demonstrate effective written communication to accurately convey patient information in a SOAP Note and Complete H&amp;P format.</strong></td>
<td>ICS5: Maintain accurate medical records</td>
<td>Taught AND Evaluated</td>
<td>Exam - Institutionally Developed, Written/Computer-based</td>
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Date created/Revised: 05/26/2015 By: K. Knighten
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<tr>
<th></th>
<th>PROF4: Treat patients and patients' family members respectfully and compassionately, regardless of age, disability, gender, race, ethnicity, culture, religion, sexual preference, and socio-economic status</th>
<th>Taught AND Evaluated</th>
<th>Exam - Institutionally Developed, Clinical Performance</th>
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<tr>
<td>11.</td>
<td>Demonstrate sensitivity and responsiveness to a patient's culture, age, gender, and disabilities.</td>
<td>Taught AND Evaluated</td>
<td>Clinical Documentation Review</td>
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<tr>
<td>11.</td>
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<td>12.</td>
<td>Demonstrate professional behavior and appearance, adherence to College of Medicine “Student Code of Conduct”, engagement in course activities and adherence to course expectations</td>
<td>Taught AND Evaluated</td>
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</tr>
<tr>
<td>12.</td>
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<td>Taught AND Evaluated</td>
<td>Exam - Institutionally Developed, Clinical Performance</td>
</tr>
<tr>
<td>13.</td>
<td>Demonstrate appropriate behaviors toward patients, office staff, and the health care team.</td>
<td>Taught AND Evaluated</td>
<td>Clinical Documentation Review</td>
</tr>
<tr>
<td>13.</td>
<td>Demonstrate appropriate behaviors toward patients, office staff, and the health care team.</td>
<td>Taught AND Evaluated</td>
<td>Clinical Performance Rating/Checklist</td>
</tr>
<tr>
<td>13.</td>
<td>Demonstrate appropriate behaviors toward patients, office staff, and the health care team.</td>
<td>Taught AND Evaluated</td>
<td>Exam - Institutionally Developed, Oral</td>
</tr>
<tr>
<td>14.</td>
<td>Identify patient barriers to care and advocate for the patient in overcoming</td>
<td>Taught AND Evaluated</td>
<td>Exam - Institutionally Developed, Oral</td>
</tr>
</tbody>
</table>

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<table>
<thead>
<tr>
<th>Grading Policies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clinical Evaluation of 2nd Year Medical Student (Average of both Clinical Rotations)</td>
</tr>
<tr>
<td>Complete H&amp;P OSCE (Average of Fall &amp; Spring)</td>
</tr>
<tr>
<td>Written Complete H&amp;P (Spring)</td>
</tr>
<tr>
<td>Focused Patient Encounter OSCE (Average of Fall &amp; Spring)</td>
</tr>
<tr>
<td>Final Exam Focused Patient Encounter OSCE</td>
</tr>
<tr>
<td>Final Exam Written SOAP Note (based on Final Exam Focused Patient Encounter OSCE)</td>
</tr>
<tr>
<td>Professionalism Evaluations (Pass/Fail)</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
</tr>
</tbody>
</table>

**GRADING SCALE**

<table>
<thead>
<tr>
<th>Grade</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Honors</td>
<td>Top 15%</td>
</tr>
<tr>
<td>Pass</td>
<td>≥ 70</td>
</tr>
<tr>
<td>Fail</td>
<td>≤ 70</td>
</tr>
</tbody>
</table>

* Barrier-Must pass in order to complete course

* See all grading rubrics on Blackboard

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### Honors Recognition
At the completion of the course, the top 15% of students will be considered for the commendation of Honors which is also based on the criteria listed below.
Honors status is not awarded to many students; any person receiving this recognition must be an exceptional student in all areas of the O.C. Cooper Preceptorship Program. The list below includes examples of qualities considered by the Department of Family and Community Medicine when recognizing exceptional students.
An Honors student is one who:
- has no unexcused absences from any portion of the course (rotations, workshops, class debriefings)
- displays outstanding standards of professional behavior with patients, physicians and office staff
- complies with all course rules
- is recognized for excellent clinical performance on preceptorship rotations
- consistently meets high standards for History & Physicals/S.O.A.P. Notes turned in for the course
- turns in all electronic evaluations, Preceptor evaluations, H&P’s and S.O.A.P. Notes by the due dates listed on the course calendar

### Pass
- Satisfactory performance on all assignments
- Satisfactory performance in all rotations and workshops
- Attendance at all course functions (Orientation, Workshops, Rotations, Class Meetings)
- Professional behavior
- Compliance with course expectations and guidelines including turning in evaluations as noted above

### Fail
*(any of these items may result in course failure)*
- Un satisfactory performance in any rotations, workshops or written assignments
- Unexcused absences
- Unprofessional behavior
- Failure to comply with course expectations and guidelines
- Preceptor evaluations with a mark in the lowest category in any item may result in course failure
- Unsatisfactory performance of clinical skills or other course activities

### Remediation:
Failure/Remediation is considered on a case-by-case basis. If a student fails the Final EXAM Focused Patient Encounter OSCE or Final EXAM SOAP Note and all other components of the student’s performance are satisfactory, the student will be required to remediate the Final EXAM Focused Patient Encounter OSCE clinical encounter and Final EXAM SOAP Note.

### Attendance and Make-up Policies
Student rule 7 [http://student-rules.tamu.edu/rule07](http://student-rules.tamu.edu/rule07).

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| Overview | Attendance at all course functions - orientation, workshops, rotations and class meetings is MANDATORY for all students. Any requests for excused absences will be considered on a case-by-case basis. An online absence request must be completed for any absence or tardy.  

Failure to comply with requesting or reporting an absence may result in failure for the professionalism component of your final grade. |
|---|---|
| Student Attendance | If a student arrives for a clinical rotation session and the preceptor is not be available, the student must call the Education Program Coordinator at your campus immediately for further instructions.  

