Changes to General Ed.docx

(on page 4)

|  |  |  |  |
| --- | --- | --- | --- |
| MUS 167 | Music Cultures of Non-Western Worlds | 4 | F, Sp |
| MUS 201 | Survey of Music | 4 | F, Sp, Su |
| MUS 203 | Elementary Music Theory | 4 | F, Sp, Su |
| MUS 223 | American Popular Music | 4 | F, Sp |
| MUS 225 | History of Jazz | 4 | F, Sp |
| PHIL 230 | Aesthetics | 4 | F, Sp, Su |
| THTR 240 | Appreciation and Enjoyment of the Theatre | 4 | F, Sp, Su |
| THTR 242 | Acting for Nonmajors | 4 | Su |

History (H)

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| HIST 101 | Multiple Voices: Africa in the World | 4 | F, Sp, Su |
| HIST 102 | Multiple Voices: Asia in the World | 4 | F, Sp, Su |
| HIST 103 | Multiple Voices: Europe in the World to 1600 | 4 | F, Sp, Su |
| HIST 104 | Multiple Voices: Europe in the World Since 1600 | 4 | F, Sp, Su |
| HIST 105 | Multiple Voices: Latin America in the World | 4 | F, Sp, Su |
| HIST 106 | Multiple Voices: Muslim People in the World | 4 | F, Sp, Su |
| HIST 107 | Multiple Voices: The United States in the World | 4 | F, Sp, Su |
| HIST 108 | History of Science and Medicine | 4 | Annually |
| HIST 117 | Special Topics in History | 4 | As needed |
| HIST 118 | Topics in U.S. History to 1877 | 3 | As needed |
| HIST 119 | Topics in U.S. History from 1877 to Present | 3 | As needed |

|  |
| --- |
|  |
|  |
|  |
|  |
|  |
|  |
|  |

Literature (L)

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| ENGL 118 | Introduction to the Literary Experience | 4 | As needed |
| ENGL 120 | Studies in Literature and Identity | 4 | F, Sp, Su |
| ENGL 121 | Studies in Literature and Nation | 4 | F, Sp, Su |
| ENGL 122 | Studies in Literature and the Canon | 4 | F, Sp, Su |
| ENGL 123 | Studies in Literature and Genre | 4 | F, Sp, Su |
| FREN 115 | Literature of the French-Speaking World | 4 | F, Sp |
| ITAL 115 | Literature of Italy | 4 | F, Sp |
| PORT 115 | Literature of the Portuguese-Speaking World | 4 | F, Sp |
| SPAN 115 | Literature of the Spanish-Speaking World | 4 | F, Sp |

|  |
| --- |
|  |
|  |
|  |
|  |
|  |
|  |
|  |

Mathematics (M)

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| MATH 139 | Math, Data, and the Contemporary Citizen | 4 | F, Sp, Su |
| MATH 177 | Quantitative Business Analysis I | 4 | F, Sp, Su |
| MATH 209 | Precalculus Mathematics | 4 | F, Sp, Su |
| MATH 212 | Calculus I | 4 | F, Sp, Su |
| MATH 240 | Statistical Methods I | 4 | F, Sp, Su |

|  |
| --- |
|  |
|  |
|  |
|  |

Note: Completion of the Mathematics category of General Education does not satisfy the College Mathematics Competency. In addition, students in the elementary education curriculum who complete MATH 144 (and its prerequisite, MATH 143) shall be considered to have fulfilled the Mathematics category of General Education.

