WINONA STATE UNIVERSITY
NOTIFICATIONS

Department: Mathematics and Statistics  Date: 3/31/2014

If the proposed curricular change involves existing courses and is considered a Notification, complete and submit this form. Refer to Regulation 3-4, Policy for Changing the Curriculum, for complete information on submitting proposals for curricular changes.

Please check type of change(s):

- Reduction in course number
- Change in course title
- Change in prerequisites
- Change in grading option
- Change in course description
- Change in hours or credits in an independent study course
- Change in existing major, minor, option, concentration, etc.

A. Current Course Information

<table>
<thead>
<tr>
<th>Course No.</th>
<th>Course Title</th>
<th>Credits</th>
</tr>
</thead>
</table>

This proposal is for a(n)  Undergraduate Course  Graduate Course

Applies to  Major  Minor

Required  Elective

Required  Elective

Prerequisites

Grading  Grade only  P/NC only  Grade and P/NC Option

Frequency of offering

Proposed Course Information. (Please indicate only proposed changes below.)

<table>
<thead>
<tr>
<th>Course No.</th>
<th>Course Title</th>
<th>Credits</th>
</tr>
</thead>
</table>

Prerequisites

Grading  Grade only  P/NC only  Grade and P/NC Option

Frequency of offering

Effective date (normally the next semester)

B. *If the proposal requests a change in the course description, please attach a description of the change requested and list both the current and proposed course description. If the proposal requests a change in an existing major, minor, option, concentration, etc., please attach a description of the change(s) requested and list both the current and proposed program listings.

Approved by the Department

[Signature]
Department Chair
Department Chair

Date: 4/8/14

e-mail address

Notification to the College Dean

[Signature]
Charles Mutschler
Dean of College

Date: 4/15/14

Presented at A2C2 meeting on

Date

Chair of A2C2

Presented at Graduate Council meeting on (if applicable)

Date

Chair of Graduate Council

Submitted to Registrar on

Date

Registrar: Please notify department chair via e-mail that Notification has been recorded.

*If a dean has comments on a notification, the dean shall forward the comments to the department.  [Revised 7-13-11]
<table>
<thead>
<tr>
<th>Existing Statistics Minor</th>
<th>Proposed Statistics Minor</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Two-course Introductory Sequence Required (6 S.H.)</strong>&lt;br&gt;A two-course introductory sequence is required and must be chosen from the following:</td>
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</tr>
<tr>
<td>First course (3 S.H.): STAT 110, 210, 303, 305; PSY 231; or ECON 222</td>
<td>First course (3 S.H.): STAT 110, 210, 303, 305; PSY 231; or ECON 222</td>
</tr>
<tr>
<td>Second course (3 S.H.): STAT 310; or ECON 322</td>
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</tr>
<tr>
<td>Other courses may be substituted with permission of the chair of the Mathematics and Statistics Department.</td>
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<tr>
<td><strong>ELECTIVES (12 S.H.)</strong>&lt;br&gt;At least 6 S.H. must be chosen from STAT 320 or higher.</td>
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</tr>
<tr>
<td>Up to 6 S.H. can be chosen from the following:</td>
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</tr>
<tr>
<td>BIOL 310, 312, 405, 415, 420</td>
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</tr>
<tr>
<td>CS 341, 368, 369, 385, 469</td>
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</tr>
<tr>
<td>ECON 312, 340</td>
<td>DSCI 210, 310, 325, 425</td>
</tr>
<tr>
<td>GEOS 316, 470</td>
<td>ECON 312, 340</td>
</tr>
<tr>
<td>FIN 335, 340</td>
<td>GEOS 316, 470</td>
</tr>
<tr>
<td>HERS 390, 403, 412, 489</td>
<td>FIN 335, 340</td>
</tr>
<tr>
<td>MKTG 334, 343, 348</td>
<td>HERS 390, 403, 412, 489</td>
</tr>
<tr>
<td>MATH 313, 332, 337, 342, 430, 435, 452, 453</td>
<td>MKTG 334, 343, 348</td>
</tr>
<tr>
<td>NURS 354, 375</td>
<td>MATH 313, 332, 337, 342, 430, 435, 452, 453</td>
</tr>
<tr>
<td>POLS 280</td>
<td>NURS 354, 375</td>
</tr>
<tr>
<td>PSY 308, 350, 408</td>
<td>POLS 280</td>
</tr>
<tr>
<td>SOC 378</td>
<td>PSY 308, 350, 408</td>
</tr>
<tr>
<td>Other courses may be substituted with permission of the chair of the Mathematics and Statistics Department.</td>
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</table>

SOC 376: Introduction to Social Research is being added to the elective list and was inadvertently left off the original list of elective courses. This course has enough statistical content to be used as an elective.
Announcements
1) MUDAC 2014 is this weekend April 5th & 6th
   More volunteers are NOT needed.