**Phase I and II Overall Mandatory Class Attendance Requirements**  
For ALL Phase I and II Blocks, class attendance is required for all laboratory sessions, clinical correlations, patient encounters, and other activities indicated as “Mandatory” on the class schedule. Attendance at all class sessions in the Introduction to Clinical Skills (ICS) I, ICS II, Preceptorship, and Becoming a Physician I and II is also required. Lectures designated as “Mandatory” will require you to sign an attendance sheet that will be available for you to sign at the beginning of the presentation. It is your responsibility to make sure that you have signed the attendance sheet. Any missing signatures on the attendance sheet will be regarded as unexcused absences. Signing in for someone other than yourself will be considered a serious breach of professionalism and academic dishonesty, and will be subject to disciplinary action, including dismissal. Students missing any of these required class sessions without an excused absence will be subject to the following:  
First (1st) unexcused absence – a point will be deducted from the numerical block or course grade in which the unexcused absence occurred and the student is required to meet with Phase Leaders regarding this unexcused absence to address any professionalism concerns that may be associated with the absence.  
For the Second (2nd), Third (3rd) and Fourth (4th) cumulative unexcused absences within a Phase – a point will be further deducted from the numerical block or course grade in which each of the unexcused absences occurred and the student is required to meet with the Assistant/Associate Dean for Student Affairs. The second, third, and fourth unexcused absences are cumulative for each Phase.  
In addition, upon incurring the third (3rd) cumulative unexcused absence, the Phase Leaders will recommend to the Student Promotions Committee the student be placed on the Concern List. If the student is already on the Promotions Committee Concern List, he/she may be placed on probation.  
For the fourth (4th) cumulative unexcused absence, a report will be written by the Phase Leaders about the student’s chronic absence behavior and sent directly to the College of Medicine Student Promotions Committee with the recommendation that the student be considered to be placed on probation. |
| Preceptor Attendance | Preceptors who find themselves unable to keep a preceptorship appointment should alert the department as early as possible. Usually, the student will be placed with another preceptor for that afternoon.  

Students should not make other personal plans until notified by the Education Program Coordinator that we are unable to reschedule the session for that day or another time. |
<p>| Unanticipated Absences &amp; Tardiness | You must call the Education Program Coordinator at your campus prior to the requested absence if notification is less than 5 days prior to the absence from the scheduled event. If that person is unavailable, a voice message may be left, along with a telephone number where you can be reached. This holds true even in the event of an illness. An online absence request must be completed for any absence or tardy. |</p>
<table>
<thead>
<tr>
<th>Schedules</th>
<th>Student will receive schedules prior to the Course Orientation. Subsequent changes will be emailed to the student. <strong>Students are responsible for all communications posted on or sent via Blackboard as well as information sent to the COM email account. Please be aware that the forwarding of COM email account to outside email accounts is not always effective.</strong></th>
</tr>
</thead>
</table>
| **Dress Code** | **Students are expected to dress in this attire for all** patient contact, including the Female Breast and Pelvic Exam Workshop and the Male Genitalia Workshop. **Inappropriate attire will be grounds for you being asked to leave the clinic setting and this will be considered as AN UNEXCUSED ABSENCE.**  
**As a member of the health care team, it is important to assume a similar manner of professional dress, appearance and conduct that will complement the other members of the team. Just like sports teams wear uniforms to emphasize the importance of “TEAM”, your appearance will alert others of your participation in their healthcare. Aspects that will need to be addressed should include:**  
1. White jacket with the TAM-HSC patch professionally attached on the front chest pocket.  
2. ID badges (TAMHSC) are a MUST. Your picture and name should be readily visible.  
3. Stethoscope, visual acuity card, H&P/SOAP Note card, paper and pen for notes.  
4. **Men:** Tasteful and professional tie, neat shirt and slacks, dress shoes (see below).  
5. **Women:** Similar professional dress that is considered non-provocative (see below).  
6. Footwear: Closed toes are OSHA required.  
7. Hair: Clean, neatly groomed and should not interfere with exams or procedures. Long hair should not be in face.  
8. Perfumes/scents: Consider avoiding strong odors as some patients are allergic or have migraines or breathing difficulties induced by strong smells.  
9. **No scrubs are to be worn during preceptorship activities (unless noted in Preceptor Directory), but especially not during OSCEs or clinic encounters.** |
| **College of Medicine Dress Code Policy**  
**A Student Developed Guideline**  
**Written for Students by Students** |  
**Dresses/Skirts**  
- These should be no more than 1 inch above the knee.  
- Slits should be no more than 1 inch above the knee.  
- Denim dresses and skirts are allowed.  
- **NO shorts/skorts.**  
**Pants**  
- Khaki, twill, and polyester blend pants are acceptable as long they are not “skin tight” and look professional.  
- **NO** denim jeans, stretch denim, spandex, overalls, capris, pedal-pushers or hip-huggers.  
- **NO** wind suits or sweat suits.  
**Blouses/Shirts**  
- Polo or denim shirts are acceptable.  
- **NO** tank tops or spaghetti straps.  
- **NO** see-through shirts are allowed without another shirt worn underneath.  
- **NO** t-shirts or shirts with advertising.  
- Shirts and blouses should meet or come below the waistband when you are standing with arms to your side.  
- **All** necklines should be modest and tasteful showing **NO** cleavage at all.  
**Shoes**  
- Non-canvas tennis shoes are acceptable in the OR setting and should be kept neat and clean.  
- Open back shoes are acceptable and do not have to be worn with hosiery.  

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- **NO** opened-toed shoes are allowed.
- **NO** “Doc Martin” type sandals/slides or canvas tennis shoes/slides.
- **NO** flip-flops, thong sandals, or beach shoes.

**Personal Hygiene/Miscellaneous**
- Perfume/powder/body sprays/cologne should be kept to an absolute minimum due to allergies of patients or co-workers.
- Hair should be clean, combed, and dry during work hours. Wet hair is not professional. No odd hair colors (i.e. purple, green, etc) or flamboyant/distracting hair styles (i.e. spiked Mohawks).
- Always present yourself in a professional manner.
- All visible body piercing, with the exception of ears, is unacceptable. All visible piercing paraphernalia, except for ears, will be removed during working hours, i.e. eyebrows, tongue, nose, etc. The **ONLY** exception to this rule is religious/cultural and must be cleared through Student Affairs first.
- All visible tattoos will have to be covered during working hours.
- No sunglasses are to be worn during clinical or simulation encounters unless prescribed by a physician.

Students may be informed of anything else deemed inappropriate by the clinic or course management team.

