Memo To: Academic Council
From: Missouri S&T Campus Curriculum Committee Meetings
RE: February 5, 2008 Meeting

The UMR Campus Curricula Committee recommends to the Faculty Senate that the name change on the following NC form be approved. The following NC form has also been routed to the Budgetary Affairs Committee for additional recommendation to the Faculty Senate.

Approved NC forms:
NC 14, Psychology. The department of Psychology is proposing a change of their department name to Department of Psychological Science, approved effective July 1, 2008.

The UMR Campus Curricula Committee recommends to the Faculty Senate that the curriculum changes and degree proposals on the following DC forms be approved.

Approved DC forms:
DC 0277, Chemical Engineering-Biochemical Engineering Emphasis, approved effective Fall 2008. A proposal to change the current curriculum for the Biochemical Engineering Emphasis area by separating Bio Sci 221 into Bio Sci 221 and 222 which is the lab.

The UMR Campus Curricula Committee recommends to the Faculty Senate that the course changes on the following CC forms be approved.

Approved CC forms:
CC 7322, Engineering Management 452, Advanced Financial Management. The following change is approved effective 2008.
Prerequisites – Present: EMgt 322
Proposed: EMgt 352

CC 7323, Engineering Management 458, Case Studies in Project Management. The following change is approved effective Fall 2008.
Prerequisites – Present: EMgt 361
Proposed: EMgt 361 or equivalent
CC 7324, Engineering Management 461, Global Project Management. The following change is approved effective Fall 2008.
Prerequisites – Present: EMgt 361
   Proposed: EMgt 361 or equivalent

CC 7325, Environmental Engineering 263, Civil Engineering 263, Chemical Fundamentals of Environmental Engineering. The following change has been approved effective Fall 2008.
Credit Hours – Present: 2 hour lecture, 1 hour lab, Total: 3
   Proposed: 3 hour lecture

CC 7327, Civil Engineering 215, Fundamentals of Geotechnical Engineering. The following change is approved effective Fall 2008.
Prerequisites – Present: Geo Eng 50, preceded or accompanied by IDE 110; ArchE 103
   Proposed: Geo Eng 50 or Arch Eng 103; IDE 110; and preceded or accompanied by Civ Eng 230

CC 7328, Psychology 375, Health Psychology. New course approved effective Fall 2008.
Catalog Description: This course examines Health Psychology. Topics will include basic behavioral pharmacology (involving alcohol & other drugs), illusions of invulnerability to risk, stress and coping, and the science of persuading people to protect their health. Students will learn how to construct a public service announcement towards a societal problem as part of the course.
Credit Hours: 3 hour lecture
Prerequisites: Psych 50

CC 7329, Business 120, Essentials of Accounting. The following changes are approved effective Fall 2008.
Course Title – Proposed: Financial Accounting
Catalog Description – Proposed: This course is an introduction to financial accounting and its significant role in making sound business decisions. Emphasis is on what accounting information is, why it is important, and how it is used to make strategic economic decisions.

CC 7333, Business 270, Human Resource Management. The following change is approved effective Fall 2008.
Course Number – Proposed: 370
CC 7334, Electrical Engineering 422, Integrated Microsystems Engineering. The following changes are approved effective Fall 2008.

Catalog Description – Proposed: Theory and practice of multidisciplinary integrated micro-system technologies. The topics include (1) micromachining technology, (2) review of mechanical, optical, micro-fluidic and (bio)chemical micro-sensors and micro-actuators, (3) hands-on lab session for design, fabrication, and characterization of micro-systems.

Credit Hours – Present: 3 hour lecture
Proposed: 1.5 hour lecture, 1.5 hour lab, Total: 3

CC 7382, ERP 301, Special Topics. The following new course has been approved effective Fall 2008.

Catalog Description – Proposed: This course is designed to give the department an opportunity to test a new course. Variable title.

Credit Hours – Proposed: Variable
Prerequisites – Proposed: None

CC 7383, ERP 401, Special Topics. The following new course has been approved effective Fall 2008.

Catalog Description – Proposed: This course is designed to give the department an opportunity to test a new course. Variable title.

Credit Hours – Proposed: Variable
Prerequisites – Proposed: None

For the information of the Faculty Senate, the following EC forms have been submitted by the University departments for an experimental course that will be offered in the near future.

Approved EC forms:
EC 2016, Electrical Engineering 401, Advanced Power Electronics, approved effective Fall 2008.

Course Description: The purpose of this course is to cover selected areas of power electronics in a greater depth and teach recent developments in this field. The topics covered include small signal analysis of switched mode power converters, voltage- and current-mode control, soft switching techniques, power factor correctors, multi-level converters, and PWM techniques.

Credit Hours: 3 hour lecture
Prerequisites: EE 353
EC 2018, ERP 401, Strategic Enterprise Management System Configuration, approved effective Fall 2008.

Course Description: Implementation and design practices for enterprise performance measurement and monitoring systems with a focus on balanced scorecard and value based management. SAP’s Strategic Enterprise Management (SEM) will be used as a tool for project implementation. A major project is required.
Credit Hours: 3 hour lecture
Prerequisites: ERP 346, or Bus 426, ERP 345, some experience in accounting and strategic management, and Graduate Standing.

Course Description: The process of developing a new product is studied. Major emphasis is given to the concept of customer focus, with coverage of techniques for obtaining customer needs, measuring customer satisfaction, developing products and services to satisfy customers, and maximizing the benefits of customer feedback.
Credit Hours: 3 hour lecture
Prerequisites: Bus 340

EC 2020, Finance 301, Quantitative Finance Methods, approved effective Summer 2008.
Course Description: The focus is development of basic quantitative finance models using spreadsheet technology. Particular topics include portfolio modeling and optimization, asset pricing, performance measures, options, Black-Scholes formula, implied volatility, interest rate models, bonds, and binomial trees.
Credit Hours: 3 hour lecture
Prerequisites: Programming Competency and Introductory Statistics

EC 2021, Geology 401, Advanced Paleoclimatology and Paleoecology, approved effective Fall 2008.
Course Description: Advanced study of paleoclimatic and processes since the Archean, and the interpretation of Holocene climate changes, including human impacts. Extensive presentations and discussions of current ideas and techniques in paleoclimatic studies.
Credit Hours: 3 hour lecture
Prerequisites: Geology 223 and 227
EC 2022, Psychology 301, Psychology in the Media, approved effective Fall 2008. Course Description: Examples drawn from the media (e.g., television, movies, newspapers) will be used as the time basis for discussing a wide variety of psychological phenomena, principles, and theories, and their applicability to everyday life. Credit Hours: 3 hour lecture Prerequisites: Psych 50

J. Keith Nisbett, Chair
Missouri S&T Campus Curricula Committee