2) Transfer Registration – April 7th (10:00 am – 1:00 pm)
   I need a volunteer to help with transfer registration from 11:00 – 12:00 this coming Monday. We have two transfer students who are majors within our department and also there will be the usually placement related questions. I can be there from 10:00 – 10:50 and from 12:00 – 1:00.
   Barry volunteered to cover both periods.

Committee Reports
• Equipment/Software
  No report.

• Seminar, Library, & Colloquium (SLAC)
  (i) The Judith Rameley Celebration is on 4/16, from 1-5. Check out the posters our students have done.
  (ii) The last seminar will be on 4/30.

• Mathematics Subgroup
  No report.

• Mathematics Education Subgroup
  See motion.

• Statistics Subgroup
  See motions.

• Student Opportunities and Social Activities (SOSA)
  (i) They are still reviewing scholarship info. Committee members please send Lee your rankings by 11 a.m. tomorrow.
  (ii) Everyone, please send any details you might know about students’ accomplishments to Eric ASAP.
  (iii) The awards banquet will be on 4/15 from 6:30 to 8:00. Watch for emails giving further details.

At this point, Eric moved, seconded by Jeff, to provide the same amount of money as last year to pay for this banquet. The motion passed.

• Communications Committee
  No report.

• Mathematics Placement Task Force
  No report.

• Renovations Taskforce
  They be meeting tomorrow with a rep from Schmidt Goodman.

• MAC
  The MAC is looking for tutors. Applications are available in the office. The application deadline is 4/11.

• Fixed Term Search
  The ads are out.

• GEP Assessment Task Force
  See motions.
Department Representatives
- A2C2 & GEP
  No report.
- Teacher Education Assembly (TEA)
  No report.

NEW BUSINESS
1) Minutes from 3/20/14 & 3/24/14
   Joyati moved, seconded by Eric, to approve both sets of minutes as written. The motion passed.

   At this point, Joyati moved, seconded by Eric to consider the following item (Item 4 on the original agenda).

2) Departmental Distinguished and Outstanding Graduates
Mathematics
   Distinguished – Shaun Miller

Mathematics Education
   Distinguished – Tyler Zemla

Statistics
   Distinguished – Jaron Arbet

Outstanding
   Dylan Abts, Jaron Arbet, Steven Christiansen, Sonja Dery, Erin Kappers, Shannon Kouba, Samantha Langworthy, Shaun Miller, Philip Robey, Kayla Thurk, Tyler Zemla

   Joyati moved, seconded by Eric, that these honors be awarded as indicated. This motion passed.

   At this point, without objection, the department turned to considering the following (Item 3 on the original agenda).

3) Proposed Changes to Mathematics Education Program
Motion: The MTED subgroup proposes to change the MTHT major to include:
Math 117 (4 credits)
Stat 310 (3 credits)
New Math Discrete course (3 credits) to be created by Math Subgroup

   With the additional courses above the following requirements would be eliminated:
Math 447 Abstract Algebra (3 credits)
Math 452 Advanced Calc (3 credits)
Math/Stat Electives (4 credits)

   After some discussion, this motion passed, with the understanding that the new discrete math course would be carefully designed to cover all of the content required by the standards that is not covered elsewhere.

   At this point, without objection, the department turned to considering the following (Item 5 on the original agenda).

4) Motions from GEP Assessment Task Force
(see attached document for additional rationale)

Motion 1: Regarding Goal Area 4 Courses
Every instructor who teaches a GEP Goal 4 course is requested to assess his/her students in the four competencies listed under that goal; and to send a summary of results to the department chair, as soon after the relevant semester ends as is conveniently possible. Subgroups are strongly encouraged to bring forward suggestions to the department on how to standardize the reporting of these summary results so that they can be most conveniently blended together.