Natural Science (NS)

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| BIOL 100 | Fundamental Concepts of Biology | 4 | F, Sp, Su |
| BIOL 108 | Basic Principles of Biology | 4 | F, Sp, Su |
| BIOL 111 | Introductory Biology I | 4 | F, Sp, Su |
| BIOL 112 | Introductory Biology II | 4 | F, Sp, Su |
| CHEM 103 | General Chemistry I | 4 | F, Sp, Su |
| CHEM 105 | General, Organic and Biological Chemistry I | 4 | F, Sp, Su |
| PSCI 103 | Physical Science | 4 | F, Sp, Su |
| PSCI 211 | Introduction to Astronomy | 4 | F, Sp |
| PSCI 212 | Introduction to Geology | 4 | F, Su |
| PSCI 217 | Introduction to Oceanography | 4 | Sp |
| PHYS 101 | Physics for Science and Mathematics I | 4 | F, Sp, Su |
| PHYS 110 | Introductory Physics | 4 | Sp, F, Su |

|  |
| --- |
|  |
| Changes to 3 Arts & Sciences.docx  (Pages 68 and 69) |
|  |
|  |
|  |
|  |
|  |
|  |

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 356W | Descartes, Hume, Kant and Modern Philosophy | 4 | Sp |

Ethics, Political, and Legal

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 306 | Contemporary Ethical Theory | 3 | F |
| PHIL 321 | Social and Political Philosophy | 3 | F, Sp |
| PHIL 322 | Philosophy of Law | 3 | Annually |

Metaphysics and Epistemology

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 311 | Knowledge and Truth | 3 | Sp (even years) |
| PHIL 320 | Philosophy of Science | 3 | Sp (odd years) |
| PHIL 330 | Metaphysics | 3 | F (even years) |
| PHIL 333 | Philosophy of Mind | 3 | F (odd years) |

Seminar

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 460W | Seminar in Philosophy | 4 | Annually |

Additional Courses

TWO COURSES from

|  |  |  |  |
| --- | --- | --- | --- |
| HIST 220 | Ancient Greece | 3 | Alternate years |
| HIST 221 | The Roman Republic | 3 | Alternate Years |
| HIST 306 | Protestant Reformations and Catholic Renewal | 3 | As needed |
| HIST 307 | Europe in the Age of Enlightenment | 3 | As needed |
| HIST 316 | Modern Western Political Thought | 4 | F |
| HIST 340 | The Muslim World from the Age of Muhammad to 1800 | 3 | As needed |
| PHIL 353 | Epicureans, Stoics, Skeptics and Hellenistic Philosophy | 3 | Sp (even years) |
| PHIL 355 | Augustine, Aquinas and Medieval Philosophy | 3 | As needed |
| PHIL 357 | Hegel, Nietzsche and Nineteenth-Century Philosophy | 3 | F (even years) |
| PHIL 359 | Frege, Russell, Wittgenstein and Analytic Philosophy | 3 | F (odd years) |

Total Credit Hours: 31-33

Philosophy B.A. with Concentration in Knowledge and Reality

Course Requirements

Logic

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 205W | Introduction to Logic | 4 | F, Sp |
| PHIL 220 | Logic and Probability in Scientific Reasoning | 4 | F, Sp |
| PHIL 305W | Intermediate Logic | 4 | Sp (even years) |

History

TWO COURSES from

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 351W | Plato, Aristotle, and Greek Philosophy | 4 | F |
| PHIL 354 | Continental Philosophy | 4 | Annually |
| PHIL 356W | Descartes, Hume, Kant and Modern Philosophy | 4 | Sp |

Ethics Political and Legal

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 306 | Contemporary Ethical Theory | 3 | F |
| PHIL 321 | Social and Political Philosophy | 3 | F, Sp |
| PHIL 322 | Philosophy of Law | 3 | Annually |

Epistemology

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 311 | Knowledge and Truth | 3 | Sp (even years) |
| PHIL 320 | Philosophy of Science | 3 | Sp (odd years) |

Metaphysics

ONE COURSE from

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 330 | Metaphysics | 3 | F (even years) |
| PHIL 333 | Philosophy of Mind | 3 | F (odd years) |

Seminar

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 460W | Seminar in Philosophy | 4 | Annually |