<table>
<thead>
<tr>
<th>Introductions</th>
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</thead>
<tbody>
<tr>
<td>Introduce yourself by your first and last name and state you are a medical student. It is your duty to gently correct other’s misperceptions should they refer to you as a “doctor”. Don’t let others lead you into misrepresenting your actual role on the team.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Equipment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students should bring their stethoscope, reflex hammer, visual acuity card, H&amp;P/SOAP Note card, paper and pen for notes during the preceptorship. Some Preceptors expect you to bring other instruments. Students should also check the Preceptor directory for specific instructions that the physicians have passed on to them. When students go to one of the hospitals to see a patient, they must wear their white medical jacket and a picture I.D (all clipped together). Students should check in at a nurses’ station to inform the hospital personnel that they are seeing a patient. Student will need all their own instruments at the hospital, as none are provided in patient rooms.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Clinical Rotations</th>
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</thead>
<tbody>
<tr>
<td>Students will have 2 Clinical Rotations during the Preceptorship, one in the Fall and one in the Spring. Each rotation will be five (5) weeks in length. During these rotations, students will interact with patients and their preceptor. During these clinical encounters, students will take a history and perform a physical examination on multiple patients. The student will improve patient care skills, oral presentation skills, communication skills, and clinical problem-solving.</td>
</tr>
</tbody>
</table>

Attend your scheduled five-week Clinical Rotations and perform to a satisfactory level. At the end of the rotation, remind your preceptor to complete the student evaluation form. Please complete the student evaluation of the preceptor form by the Rotation due date.

<table>
<thead>
<tr>
<th>Workshops</th>
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</thead>
<tbody>
<tr>
<td>Please see the Orientation Packet for detailed information about the course workshops.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Simulation Rotation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students will have two simulation rotations: one five-week Simulation Center Rotation in the Fall and another five week Simulation Center Rotation in the Spring. <strong>During the Simulation Center Rotation, your Tuesday/Wednesday afternoon schedule will vary. Please refer to your Personalized Preceptorship Schedule for your specific dates, however this is subject to change.</strong> During the Simulation Rotations, you will receive an email detailing your specific reporting time and locations for each activity along with any special instructions.</td>
</tr>
</tbody>
</table>

The simulation encounters will allow students to practice their history and physical examination skills in a simulated setting. Students will improve clinical decision making skills and engage in clinical problem solving of common pathologic presentations of disease. During the Simulation I and II rotation a Focused Patient Encounter Objective Simulated Clinical Encounter (OSCE) will be performed. All OSCEs are recorded so you can improve your next performance by reflecting

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on your patient encounter. The evaluation for the Fall and the Spring will be averaged together for a grade.

A Complete History & Physical Objective Simulated Clinical Encounter (OSCE) and a written Complete History & Physical will be performed in the Fall. The OSCE is graded using the Communication Skills checklist. The written H&P is peer-reviewed for your benefit or reviewed by faculty to identify students in need of remediation. A Complete History & Physical OSCE and a written Complete History & Physical will be completed in the Spring and graded by the faculty. (Please see Grading and Remediation Policies for grading details.)

It is recommended that students review their OSCE videos following each encounter. This video review is a self-learning experience and important to your educational development. Instructions to access your video are posted on Blackboard.

Students are required to complete an online evaluation of their Simulation Rotation activities on or before Rotation Due Date.

Please see the Orientation Packet for detailed information about the simulation rotation activities.

| Written Work Expectations | We expect detailed H&P's and S.O.A.P. notes that have **no missing components**. However, do not write anything that is not truthful in your write-ups. If you are unable to get a piece of information due to time constraints or the patient not knowing, please note this in your write up so we can see that you know it is incomplete. You can write down what “should” be in your note if it had been done but clearly indicate if it is “made up” rather than a report of your actual findings. Furthermore, do not cut and paste from a template into your written report. Learning to accurately communicate your interaction with a patient is a vital skill in medicine. Truthfully presenting your clinical encounter reflects your integrity as a physician. In order to provide standardized expectations for your work, your H&P’s and SOAP Notes will be graded using the format and grading rubric found on Blackboard. |
| Clinical Rotations S.O.A.P. or H&P Notes (Formative) | **FOR THE FORMATIVE WRITTEN WORK, IF YOU ARE ON HOSPITAL SERVICE YOUR H&P, DOES NOT HAVE COMPLETE COMPONENTS DUE TO TIME CONSTRAINTS.** During the Clinical Rotations, students will write a SOAP Note Or H&P, have their Preceptor review the written note, make any necessary comments and sign the note. The student will be required to submit the reviewed SOAP Or H&P Note to the Education Program Coordinator by Rotation Due Date. The SOAP Note or H&P must be signed by Preceptor.

If the SOAP Note or H&P is not acceptable to the Preceptor or Course Faculty who review it, the student will be required to re-write the SOAP Note or H&P with the suggested revisions. The student is required to submit the revised SOAP Note or H&P as well as the original SOAP Note or H&P the Education Program Coordinator on or before Rotation due date. |
| Recorded OSCE Focused Patient Encounter S.O.A.P. Notes | Students will write a total of **two SOAP notes** to be graded by a colleague for feedback immediately after each Focused Patient Encounter OSCE (during the Fall and Spring Simulation Rotations) or reviewed by faculty. |
| Recorded OSCE Complete H&P EXAM | Students will write a total of **two Complete History & Physicals** based on the patient: encounter in the Complete H&P OSCE. Those notes are written immediately after the OSCE encounter. (during the Fall and Spring Simulation Rotations). The Fall assignment will be peer-reviewed or faculty reviewed for feedback. **The Spring written assignment will be graded by faculty, worth 15% of total course grade,** using the format and grading rubric found on Blackboard. |
| Graded Final OSCE | A third S.O.A.P note will be written based on the Final Focused Patient Encounter OSCE and submitted to the faculty for grading and evaluation based on grading rubric found on Blackboard. |