The following list gives all of our courses currently in Goal 4 that were rolled over from USS.
MATH 100 - Survey of Mathematics
MATH 110 - Finite Mathematics
MATH 112 - Modeling with Functions
MATH 115 - College Algebra
MATH 120 - PreCalculus
MATH 130 - Matrix Algebra
MATH 140 - Applied Calculus
MATH 202 - Elements of Mathematics
MATH 212 - Calculus I
MATH 213 - Calculus II
STAT 110 - Fundamentals of Statistics
STAT 210 - Statistics

After some discussion, this motion passed, with the understanding that actual data collection need not start until Fall, 2014, but it should start then.

Motion 2: Writing-Intensive Courses
Every instructor who teaches a writing intensive course is requested to base a substantial part of a student’s grade on writing projects, each of which provides for “helpful” feedback from two or more people.

Definition of “helpful” above:
In response to a question from Tisha at the last GEP meeting, that group officially confirmed that a course CANNOT count as a writing intensive unless, for a substantial amount of work,
(i) students receive feedback from at least two people; and
(ii) that feedback is “helpful”.

By helpful, they mean that the student must be able to use the feedback to do better on other assignments in the course. The most obvious strategy for ensuring that feedback is “helpful” is to require that the student revise the original document, and re-submit it for a grade. However, if the student will be given two or more substantially similar assignments, then the feedback from the first can be “helpful” for the others -- provided, of course, that the student receives that feedback before he/she has to do the others.

GEPs also reaffirmed that a major project that is submitted at the end of the semester, without opportunity for feedback that is “helpful” does not fulfill the requirements for a writing-intensive course.

After some discussion, this motion passed, with the understanding that the secretary would include the list of our writing-intensive course in the minutes. According to the on-line WSU Catalog, those courses are as follows:
MATH 447 - Abstract Algebra I
MATH 452 - Advanced Calculus I
MATH 306 - Teaching Mathematics in the Secondary Schools
STAT 450 - Introduction to Mathematical Statistics I
STAT 460 - Introduction to Mathematical Statistics II

Motion 3: Accountability
Subgroup chairs, in coordination with the department chair, will be responsible for ensuring that all data are entered, and all paperwork submitted by the official deadline for GEP renewal in F14. They will also be responsible for securing any necessary departmental approval in a timely manner.

After some discussion, this motion passed, with the understanding that the subgroups do NOT have to do all of the work themselves; they are simply responsible for ensuring that it gets done in time.

At this point, without objection, the department turned to considering the following (Item 6 on the original agenda).

5) Motions from Statistics Subgroup

Motion 1: Statistics Minor Notifications
Add SOC 376 as possible elective within the Statistics Minor.
This motion was passed by unanimous consent.

Motion 2: One-time Course Offering STAT 355 – formerly STAT 350 (see attached document)
In Fall 2014 the department will offer a one-time course offering STAT 335 – Study Design in lieu of STAT 350 – Design of Samples & Surveys. It is currently planned to formerly change STAT 350 into a permanent course (STAT 335) next year.

One-time Course Offering Details:
Description: This course will introduce students to the research cycle and the various types of studies that can be utilized to answer particular research questions of interest. Students will learn the basic elements of conducting an experiment, the basics of designing and implementing a survey study, human subjects research, and possible bias which might be encountered.
Indicate why it is important to offer this course: This course is being created to fill a gap in our current curriculum. This course will introduce students to the research cycle and the various types of studies that can be utilized to answer particular research questions of interest. Students will learn the basic elements of conducting an experiment, the basics of designing and implementing a survey study, human subjects research, and possible bias which might be encountered. This course is important for our majors because this course focuses more on the first steps in conducting a study, whereas our other courses focus more on the analysis and reporting of a study that has already taken place. This course is also useful for students from other disciplines who perform research studies.

After some discussion to the effect that removing STAT 350 from the offerings at this time would require quite a few students to change their registration for F14 to include a different course meeting Goal Area 9, April moved, seconded by Tisha, to set consideration of this motion aside until further notice.

The department did not take up the following (Item 2 on the original agenda).

6) Motion from Mathematics Group
The department will seek approval to convert one departmental fixed-term position to a tenure-track position in Mathematics.

7) Adjourn
Eric moved, seconded by April, to adjourn at about 1:45. No objection was heard to this.

Respectfully submitted,
Jeff Draskoci-Johnson