# NEW MEXICO INSTITUTE OF MINING AND TECHNOLOGY

# FACULTY SENATE MEETING Tuesday, March 6, 2012 Workman 101 4:00 p.m. Minutes

Brian Borchers Called the meeting to order at 4:02 asking for approval of the minutes of the February 7, 2012. Dr. Liebrock so moved, it was seconded by Dr. Kieft. There was no discussion and the motion passed.

#### **Announcements:**

a. **Academic Affairs** – Dr. Gerity spoke about the budgets anticipated from the Legislature as described in the cabinet meeting from Dr. Lopez.

Bond issue for Capitol improvements are going forward.

Higher Education will see an increase of approximately \$39M across the board. This represents a 20% reduction of where we started 5 years ago. Four year institutions are absorbing 97% of these cuts while community colleges only felt a 3% cut. A proposal to reduce our budget by 5% was defeated. A portion of tuition credit taken every year by the state will go away, increasing our budget. That should amount to about 5% increase.

Dr. Lopez has called for a salary increase pool of 2%. This amounts to a marginal cost of living increase. In order to accomplish that, he is asking for about a 4% increase in tuition. The Student Association is drafting legislation to be acted on through the Student Senate. The Student Senate will be voting on March 6 to go forward as a recommendation to the Board of Regents at the March 30<sup>th</sup> meeting.

The March Regent's meeting will include promotion and tenure recommendations.

Public service programs are flat with the exception of Science Fair and Science Olympiad. These budgets have been reduced. President Lopez is supporting the programs through his budget to make up the cut from the State. Finally the State has agreed to restore the 1.75% of additional retirement withholding.

Mary Dezember announced the success of the SRS and thanked the chairs and advisors. The committee received 47 registrations, resulting in 97 student presenters.

b. 1<sup>st</sup> Year Advising – B. Borchers explained the new HSI-STEM grant will support advising for students new to the NM Tech campus. This applies to both new freshman and new transfer students. Participation will include stipends for faculty. Stipends depend on the number of students to be advised. Stipends can be split. Chairs are asked to nominate faculty. Early intervention will be available through Star Fish. The participants will receive 20 hours of

- training. Brochures are available explaining the program, contact the HSI-STEM office for more information.
- c. Workflow procedures Dr. Liebrock announced there are now 2 work flows completed, one for change of committee and one for new committees. Training is set up. A doodle scheduler will come from the Academic Affairs office. Any faculty who has received the training will be paid a stipend of \$50. Only RSVP to one training. The resulting emails will provide information on active committees and who else is serving on any given committee.
- d. Lillian Armijo announced the Career Services team is holding an Etiquette Dinner and Fashion Show. This is a training opportunity for students to know how to behave in recruiting situations. Invitations for the March 28<sup>th</sup> event are being mailed.
- e. Dr. Ostergren introduced Visiting Assistant Professor, Dr. Michael Hargather, who joins us from Penn State. Dr. Hargather is active in the areas of fluid/thermal behavior, explosives and optical visualization of shock waves.
- f. I. Davidson introduced Jordana George, the new director of Community Education. She brings an MFA from UC Davis and an MBA from Penn State. Work experience includes management in the private sector and public sector, most recently at Austin Independent School District.
- g. Dr. Morales Juberias announced the honorary degrees and awards committee is seeking nominations for the Langmuir award. For more info go to: <a href="http://physics.nmt.edu/~raul/HDA/">http://physics.nmt.edu/~raul/HDA/</a>
- h. Dr. Borchers announced the Distinguished Research Award committee is seeking nominations. Contact Rick Aster to forward nominations for consideration.

#### 4. Committee Reports.

a. Space Utilization – Dr. J. Starrett reported the purpose of the committee is to advise administration on use and availability of space. This is a difficult task. The space survey done by Steve Hicks in March is an audit of space use. The committee will be sending another space use survey out. Please respond so the committee can be of service to the institution.