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<table>
<thead>
<tr>
<th>S.O.A.P. Note</th>
<th>Worth 15% of total course grade.</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Suturing Workshop</th>
<th>Students will spend an afternoon during the Spring Simulation Rotation learning and practicing introductory/basic suturing skills.</th>
</tr>
</thead>
</table>

| Patient Care/Course Debriefings are mandatory. The first debriefing takes place after the first rotation. The time allows student dialogue with the Course Director and classmates about clinical experiences review of challenging clinical situations, trouble-shooting, review of tips for success in preceptorship, and advising after students have become familiarized with the program. The second Debriefing takes place at the end of the course and covers the entire year. |
|--------------------|----------------------------------------------------------------------------------------------------------------------------------|

<table>
<thead>
<tr>
<th>Due Dates &amp; Items Due</th>
<th>There will be four due dates through the year. If you are a “Tuesday” student, you are expected to turn your items in on the corresponding Tuesday due date no later than 5:00 pm. If you are a “Wednesday” student, you are expected to turn your items in on the corresponding Wednesday due date no later than 5:00 pm.</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Rotation Dates</th>
<th>Due Dates:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rotation 1 09/01/15 – 09/30/15</td>
<td>Tue 10/13  Wed 10/14</td>
</tr>
<tr>
<td>Rotation 2 10/13/15 – 11/18/15</td>
<td>Tue 12/01  Wed 12/02</td>
</tr>
<tr>
<td>Rotation 3 01/05/16 – 01/27/16</td>
<td>Tue 02/09  Wed 02/10</td>
</tr>
<tr>
<td>Rotation 4 02/06/16 – 03/02/16</td>
<td>Tue 03/2  Wed 03/23</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Items due:</th>
</tr>
</thead>
</table>

- Clinical Rotations (Fall & Spring) • One SOAP Note or H&P reviewed and signed by Preceptor (one in Fall/one in Spring) = 2 Total
- Two Preceptor Evaluation of Student. (includes professionalism components / one in Fall/one in Spring)
- Two Student Evaluation of Preceptor (one in Fall/one in Spring)
- Attendance Record signed by Preceptor each week

- Simulation Rotations (Fall & Spring) • Two written SOAP Notes (one in Fall/one in Spring) based on the Focused Patient Encounter OSCEs
- Two written Complete History & Physicals (one in Fall/one in Spring) based on Complete H&P OSCEs
- Online Student Evaluation of the Fall Sim activities
- Online Student Evaluation of the Spring Sim activities

Note: Following the OSCE encounters, students may contact the Education Program Coordinator to arrange a time to review their OSCE checklists and written assignments. The student may not take notes during the review.

If a Preceptor did not share the Clinical Evaluation of a Year 2 Student results with a student, they may contact the Education Program Coordinator to arrange a time to review the completed evaluation.

<table>
<thead>
<tr>
<th>General Duties and Responsibilities</th>
<th>You are responsible for completion of the required readings and for your overall self-education. We recommend: 1. Students read the objectives pertaining to each rotation in advance. 2. Students decide on two or three goals for their professional development during the clinical rotations. 3. Discuss these goals with the preceptor on the first day. 4. Students ask the preceptor for feedback each session, but certainly by the second session in a rotation. This gives you a chance to improve your performance and evaluation. 5. In the second to last session, students remind the preceptor about filling out the evaluation before or during last session. 6. In last session, students review the evaluation with the preceptor. The student will then submit the final evaluation to the Education Program Coordinator, or contact the Coordinator by email (if Preceptor is turning it in). We believe that you must develop problem solving and patient management skills in addition to</th>
</tr>
</thead>
</table>

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acquiring a sound base of clinical knowledge. Self-education will be a career-long responsibility and learning style for you as a physician. Our teaching methods are designed to promote these concepts.

| Needle Sticks and/or Exposure to Bodily Fluid | Notify Dr. Fallon in Student Affairs (254) 724-0242 or (512) 341-4920  
| Notify Dr. Fallon in Student Affairs (254) 724-0242 or (512) 341-4920  
| Go to ER for follow-up care and exposure management.  
| You will be assisted with filling out the proper paperwork.  
| Report to Charge Nurse or Supervising Nurse in your area immediately.  
| Notify the Preceptorship Director and Coordinator.  
| Additionally, a reminder that exposures include any contact to eye, mouth, other mucous membranes or non-intact skin with potentially infected materials, including blood. In other words, it is inclusive of much more than the ‘traditional’ needle stick. **If you are in doubt as to whether you have sustained an exposure, immediately ask your supervising faculty. |

| Whom to See If You Have a Problem | During the course various situations may develop for which you may want assistance. If general information is desired, educational materials are required, or general problems develop, your first contact will be the Preceptorship Education Program Coordinator for assistance. Any specific administrative problems which are encountered during the Preceptorship Course should be promptly directed to the Course Directors or the Regional Chair. Students are welcome to contact the above individuals or any member of the Department Faculty whenever they wish information, advice, or consultation. In cases where you do not feel that issues are being resolved within the departmental lines, please contact the Office of Student Affairs. |

| Confidentiality | Of course, patient confidentiality is demanded of health care professionals. This includes electronic information, which should be treated the same as paper information/charts. Information on electronic sources should not be accessed inappropriately. In addition, confidentiality of student examination materials is also required. Information contained on the Objective Structured Clinical Exam (OSCE) will not be discussed, copied, disseminated or shared by students and will be treated as patient information. Do not discuss patient care in hallways, elevators, stairwells, etc. Do not leave medical records lying around in unsecured areas (conference rooms, cafeteria, etc.) |

| Clinical Evaluation of 2nd Year Medical Student | The Clinical Evaluation of 2nd Year Medical Student is based on your preceptor’s judgment. The evaluations provide detailed descriptions of the behaviors, skills, and attitudes you demonstrate. Feedback on these evaluations can help you learn to do a better job in your next rotation and in third year. No two preceptors are exactly alike. Do your best but realize that it is not possible to make all faculties the same! Please let us know if you have a conflict or problem with a faculty member. For maximum learning, ask your Preceptor to give you feedback on things you do well and areas for improvement. Suggest this the first day and then ask for feedback at the end of each afternoon. **In the next to last session remind your preceptor to fill out the student evaluation.** Over the course of the year we expect you to use the Preceptor evaluations of your performance to help you improve your clinical skills and self-knowledge. As you gain more experience, you will be able to see patients more efficiently and formulate a more accurate assessment and plan. Professionalism will be a portion of your preceptor evaluation. Please be aware that if your preceptor gives you a “0” on any component of the professionalism portion of the evaluation, you will fail the professionalism component of the |
course. These professionalism evaluations comprise 2 of the 3 professionalism evaluations in the course.