Additional Courses

TWO COURSES from

|  |  |  |  |
| --- | --- | --- | --- |
| BIOL 111 | Introductory Biology I | 4 | F, Sp, Su |
| CHEM 103 | General Chemistry I | 4 | F, Sp, Su |
| CHEM 104 | General Chemistry II | 4 | F, Sp, Su |
| MATH 139 | Math, Data, and the Contemporary Citizen | 4 | F, Sp, Su |
| PHIL 311 | Knowledge and Truth | 3 | Sp (even years) |
| PHIL 320 | Philosophy of Science | 3 | Sp (odd years) |
| PHIL 330 | Metaphysics | 3 | F (even years) |
| PHIL 333 | Philosophy of Mind | 3 | F (odd years) |
| PHYS 101 | Physics for Science and Mathematics I | 4 | F, Sp, Su |
| PHYS 102 | Physics for Science and Mathematics II | 4 | F, Sp, Su |
| PHYS 110 | Introductory Physics | 4 | Sp, F, Su |
| PSYC 110 | Introduction to Psychology | 4 | F, Sp, Su |
| PSYC 341 | Perception | 4 | Annually |
| PSYC 349 | Cognitive Psychology | 4 | F, Sp |
| PSYC 354 | Psychopathology | 4 | F, Sp |

Total Credit Hours: 31-33

Philosophy Minor

Course Requirements for Minor in Philosophy

The minor in philosophy consists of a minimum of 18 credit hours in philosophy, with at least two courses at the 300-level. The courses chosen should form a coherent program.

Course Requirements for Minor in Logical and Ethical Reasoning

The minor in logical and ethical reasoning consists of a minimum of 18 credit hours, with at least two courses at the 300 level, as follows:

Courses

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 205W | Introduction to Logic | 4 | F, Sp |
|  | -Or- |  |  |
| PHIL 220 | Logic and Probability in Scientific Reasoning | 4 | F, Sp |
|  | -Or- |  |  |
| PHIL 305W | Intermediate Logic | 4 | Sp (even years) |
|  |  |  |  |
| PHIL 206 | Ethics | 3 | F, Sp, Su |
|  | -Or- |  |  |
| PHIL 306 | Contemporary Ethical Theory | 3 | F |

REMAINING CREDIT HOURS are made up of additional choices from the five courses above and/or from:

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 200 | Introduction to Philosophy | 3 | F, Sp |
| PHIL 321 | Social and Political Philosophy | 3 | F, Sp |
| PHIL 322 | Philosophy of Law | 3 | Annually |
| PHIL 325 | Environmental Ethics | 3 | Sp |
| POL 204 | Introduction to Political Thought | 4 | F, Sp |
| POL 208 | Introduction to the Law | 4 | F, Sp |

Course Requirements for Minor in History of Philosophical Thought

The minor in history of philosophical thought consists of a minimum of 18 credit hours, as follows:

Courses

AT LEAST FOUR COURSES from:

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 351W | Plato, Aristotle, and Greek Philosophy | 4 | F |
| PHIL 353 | Epicureans, Stoics, Skeptics and Hellenistic Philosophy | 3 | Sp (even years) |
| PHIL 355 | Augustine, Aquinas and Medieval Philosophy | 3 | As needed |
| PHIL 356W | Descartes, Hume, Kant and Modern Philosophy | 4 | Sp |
| PHIL 357 | Hegel, Nietzsche and Nineteenth-Century Philosophy | 3 | F (even years) |
| PHIL 358 | Existentialism and Phenomenological Philosophy | 3 | Sp (odd years) |
| PHIL 359 | Frege, Russell, Wittgenstein and Analytic Philosophy | 3 | F (odd years) |