# 5. Old Business. None

#### 6. New Business.

#### a. Curriculum Changes - Council of Chairs

Dr. Liebrock, Dean of Graduate Studies explained the grade change recommendation is driven by new funding reporting. Removing "incompletes" and/or "ongoing" for all thesis and dissertations will be a "PR", in line with UNM and NMSU. This change will be presented to the Council of Graduate Deans.

P52 in the current catalog

Grades

At the time of graduation, the cumulative GPA must be 3.0 for all courses numbered 300 or above with no grade less than "C". Grades in courses designated for the degree must average "B". Thesis (numbered 591), independent study (590), or dissertation (595) courses will be graded with an "S" only upon fulfillment of graduate degree requirements.

Prior to completion, these courses will be awarded "NR" if performance for that semester is acceptable or "U" if performance is unacceptable. Directed research (course number 500) and other courses taken on an S/U basis may not be used to fulfill graduate degree requirements.

#### **Grades**

At the time of graduation, the cumulative GPA must be 3.0 for all courses numbered 300 or above with no grade less than "C". The grade point average for course credits designated for the degree must be 3.0 or above.

Independent study (590), thesis (591), and <u>dissertation (595)</u> courses will be graded with either PR (progress) or U (unsatisfactory). A student will be placed on probation for earning a "U" in independent study, thesis, or dissertation. A second "U" in independent study, thesis, or dissertation may result in dismissal from graduate school. Only those credits graded PR (progress) accumulate toward the minimum required number of credits for research.

Directed research (500) and other courses taken on an S/U basis may not be used to fulfill graduate degree requirements.

#### P55 in the current catalog (MS)

# **Approvals**

3) The graduate student's advisory committee must approve thesis and independent study research projects.

#### **Approvals**

3) The graduate student's advisory committee must approve both thesis and independent study research projects. The MS degree will not be awarded until the thesis or independent study paper has been approved by the advisory committee.

# P56 in the current catalog (MEM)

#### **Approvals**

3) The graduate student's advisory committee must approve independent study projects.

#### **Approvals**

3) The graduate student's advisory committee must approve independent study projects. The MEM degree will not be awarded until the independent study paper has been approved by the advisory committee.

#### P56 in the current catalog (MST)

#### **Approvals**

3) The graduate student's advisory committee must approve thesis and independent study research projects.

#### **Approvals**

3) The graduate student's advisory committee must approve both thesis and independent study research projects. The MST degree will not be awarded until the thesis or independent study paper has been approved by the advisory committee.

#### P56 in the current catalog (Second MS)

- 2) Complete either
- a) 9 additional approved credit hours plus a thesis (6 credit hours) in the second field, or

- b) 12 additional approved credit hours plus an independent study (3 credit hours) in the second field.
- 2) Complete either
- a) 9 additional approved credit hours plus a thesis (6 or more credit hours) in the second field, or
- b) 12 additional approved credit hours plus an independent study (3 <u>or more</u> credit hours) in the second field.

#### P56 in the current catalog (Dissertation)

A minimum of 24 credit hours distributed over one year must be devoted to the dissertation.

A minimum of 24 credit hours distributed over one <u>or more</u> year<u>s</u> must be devoted to the dissertation after candidacy is achieved.

Dr. Liebrock moved for the change. Discussion brought up concerns about the possibility of a GPA falling into a probationary situation. Dr. Boston asked about the students that go to Antarctica and are issued grades at the end of the Artic season. Dr. Liebrock explained special situations such as this will need to be handled as individual cases.

There being no further discussion, the chair called for a vote and the motion passed.

**Computer Science curriculum changes,** Dr. Liebrock moved for the changes to correct problems with prerequisites and math requirements. There was no discussion and the motion passed.