**Professionalism Evaluations**

This course requires a high degree of personal responsibility and professionalism. It is also the first time (for some of you) to work in a medical setting with patients, physicians, nurse practitioners, and related staff. Creating rapport with patients, communicating effectively with others, and developing your professional style and identity are important aspects of the course. Our goal is to provide you with the best environment possible for your clinical experience.

Your integrity, honesty, and behavior as a physician-to-be are crucial to your success in this course and in your clinical work in the future. Please feel free to talk with us about any of these areas as you make your transition to clinical life.

Due to the importance of professionalism, the course directors may modify student grades based on an individual's professional behavior and conduct. Behavior guidelines are found in the College of Medicine Student Handbook.

Two Professionalism evaluations will be completed by your Preceptors during the Clinical Rotations. One will be completed at the end of the course based on your Simulation rotations and input from the Course Directors, Preceptorship Coordinator and Academic Affairs Office Staff.

These evaluations focus on six competency areas that pertain to professionalism (Altruism, Responsibility/Reliability/Accountability, Honesty/Integrity, Respectfulness, Commitment to Competence/Lifelong Learning, and Empathy/Compassion). We expect you to be excellent in all these areas. The following are descriptions of each area and expectations:

<table>
<thead>
<tr>
<th>Competency</th>
<th>Positives</th>
<th>Negatives</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Altruism</strong></td>
<td>Shows appropriate concern for others</td>
<td>Unwilling to extend self</td>
</tr>
<tr>
<td></td>
<td>Goes the “extra mile” without thought of personal reward</td>
<td>Selfless to the point of taking needless risks</td>
</tr>
<tr>
<td></td>
<td>Assists team members</td>
<td>Overextends self to one’s own detriment</td>
</tr>
<tr>
<td></td>
<td>Helps fellow students understand material</td>
<td>Refuses small group participation</td>
</tr>
<tr>
<td><strong>Responsibility/Reliability/Accountability</strong></td>
<td>Punctual and meets deadlines</td>
<td>Frequently arrives late/skips class</td>
</tr>
<tr>
<td></td>
<td>Follows policies and rules</td>
<td>Avoids extra work</td>
</tr>
<tr>
<td></td>
<td>Asks for help when necessary</td>
<td>Defensive, makes excuses, blames others</td>
</tr>
<tr>
<td></td>
<td>Admits errors</td>
<td>Inflexible on rules to the point of Obstructionism</td>
</tr>
<tr>
<td><strong>Honesty/Integrity</strong></td>
<td>Honest, forthright, trustworthy</td>
<td>Misrepresents position/status</td>
</tr>
<tr>
<td></td>
<td>Confronts inappropriate behavior in team members</td>
<td>Misuses/steals resources</td>
</tr>
<tr>
<td></td>
<td>Recognizes and avoids conflicts of interest</td>
<td>Overlooks inappropriate behavior in others</td>
</tr>
<tr>
<td><strong>Respectfulness</strong></td>
<td>Maintains neat/appropriate appearance</td>
<td>Poor hygiene/inappropriate dress</td>
</tr>
<tr>
<td></td>
<td>Respects authority in person, behind their back and in media (online)</td>
<td>Disrespectful attitude to team members</td>
</tr>
<tr>
<td></td>
<td>Respectful of cultures/beliefs/opinions</td>
<td>Appears arrogant or demeaning</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Criticizes colleagues/authority</td>
</tr>
<tr>
<td><strong>Commitment to Competence and Lifelong Learning</strong></td>
<td>Accepts and incorporates feedback</td>
<td>Afraid to act for fear of making errors</td>
</tr>
<tr>
<td></td>
<td>Participates with peers in group learning activities</td>
<td>Does not adequately participate in groups</td>
</tr>
<tr>
<td></td>
<td>Attentive and participates during</td>
<td>Dominates small group learning</td>
</tr>
</tbody>
</table>

Date created/Revised: 05/26/2015 By: K.Knighton
<table>
<thead>
<tr>
<th>lectures</th>
<th>activities</th>
</tr>
</thead>
<tbody>
<tr>
<td>Seeks additional learning opportunities</td>
<td>Attends to other matters during class (email)</td>
</tr>
<tr>
<td></td>
<td>Unprepared</td>
</tr>
<tr>
<td></td>
<td>Overly reliant on faculty to the detriment of self-learning</td>
</tr>
<tr>
<td><strong>Empathy and Compassion</strong></td>
<td></td>
</tr>
<tr>
<td>Sensitive to the world of the patient</td>
<td>Fails to recognize and address fear and suffering in patients and families</td>
</tr>
<tr>
<td>Remembers and cares about details in the lives of patients</td>
<td>Fails to consider social factors that may affect health of patients</td>
</tr>
<tr>
<td>Appears warm, engaged and sensitive</td>
<td>Loss of objectivity/overly emotional</td>
</tr>
<tr>
<td>Communicates bad news with empathy</td>
<td></td>
</tr>
</tbody>
</table>

The grade for the professionalism evaluation will be pass/fail. Please be aware that if you receive a “1” on any component of the professionalism portion of the evaluation rated by grader, the entire evaluation is considered failed and a referral will be made to the Student Promotions Committee.

Being in the right place at the appointed time ready to work is part of being a physician and part of your professionalism in this course.

**Additionally, if a student fails to perform in a professional and ethical manner, regardless of examination grades, it may be grounds for failure of the course or depending on the specific occurrence, a reduction of the student’s clinical grade.**

In order to satisfactorily complete the course, students are expected to punctually attend scheduled workshops, class debriefings, clinics, and all other scheduled activities.

Date created/Revised: 05/26/2015 By: K.Knighton
Other Pertinent Course Information

Learning Materials and Activities

Course materials are available online 24/7 on Blackboard.

Textbooks (Required and Recommended Resources)

The following books and case study materials will be used in this course.


* Differential Diagnosis of Common Complaints*; (5th ed); Seller, Robert

Americans with Disabilities Act (ADA)

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, in Cain Hall, Room B118, or call 845-1637. For additional information visit [http://disability.tamu.edu](http://disability.tamu.edu)

Any student with a disability who needs accommodation should inform the instructor at the beginning of the course.