REMAINING CREDIT HOURS are made up of additional choices from the eight courses above and/or from:

|  |  |  |  |
| --- | --- | --- | --- |
| HIST 224 | The Glorious Renaissance | 3 | F |
| HIST 238 | Early Imperial China | 3 | As needed |
| HIST 306 | Protestant Reformations and Catholic Renewal | 3 | As needed |
| HIST 307 | Europe in the Age of Enlightenment | 3 | As needed |
| HIST 316 | Modern Western Political Thought | 4 | F |
| HIST 340 | The Muslim World from the Age of Muhammad to 1800 | 3 | As needed |
| PHIL 200 | Introduction to Philosophy | 3 | F, Sp |
| POL 316 | Modern Western Political Thought | 4 | F |

Course Requirements for Minor in Principles of Knowledge and Reality

The minor in principles of knowledge and reality consists of a minimum of 18 credit hours, as follows:

Courses

|  |  |  |  |
| --- | --- | --- | --- |
| PHIL 205W | Introduction to Logic | 4 | F, Sp |
|  | -Or- |  |  |
| PHIL 220 | Logic and Probability in Scientific Reasoning | 4 | F, Sp |
|  | -Or- |  |  |
| PHIL 305W | Intermediate Logic | 4 | Sp (even years) |
|  |  |  |  |
| PHIL 311 | Knowledge and Truth | 3 | Sp (even years) |
|  | -Or- |  |  |
| PHIL 320 | Philosophy of Science | 3 | Sp (odd years) |
|  |  |  |  |
| PHIL 330 | Metaphysics | 3 | F (even years) |
|  | -Or- |  |  |
| PHIL 333 | Philosophy of Mind | 3 | F (odd years) |

REMAINING CREDIT HOURS are made up of additional choices from the seven courses above and/or from:

|  |  |  |  |
| --- | --- | --- | --- |
| BIOL 111 | Introductory Biology I | 4 | F, Sp, Su |
| CHEM 103 | General Chemistry I | 4 | F, Sp, Su |
| CHEM 104 | General Chemistry II | 4 | F, Sp, Su |
| CHEM 105 | General, Organic and Biological Chemistry I | 4 | F, Sp, Su |
| MATH 139 | Math, Data, and the Contemporary Citizen | 4 | F, Sp, Su |
| PHIL 200 | Introduction to Philosophy | 3 | F, Sp |
| PHYS 101 | Physics for Science and Mathematics I | 4 | F, Sp, Su |
| PHYS 102 | Physics for Science and Mathematics II | 4 | F, Sp, Su |
| PHYS 110 | Introductory Physics | 4 | Sp, F, Su |
| PSYC 110 | Introduction to Psychology | 4 | F, Sp, Su |
| PSYC 341 | Perception | 4 | Annually |
| PSYC 349 | Cognitive Psychology | 4 | F, Sp |

Notes: Connections courses cannot be used to satisfy these requirements. No minor in the Philosophy Department may be declared in combination with a Philosophy major or with any of the other minors in the Philosophy Department.

Changes to 4 Education.docx

(Page 45)

# Technology Education

**Department of Educational Studies**

**Department Chair:** Lesley Bogad

**Technology Education Program Coordinator:** Charles McLaughlin Jr.

**Technology Education Program Faculty:** **Professor** McLaughlin Jr.

Students **must** consult with their assigned advisor before they will be able to register for courses.

Technology Education B.S.

Course Requirements for Concentration in Teaching

Courses

|  |  |  |  |
| --- | --- | --- | --- |
| TECH 200 | Introduction to Technological Systems and Processes | 3 | F, Sp |
| TECH 202W | Design Processes | 3 | F |
| TECH 204 | Energy and Control Systems | 3 | Annually |
| TECH 216 | Computer-Aided Design | 3 | As needed |
| TECH 305W | Teaching and Learning in Technology Education | 4 | Annually |
| TECH 306 | Automation and Control Systems | 4 | Annually |
| TECH 326 | Communication Systems | 3 | Annually |
| TECH 327 | Construction Systems | 3 | Annually |
| TECH 328 | Manufacturing Systems | 3 | Annually |
| TECH 329 | Transportation Systems | 3 | Annually |

Note: TECH 306 satisfies the Advanced Quantitative/Scientific Reasoning (AQSR) General Education requirement.