## Replace

CSE 113 Introduction to Programming, 4cr, 3 cl hrs, 3 lab hrs

Corequisite: MATH 103 or equivalent

#### with

CSE 113 Introduction to Programming, 4cr, 3 cl hrs, 3 lab hrs

Prerequisite: MATH 103 or equivalent

#### Replace

CSE 122, Algorithms and Data Structures, 3 cr, 3 cl hrs

Prerequisite: CSE 113

#### with

CSE 122, Algorithms and Data Structures, 3 cr, 3 cl hrs

Prerequisite: CSE 113 Corequisite: MATH 132

#### **Replace**

CSE 213, Introduction to Object Oriente Programming, 3 cr, 3 cl hrs

Prerequisite: CSE 113

#### with

CSE 213, Introduction to Object Oriente Programming, 3 cr, 3 cl hrs

Prerequisite: CSE 113, 122

# Replace

CSE 382, Legal, Ethical, and Social Issues of Information Technology,

3 cr, 3 cl hrs

Prerequisite: Upper division standing in the CSE or IT program; or consent of instructor

#### with

CSE 382, Legal, Ethical, and Social Issues of Information Technology,

3 cr, 3 cl hrs

Prerequisite: CSE 326; or consent of instructor

# For the Information Technology Program: Replace

IT 113 Introduction to Programming, 4cr, 3 cl hrs, 3 lab hrs

Corequisite: MATH 103 or equivalent

with

IT 113 Introduction to Programming, 4cr, 3 cl hrs, 3 lab hrs

Prerequisite: MATH 103 or equivalent

**Replace** 

IT 122, Algorithms and Data Structures, 3 cr, 3 cl hrs

Prerequisite: CSE 113

with

IT 122, Algorithms and Data Structures, 3 cr, 3 cl hrs

Prerequisite: IT 113 Corequisite: MATH 132

**Replace** 

IT 213, Introduction to Object Oriente Programming, 3 cr, 3 cl hrs

Prerequisite: IT 113

with

IT 213, Introduction to Object Oriente Programming, 3 cr, 3 cl hrs

Prerequisite: IT 113, 122

Replace

IT 382, Legal, Ethical, and Social Issues of Information Technology, 3 cr, 3 cl hrs Prerequisite: Upper division standing in the CSE or IT program; or consent of instructor

with

IT 382, Legal, Ethical, and Social Issues of Information Technology, 3 cr, 3 cl hrs Prerequisite: IT 326; or consent of instructor

# Civil and Environmental Engineering curriculum changes were presented by Dr. M.

Cal. He moved for adoption of these changes. There was no discussion and the motion passed.

# **Revised Course Descriptions**

**OLD** 

# CE 423, Open Channel Hydraulics, 3 cr, 3 cl hrs

Prerequisites: ES 216; or consent of instructor

Conservation laws for transient flow in open channels. Analysis of simple waves, hydraulic jumps, non-reflective boundary conditions, dam-breaks, overland flows. Prediction and mitigation of flood waves.

**NEW** 

# CE 423, Open Channel Hydraulics, 3 cr, 3 cl hrs

Prerequisites: ES 216; or consent of instructor

Analysis and characteristics of flow in natural and artificial open channel systems using energy, continuity, and momentum equations as applied to steady-state uniform, gradually varied, and rapidly varied flow profiles with emphasis on design of hydraulic structures. The students will use their knowledge of fluid

mechanics, calculus, numerical analysis, and computer science to solve practical open channel flow problems. A variety of hydraulic conveyance and structures are covered, including rigid and flexible boundary channels, culverts, sluice gates, fumes, weirs, spillways, stilling basins, and bridges.

# **Program Deletions – Environmental Engineering**

Delete CHEM 311 from ENVE program curriculum, and reduce total program credit hours required for B.S. ENVE degree from 135 to 132.

#### Rationale

Over the past 5 years, the ENVE program has been significantly revised, and the content in CHEM 311 is not relevant to program content. Additional content related to the chemistry and biology of environmental engineering was added to the curriculum in 2007 within the course ENVE 301–Applied Principles of Environmental Engineering.