Academic Integrity

*For additional information please visit: [http://aggiehonor.tamu.edu](http://aggiehonor.tamu.edu)*

*An Aggie does not lie, cheat, or steal, or tolerate those who do.*

College of Medicine

Professionalism and integrity Statement (Academic Honesty and Plagiarism)

All College of Medicine students are required to comply with the student code of conduct and the academic integrity and honesty standards published in each component’s Student Handbook. Disciplinary action will be taken in accordance with the policies of each component. Students found guilty of Academic Dishonesty will receive an “F”/Unsatisfactory in the course. For a full list of actions qualifying as academic dishonesty, please review the College of Medicine Student Handbook at [http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf](http://medicine.tamhsc.edu/student-affairs/docs/handbook.pdf).

According to the Aggie Honor System Office, plagiarism is defined as the appropriation of another person’s ideas, processes, results, or words without giving appropriate credit. Intentionally, knowingly, or carelessly presenting the work of another as one’s own (i.e., without crediting the author or creator). Plagiarism and other academic misconduct definitions can be viewed on the Aggie Honor System Office website; [http://aggiehonor.tamu.edu/ RulesAndProcedures/HonorSystemRules.aspx#definitions](http://aggiehonor.tamu.edu/RulesAndProcedures/HonorSystemRules.aspx#definitions).

E-mail Access and FERPA

The College of Medicine is communicating all official information to students through the students’ TAMHSC e-mail accounts. Please check the account frequently during the semester for updates.

This course is supported with web-based and/or e-mail activities. In order to take advantage of these additional resources and participate fully in the course, you have been assigned an e-mail address by the Texas A&M Health Science Center. This e-mail address is for internal use only, so that faculty may communicate with you and the entire class. By registering for this course, you are

Date created/Revised: 05/26/2015 By: K.Knighton
agreeing to allow your classmates to have access to this e-mail address. Should you have any questions, please contact the TAMU's Office of the Registrar at 979-845-1031.

The Family Educational Rights and Privacy Act of 1974 (FERPA), which the HSC complies fully, is intended to protect the privacy of education records, to establish the rights of students to inspect and review their education records and to provide guidelines for the correction of inaccurate or misleading data through informal and formal hearings. Students also have the right to file complaints with the Family Educational Rights and Privacy Act Office of the Department of Education in Washington, D.C., concerning alleged failures by the HSC to comply with the act.

Mistreatment of Students

The College of Medicine is committed to providing a positive learning environment in which students can meet their academic goals based on mutual respect in the teacher/learner relationship. Both parties must be sensitive to the needs of others and differences in gender, race, sexual orientation, religion, age or disability. As outlined in the Student Handbook under the section titled Standards of Conduct in the Teacher-Learner Relationship, belittlement, intimidation and humiliation are unacceptable for effective learning and undermine self-esteem. Breaches involving student mistreatment may result in a faculty or staff member being sanctioned or the loss of faculty and/or staff appointment. These policies address student mistreatment involving College of Medicine employees, residents, affiliate staff, or patients. Mistreatment may be reported through the College of Medicine telephone hotline, 1(855)-397-9835 or through an online form at http://medicine.tamhs.edu/current/student-mistreatment-form.html. For a full list of reporting avenues, please refer to the Student Handbook under the Mistreatment Policy.

Exposure and Occupational Hazard

The Needle Stick Policy and Bloodborne Pathogen Exposure information for Medical Students may be accessed in the Student Handbook at: http://medicine.tamhs.edu/student-affairs/docs/handbook.pdf

Note: More information is available on the aforementioned topics to all students on the College of Medicine website.

<table>
<thead>
<tr>
<th>Evaluations:</th>
</tr>
</thead>
<tbody>
<tr>
<td>A. Schedule</td>
</tr>
<tr>
<td>B. Clinical Evaluation of Year 2 Medical Student (Clinical Rotations)</td>
</tr>
<tr>
<td>C. Evaluation of Student Professionalism (Faculty/Coordinator/Academic Affairs Office Staff)</td>
</tr>
<tr>
<td>D. Student Evaluation of Preceptor (Clinical Rotations / completed via One45)</td>
</tr>
<tr>
<td>E. Statement of Understanding</td>
</tr>
</tbody>
</table>

*THIS IS SAMPLE SCHEDULE. PLEASE SEE PERSONALIZED SCHEDULE. PLEASE SEE YOUR EMAIL FOR LAST MINUTE SCHEDULE CHANGES FROM YOUR CAMPUS COORDINATOR.*

<table>
<thead>
<tr>
<th>Dates</th>
<th>Student Group A</th>
<th>Student Group B</th>
<th>Student Group C</th>
<th>Student Group D</th>
</tr>
</thead>
<tbody>
<tr>
<td>4</td>
<td>[Tue] Course Orientation (And Male Orientation- Bryan Only) (All students) 8am-10am</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Aug</td>
<td>[Wed] Oral Presentation Workshop – Session #1</td>
<td>[Female Breast/PAP/Pelvic Exams - Session #1 B]</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>[Thur] Practice Focused Patient Encounter - Session #1</td>
<td>[Female Breast/PAP/Pelvic Exams - Session #2 B]</td>
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<td></td>
</tr>
</tbody>
</table>