Professional Courses

|  |  |  |  |
| --- | --- | --- | --- |
| CEP 215 | Introduction to Educational Psychology | 4 | F, Sp, Su |
| FNED 101 | Introduction to Teaching and Learning | 2 | F, Sp, Su |
| FNED 246 | Schooling for Social Justice | 4 | F, Sp, Su |
| SPED 333 | Introduction to Special Education: Policies/Practices | 3 | F, Sp |
| TESL 401 | Introduction to Teaching Emergent Bilinguals | 4 | F, Sp |
| TECH 318 | Practicum I: Teaching K-6 Technology Education | 4 | Annually |
| TECH 406W/CTE 300 | Methods for Teaching Technical Subjects | 4 | Annually |
| TECH 418 | Practicum II: Teaching Secondary Technology Education | 4 | Annually |
| TECH 420/SED 420/WLED 420 | Introduction to Student Teaching | 2 | Early Sp |
| TECH 421/SED 421/WLED 421 | Student Teaching in the Secondary School | 7 | Sp |
| TECH 422 | Student Teaching Seminar in Secondary Education | 3 | Sp |

CHOOSE ONE of the following:

|  |  |  |  |
| --- | --- | --- | --- |
| SPED 433 | Special Education: Best Practices and Applications | 3 | F, Sp |
| TESL 402 | Applications of Second Language Acquisition | 3 | F, Sp |

Cognates

|  |  |  |  |
| --- | --- | --- | --- |
| CHEM 103 | General Chemistry I | 4 | F, Sp, Su |
| MATH 120 | Intermediate Algebra | 4 | F, Sp, Su |
| MATH 139 | Math, Data, and the Contemporary Citizen | 4 | F, Sp, Su |
| PSCI 103 | Physical Science | 4 | F, Sp, Su |

Subtotal: 92

Course Requirements for Concentration in Applied Technology

Note: This program does not lead to RIDE teaching certification.

Courses

|  |  |  |  |
| --- | --- | --- | --- |
| TECH 200 | Introduction to Technological Systems and Processes | 3 | F, Sp |
| TECH 202W | Design Processes | 3 | F |
| TECH 204 | Energy and Control Systems | 3 | Annually |
| TECH 216 | Computer-Aided Design | 3 | As needed |
| TECH 306 | Automation and Control Systems | 4 | Annually |
| TECH 326 | Communication Systems | 3 | Annually |
| TECH 327 | Construction Systems | 3 | Annually |
| TECH 328 | Manufacturing Systems | 3 | Annually |
| TECH 329 | Transportation Systems | 3 | Annually |
| TECH 430 | Internship in Applied Technology | 6 | As needed |
| TECH 431W | Capstone Design Project | 4 | F, Sp |

Note: TECH 306 satisfies the Advanced Quantitative/Scientific Reasoning (AQSR) General Education requirement.

Cognates

|  |  |  |  |
| --- | --- | --- | --- |
| CSCI 157 | Introduction to Algorithmic Thinking in Python | 4 | F, Sp |
| CSCI 211 | Computer Programming and Design | 4 | F, Sp |
| MGT 201W | Foundations of Management | 4 | F, Sp, Su |
| MGT 331 | Occupational and Environmental Safety Management | 4 | F |
| MATH 209 | Precalculus Mathematics | 4 | F, Sp, Su |
| MATH 212 | Calculus I | 4 | F, Sp, Su |
| PHYS 101 | Physics for Science and Mathematics I | 4 | F, Sp, Su |
| PHYS 102 | Physics for Science and Mathematics II | 4 | F, Sp, Su |

Subtotal: 70

Changes to 9 Course Descriptions.docx

(Page 132)

# MATH - Mathematics

MATH 010 - Basic Mathematics Competency (4)

Satisfactory completion of this course fulfills the College Mathematics Competency. Topics include problem solving, beginning algebra, geometry, measurement, introductory probability and statistics, and graphs and charts. Graded S, U.