**Earth and Environmental Science curriculum changes** were brought forward by Dr. Axen. There was no discussion and the motion passed.

# Delete "or 206" in the ERTH 460 prerequisites.

ERTH 460, Subsurface and Petroleum Geology, 3 cr, 2 cl hrs, 3 lab hrs

Prerequisite: ERTH 203 or 206 or consent of instructor Offered spring semester Principles and techniques of subsurface geology with emphasis on subsurface mapping, facies analysis, fluid related rock properties, composition, movement and entrapment of subsurface fluids (oil, natural gases, water), and petroleum source rocks. Laboratory work emphasizes subsurface analysis and mapping with logs, cuttings, and cores. Applications to hydrocarbon exploration and development.

# Delete 206 from the catalogue.

ERTH 206, Fundamentals of Earth's Crust, 3 cr, 2 cl hrs, 3lab hrs

Prerequisite: a 100-level ERTH course and associated lab

Offered spring semester

Overview of the evolution of the crust of the Earth, the major rock types and processes that form it, and the main methods used to study it. Topics include: mineralogy, igneous, sedimentary and metamorphic petrology, structural geology, subsurface fluid flow, and petroleum geology. This course is for non-majors only. Earth Science majors must enroll in ERTH 203.

Meets concurrently with ERTH 203, but course work differs. Field trips.

**CLASS – Dr. Bonnekessen** moved for the following catalogue changes for the C.L.A.S.S. department. There was no discussion and the motion passed.

# Remove prerequisite

# OLD - PS 361, Issues in International Relations, 3 cr, 3 cl hrs

# Prerequisite: PS 171 or one semester of college history or consent of instructor

Considers current international issues in light of the transforming structure of world politics; examines the changing status of America as a world power; and investigates the roles of culture, economic power, and technology in the process of global change.

# NEW - PS 361, Issues in International Relations, 3 cr, 3 cl hrs

Considers current international issues in light of the transforming structure of world politics; examines the changing status of America as a world power; and investigates the roles of culture, economic power, and technology in the process of global change.

- **b.** Catalogue changes Graduate Council Refer to Council of Chairs (above)
- c. Adding "A plus" option, Dr. Burleigh moved to allow an A plus option as follows: From the catalogue, page 67 allow for a grade of A plus that would count as an A or 4 points. Dr. Makhnin seconded the motion. Dr. Burleigh explained this is a way to recognize exceptional students. From the discussion, the question of two grade options for the same numerical value was raised. Would it cause a problem for an auditor seeing an A plus who expects a 4.33% for that grade? If a change in value were adopted now, it won't reflect on the grades from earlier in an upper level student's transcript. Should it be phased in with in-coming freshman so an entire transcript would be evaluated on the same scale? Sohaib Soliman, President of the Student Senate, asked why the scale changed in 1996 to a 4.0 scale. Mr. Soliman went on to explain, the students perceive the current scale as punitive. It is much easier to loose grade points than gain them back. An A plus could be used by students to boost a GPA. Dr. Fuierer felt the distinction was important when it was implemented in 1996. The question, "Are we trying to fix something that isn't broken" was raised. Dr. Makhnin asked for further research. Dr. Gerity proposed that it be sent back for further study, pointing out that going on to graduate school, the numeric value has a direct impact particularly with medical school applications. How does our system compare to other schools, was asked. Mr. Soliman asked to bring it forward to the student senate.

Dr. Pullin moved to table the motion. Dr. Stone moved to send the motion to the Academic Standards and Admissions Committee and the Student Association for further study. Dr. Pullin withdrew his motion to table. The motion to refer to committee was seconded by Fred Philips. There was no further discussion and the motion to refer to the Academic Standards and Admissions Committee and the Student Association for further study passed.

Dr. Liebrock moved to adjourn and multiple seconds were received. By general consent the meeting adjourned at approximately 4:40p.m.