Date created/Revised: 05/26/2015 By: K.Knighton
<table>
<thead>
<tr>
<th>Date</th>
<th>Event</th>
</tr>
</thead>
<tbody>
<tr>
<td>11-Aug</td>
<td>Practice Focused Patient Encounter - Session #2</td>
</tr>
<tr>
<td>13-Aug</td>
<td>Oral Presentation Workshop - Session #2</td>
</tr>
<tr>
<td>18-Aug</td>
<td>Practice Focused Patient Encounter - Session #3</td>
</tr>
<tr>
<td>22-Aug</td>
<td>Oral Presentation Workshop - Session #3</td>
</tr>
<tr>
<td></td>
<td>(Evening Male Genitalia Exam - Session #1 S&amp;W Clinic B)</td>
</tr>
<tr>
<td></td>
<td>(Female Breast/PAP/Pelvic Exams - Session #5 B)</td>
</tr>
<tr>
<td>25-Aug</td>
<td>Practice Focused Patient Encounter - Session #4</td>
</tr>
<tr>
<td></td>
<td>(Female Breast/PAP/Pelvic Exams - Session #6 B)</td>
</tr>
<tr>
<td>6-Oct</td>
<td>Clinical Rotation – Fall I (Tues/Wed)</td>
</tr>
<tr>
<td></td>
<td>1 SOAP Note or 1 H&amp;P (Reviewed by Preceptor)</td>
</tr>
<tr>
<td>3-11 Nov</td>
<td>Clinical Rotation – Fall I (Tues/Wed)</td>
</tr>
<tr>
<td></td>
<td>1 SOAP Note or 1 H&amp;P (Reviewed by Preceptor)</td>
</tr>
<tr>
<td></td>
<td>[Wed] Complete H&amp;P Review Workshop</td>
</tr>
<tr>
<td></td>
<td>Group C Tue Students</td>
</tr>
<tr>
<td></td>
<td>[Wed] Complete H&amp;P Review Workshop</td>
</tr>
<tr>
<td></td>
<td>Group D Tue Students</td>
</tr>
<tr>
<td></td>
<td>[Wed] Complete H&amp;P Review Workshop</td>
</tr>
<tr>
<td></td>
<td>Group 2 Wed Students</td>
</tr>
<tr>
<td>10-Nov</td>
<td>[Tues] Complete H&amp;P OSCE</td>
</tr>
<tr>
<td></td>
<td>Group A Tue Students</td>
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<tr>
<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<tr>
<td></td>
<td>Group A Wed Students</td>
</tr>
<tr>
<td></td>
<td>[Wed] Clinical Rotation – Fall II (Tues/Wed)</td>
</tr>
<tr>
<td></td>
<td>1 SOAP Note or 1 H&amp;P (Reviewed by Preceptor)</td>
</tr>
<tr>
<td></td>
<td>[Tues/Wed]</td>
</tr>
<tr>
<td></td>
<td>1 SOAP Note or 1 H&amp;P (Reviewed by Preceptor)</td>
</tr>
<tr>
<td>17-Nov</td>
<td>[Tues] Focused Patient Encounter OSCE</td>
</tr>
<tr>
<td></td>
<td>[Wed] Focused Patient Encounter OSCE</td>
</tr>
<tr>
<td>24-Nov</td>
<td>[Wed] Small Group OSCE</td>
</tr>
<tr>
<td>1-Dec</td>
<td>[Tues] Remediation OSCE Exam (from Complete OSCE/Focused Patient Encounter OSCE Exams)</td>
</tr>
<tr>
<td>8-Mar</td>
<td>(SpRING SEMESTER)</td>
</tr>
<tr>
<td></td>
<td>Clinical Rotation – Spring I (Tues/Wed)</td>
</tr>
<tr>
<td></td>
<td>1 SOAP Note or 1 H&amp;P (Reviewed by Preceptor)</td>
</tr>
<tr>
<td>12-Mar</td>
<td>Clinical Rotation – Spring I (Tues/Wed)</td>
</tr>
<tr>
<td></td>
<td>1 SOAP Note or 1 H&amp;P (Reviewed by Preceptor)</td>
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<tr>
<td></td>
<td>[Wed] Focused Patient Encounter OSCE</td>
</tr>
<tr>
<td></td>
<td>[Wed] Focused Patient Encounter OSCE</td>
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<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group D Tue Students</td>
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<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td>Group D Wed Students</td>
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<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group C Tue Students</td>
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<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group C Wed Students</td>
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<tr>
<td>23-Mar</td>
<td>[Tues] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group B Tue Students</td>
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<tr>
<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group B Wed Students</td>
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<tr>
<td>24-Mar</td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group A Tue Students</td>
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<tr>
<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group A Wed Students</td>
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<tr>
<td>1-Mar</td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<td></td>
<td>Group A Tue Students</td>
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<tr>
<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
</tr>
<tr>
<td></td>
<td>Group A Wed Students</td>
</tr>
<tr>
<td>2-Mar</td>
<td>[Wed] Complete H&amp;P OSCE</td>
</tr>
<tr>
<td></td>
<td>Group B Tue Students</td>
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<tr>
<td></td>
<td>[Wed] Complete H&amp;P OSCE</td>
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<tr>
<td></td>
<td>Group B Wed Students</td>
</tr>
<tr>
<td>8-Mar</td>
<td>[Wed] Small Group OSCE</td>
</tr>
<tr>
<td></td>
<td>[Wed] Small Group OSCE</td>
</tr>
<tr>
<td></td>
<td>Clinical Rotation – Spring II (Tues/Wed)</td>
</tr>
<tr>
<td></td>
<td>1 SOAP Note or 1 H&amp;P (Reviewed by Preceptor)</td>
</tr>
<tr>
<td></td>
<td>[Wed] Patient Care/Course Debriefing #4 (ALL STUDENTS)</td>
</tr>
<tr>
<td></td>
<td>Spring Break</td>
</tr>
</tbody>
</table>

Date created/Revised: 05/26/2015 By: K.Knighton
<table>
<thead>
<tr>
<th>Date</th>
<th>Event</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>22</td>
<td>[Tues] Opportunity Time</td>
<td></td>
</tr>
<tr>
<td>23</td>
<td>[Wed] Clerkship Readiness: Written Notes (ALL STUDENTS) - 2 hours</td>
<td></td>
</tr>
<tr>
<td>29</td>
<td>Mar</td>
<td>[Tues &amp; Wed] Opportunity Time</td>
</tr>
<tr>
<td>5</td>
<td>Apr</td>
<td>Final Exam OSCEs</td>
</tr>
<tr>
<td></td>
<td>[Tues &amp; Wed 1/2 class] Faculty Graded SOAP Note</td>
<td></td>
</tr>
<tr>
<td>12</td>
<td>Apr</td>
<td>Final Exam OSCEs</td>
</tr>
<tr>
<td></td>
<td>[Tues &amp; Wed 1/2 class] Faculty Graded SOAP Note</td>
<td></td>
</tr>
<tr>
<td>26</td>
<td>[Wed] REMEDIATION OSCE if needed</td>
<td>1:00 pm - 5:00 pm</td>
</tr>
</tbody>
</table>

Date created/Revised: 05/26/2015 By: K.Knighton
March 31, 2015

MEMORANDUM

To: Dr. Mark Zoran
Chair, Graduate Council

cc: Sandra Williams
Associate Director
Office the Registrar

cc: Ruth Smith
Associate Registrar
School of Law

From: Maxine M. Harrington
Associate Dean for Academic Affairs
School of Law

Re: Inactivation of Law School Courses

The law school requests that the following courses be inactivated for the 2015-2016 academic year. ABA accreditation standards allow law schools to publicly list only current curricular offerings, defined as those offered in the current and past two academic years.