Offered: Fall, Spring, Summer.

MATH 117 - Calculus: A Short Course (3)

Topics include differentiation and integration, including an introduction to partial differentiation.

Offered: As needed.

MATH 120 - Intermediate Algebra (4)

Intended for students needing intermediate algebra skills, especially for MATH 177 and 209. Topics include linear and quadratic equations, inequalities, exponents, radicals, algebraic fractions, and quadratic, logarithmic and exponential functions.

Prerequisite: MATH 010 or appropriate score on the placement exam.

Offered: Fall, Spring, Summer.

MATH 139 – Math, Data, and the Contemporary Citizen (4)

This course introduces students to the power and usefulness of data and its mathematical application to their personal lives and to the function of the societies in which they belong.

General Education Category: Mathematics.

Prerequisite: Completed college mathematics competency or appropriate score on the mathematics placement exam.

Offered: Fall, Spring, Summer.

MATH 143 - Mathematics for Elementary School Teachers I (4)

Emphasis is on problem solving, model building, and algorithm development appropriate for the mathematics curriculum in the elementary/middle school. Topics include numeration and the development of number systems. Lecture and laboratory.

Prerequisite: Completed college mathematics competency or appropriate score on the mathematics placement exam.

Offered: Fall, Spring, Summer.

MATH 144 - Mathematics for Elementary School Teachers II (4)

A continuation of MATH 143, this course includes geometry and measurement, counting problems, probability, and statistics. Lecture and laboratory.

General Education Category: Mathematics for elementary education students only.

Prerequisite: MATH 143, with a minimum grade of C, or consent of department chair.

Offered: Fall, Spring, Summer.

MATH 177 - Quantitative Business Analysis I (4)

Topics include linear and selected nonlinear functions, linear systems, matrix methods, linear programming, average rate of change, derivatives and marginal analysis. Applications to management and economics are stressed throughout.

General Education Category: Mathematics.

Prerequisite: MATH 120 or appropriate score on placement exam.

Offered: Fall, Spring, Summer.

MATH 209 - Precalculus Mathematics (4)

The functions, concepts, and techniques of algebra and trigonometry considered essential in the study and applications of calculus are introduced and/or reinforced.

General Education Category: Mathematics.

Prerequisite: MATH 120 or appropriate score on placement exam.

Offered: Fall, Spring, Summer.

MATH 210 - College Trigonometry (3)

This is an in-depth study of trigonometry. Topics include a comprehensive analysis of trigonometric and inverse trigonometric functions and solutions of triangles, vectors, and polar coordinates.

Prerequisite: Three units of college preparatory mathematics and MATH 120 or consent of department chair.

Offered: Spring.

MATH 212 - Calculus I (4)

This course covers the fundamental concepts, techniques, and applications of the differential calculus of one variable and begins the study of integration.

General Education Category: Mathematics.

Prerequisite: MATH 209 or appropriate score on placement exam.

Offered: Fall, Spring, Summer.

MATH 213 - Calculus II (4)

A continuation of MATH 212, topics include derivatives and integrals of logarithmic, exponential, and inverse trigonometric functions; techniques of integration; infinite series; and related applications.

General Education Category: Advanced Quantitative/Scientific Reasoning.

Prerequisite: MATH 212

Offered: Fall, Spring, Summer.

MATH 220 - Formalizing Mathematical Thought (4)

This course is an introduction to abstract and generalized thinking including formal mathematical proof. Students cannot receive credit for MATH 220 if credit was received for MATH 300.

Prerequisite: MATH 143, MATH 144, and MATH 209.

Offered: Fall (alternate years - even-numbered years.)