LAW 7571 Analytical Methods for Lawyers
LAW 7107 Art Crimes
LAW 7468 Constitutional Issues in Environmental Law Seminar
LAW 7618 Fair Use Seminar
LAW 7382 International Environmental Law
LAW 7376 Local Government Law
LAW 7637 Queer Law Seminar
LAW 7667 Refugee & Asylum Law Seminar
LAW 7651 Religion and the Law Seminar
LAW 7500 Sports Law
Memorandum

To: Dr. Tim Scott, Chair UCC
From: Dr. Donna Lang, TAMUG
Date: June 1, 2015
Subject: Texas Maritime Academy- Deck Officer License Requirements

As we discussed on Friday, I sincerely appreciate your support. I fully realize the difficulty of curriculum changes in such a short timeline. These changes are precipitated by an audit by the federal Maritime Administration and the United States Coast Guard and subsequent follow-up meeting that occurred in May. We (TAMUG) have made a strong argument that we have one license option program for deck officers irrespective of the academic degree. The deck officer program can be combined with the BS in Marine Transportation, BS in Marine Sciences, BS in Marine Biology and all TAMUG graduate programs (MMRM, MARB, and MMAL). In the case of the graduate programs, the student fulfills all degree requirements separately from participation in the license option program. No changes are required in any graduate program to embed these changes in the license. In the case of the undergraduate curricula, changes are needed so that credit hours are not increased. The proposed changes are listed below. In the case of marine transportation and marine biology, the changes are solely within the coursework applied to the license. In the case of marine science, there are two other changes in order to maintain credit hours. These changes have been fully reviewed by the curriculum committee at the department level and approved by their respective department heads. The changes have been discussed and approved by the Chief Academic Officer. In closing, I will assume full responsibility for corrections to the Galveston catalog as well as the degree evaluation system.

**Overall License Requirement Changes:**

- Add MART 201 Naval Architecture I
- Add MART 202 Naval Architecture II
- Can make MART 305 Construction and Stability optional with addition of MART 202
- Some changes in sequence of courses needed to facilitate cruise experiences
**Marine Transportation - License Required:**
- Only changes in order and notes. No curricular changes needed.

**Marine Biology - License Option:**
- Add MART 201 to freshman year (Shift history elective to later) (+3)
- Change MART 305 to Either MART 202 or 305 (0)
- Delete NVSC 402 (-3)
- Degree remains at 151 sch.

**Marine Sciences - License Option:**
- Add MART 201 to freshman year (+3)
- Change MART 305 to Either MART 202 or 305 (0)
- Delete NVSC 402 (-3)
- Add MART 304 Electronic Navigation (+2) previously inconsistent with license program
- Remove BIOL112 (-4)
- Add MARS 101 (+1)
- Add MARS 281 (+1)
- Degree remains at 138 sch.
To:       Dr. Patrick Louchouarn, Vice President for Academic Affairs; Chief Academic Officer; Associate Provost of Texas A&M University
         Dr. Donna Lang, Vice President Academic Operations
         Colonel Richard Mallahan, Deputy Superintendent & Chief of Staff
         Ms. Nicole Kinslow, Director of Graduate Studies

From:     Capt. Augusta Roth, Department Head of Marine Transportation & Executive Director of STCW & Academics, Texas A&M Maritime Academy

Date:     May 18, 2015

RE:        Deck Officer License Option Programs

Recent discussions with USCG National Maritime Center resulted in an urgent request for Texas A&M University Maritime Academy to update the Deck Officer License Option Program to reflect the mandated national and international maritime regulated requirements. In order to align the license option to the academic programs including the BS in Marine Transportation, BS in Marine Sciences, BS in Marine Biology and all graduate programs (MMRM, MARB, and M/MAL), the following courses are required to meet the licensing and credentialing governing bodies: MARAD, USCG, and STCW 2010 for all graduates in 2017 and thereafter.

Shoreside Courses:
MART 103 Basic Safety and Lifeboatman
MART 201 Naval Architecture I
MART 202 Naval Architecture II
MART 203 Seamanship I
MART 204 Terrestrial Navigation
MART 301 Seamanship II
MART 303 Celestial Navigation
MART 304 Electronic Navigation
MART 306 RADAR/ARPA/ECDIS
MART 307 Global Marine Distress Safety System
MART 312 Marine Cargo Operations I
MART 321 Maritime Law I
MART 406 Marine Cargo Operations II
MART 410 Bridge Watchstanding
MART 498 Maritime Medical Care

Building 3001, Room 106
P. O. Box 1675
Galveston, TX 77553-1675

Tel. 409-740-4471 Fax. 409-740-4985
rotha@tamu.edu
Cruises
MART or NAUT 200 Basic Communications, Navigation and Seamanship
MART or NAUT 300 or MART 350 Intermediate Communications, Navigation, and Seamanship or Commercial Cruise Internship
MART or NAUT 400 Advanced Communications, Navigation, and Seamanship

MARAD 46 CFR 310
NVSC 200 Naval Science for the Merchant Marine Officer

These courses complete the required training which includes Basic Safety Training, Ratings Performing a Navigational Watch, First Aid Provider, Officer in Charge of a Navigational Watch, and validation of the required national knowledge in 46 CFR 11.910. Further requirements are set forth in 46 CFR 310, which require License Option students to participate in the maritime training program for 3 full years, obtain mandated number of sea days, pass the 3rd mate unlimited license, complete the degree, and follow the Texas Maritime Academy Standard Operating Procedures as prescribed in program approval or any of its amendments.

Sincerely,

Capt. Augusta "Gussie" D. Roth