



Pittsburg State University
College of Arts & Sciences Program Guide

Degree: Bachelor of Science
 Major: Mathematics
 Emphasis/Option:
 Minor (if required): Required

As of Fall 2017

Major (Mathematics) Core Requirements

(49 hours)

| | |
|---|---|
| MATH 150: Calculus I | 5 |
| MATH 155: Calculus II | 5 |
| MATH 212: Matrix Algebra | 2 |
| MATH 253: Calculus III | 3 |
| MATH 413: Introduction to Mathematical Thought | 3 |
| MATH 513: Discrete Structures | 3 |
| MATH 543: Probability and Statistics | 3 |
| MATH 553: Differential Equations | 3 |
| MATH 557: Introduction to Analysis | 3 |
| MATH 613: Abstract Algebra | 3 |
| MATH 617: Linear Algebra | 3 |
| MATH 699: Senior Seminar | 1 |
| CIS 230: Visual Basic Programming | 3 |
| or a computer programming course approved by the mathematics department | |
| Electives, minimum..... | 9 |
| (Electives must be selected from courses numbered above 253, exclusive of courses listed for elementary education majors MATH 304, MATH 307, MATH 503, MATH 705). | |

The degree requirements for a B.S. major in mathematics requires a minimum of 124 semester hours.

An appropriate minor is required.

GENERAL EDUCATION REQUIREMENTS

(40-45 hrs.)

Basic Skills 9 hours

| | | | |
|---------|-----|---------------------------------------|---|
| COMM | 207 | Speech Communication..... | 3 |
| ENGL | 101 | English Composition..... | 3 |
| ENGL | 190 | Honors English Composition | |
| OR ENGL | 299 | Introduction to Research Writing..... | 3 |

Sciences 8-9 hours

Natural Sciences (Select one)

| | | | |
|------|---------|-------------------------------------|---|
| BIOL | 111/112 | General Biology and Laboratory..... | 5 |
| BIOL | 113 | Environmental Life Science..... | 4 |
| BIOL | 211 | Principles of Biology I..... | 4 |

Physical Sciences (Select one)

| | | | |
|------|---------|---|---|
| CHEM | 105/106 | Introductory Chemistry and Laboratory..... | 4 |
| CHEM | 107/108 | Chemistry for Life Sciences and Laboratory..... | 4 |
| PHYS | 160/165 | Physical Geology and Laboratory..... | 4 |
| PHYS | 166/167 | Meteorology and Laboratory..... | 4 |
| PHYS | 171/172 | Physical Science and Laboratory..... | 4 |
| PHYS | 175/176 | Descriptive Astronomy and Laboratory..... | 4 |
| PHYS | 375/176 | Solar System Astronomy and Laboratory..... | 4 |

Social Studies 3 hours

| | | | |
|-----|-----|--------------------------------------|---|
| SOC | 100 | Introduction to Sociology..... | 3 |
| WGS | 200 | Introduction to Women's Studies..... | 3 |

Political Studies (Select one) 3 hours

| | | | |
|------|-----|---|---|
| POLS | 101 | U.S. Politics..... | 3 |
| POLS | 103 | Comparative Political Institutions..... | 3 |

Producing and Consuming 2-3 hours

(Select one from one of the following two categories)

Economy

| | | | |
|------|-----|--|---|
| ECON | 191 | Issues in Today's Economy..... | 3 |
| FCS | 230 | Consumer Ed. and Personal Finance..... | 3 |

Technology

| | | | |
|------|-----|--|---|
| EET | 247 | Computer Programming for Electronic Sys..... | 3 |
| GT | 190 | Introduction to Technological Systems..... | 2 |
| GT | 350 | Technology and Civilization..... | 3 |
| EDTH | 330 | Technology for the Classroom..... | 3 |
| TE | 551 | Integrated Technology for Educators..... | 3 |
| TM | 350 | Societal Influence of Technology..... | 3 |

Fine Arts and Aesthetic Studies (Select one)..... 2-3 hours

| | | | |
|-----|-----|---|---|
| ART | 155 | Printmaking and Paper Arts..... | 3 |
| ART | 178 | Introduction to the Visual Arts..... | 3 |
| ART | 188 | The Designed World..... | 3 |
| ART | 217 | Crafts I..... | 3 |
| ART | 222 | Jewelry Design I..... | 3 |
| ART | 233 | Drawing I..... | 3 |
| ART | 244 | Ceramics I..... | 3 |
| ART | 266 | Sculpture I..... | 3 |
| ART | 277 | Painting I..... | 3 |
| ART | 288 | Introduction to Art History I..... | 3 |
| ART | 289 | Introduction to Art History II..... | 3 |
| ART | 311 | Art Education..... | 3 |
| ART | 351 | Printmaking, Papermaking, Bookarts and the Letterpress..... | 3 |
| ART | 430 | Automotive: Art and Design..... | 3 |

| | | | |
|-------|-----|---------------------------------------|---|
| COMM | 105 | Performance Appreciation..... | 3 |
| COMM | 205 | Performance Studies..... | 3 |
| COMM | 295 | Theatre History..... | 3 |
| ENGL | 250 | Introduction to Creative Writing..... | 3 |
| HHP | 151 | Dance Appreciation..... | 3 |
| MUSIC | 120 | Music Appreciation..... | 3 |
| MUSIC | 121 | Introduction to Music Literature..... | 2 |

Cultural Studies (Select one) 3 hours

| | | | |
|------|-----|--|---|
| ANTH | 101 | Introduction to Cultural Anthropology..... | 3 |
| MLL | 114 | Chinese Language and Culture I..... | 3 |
| MLL | 124 | French Language and Culture I..... | 3 |
| MLL | 154 | Spanish Language and Culture I..... | 3 |
| MLL | 184 | Russian Language and Culture I..... | 3 |
| MLL | 194 | Korean Language and Culture I..... | 3 |
| GEOG | 106 | World Regional Geography..... | 3 |
| GEOG | 300 | Elements of Geography..... | 3 |
| GEOG | 304 | Human Geography..... | 3 |
| WGS | 399 | Global Women's Issues..... | 3 |

Health and Well Being 4-6 hours

Psychological

| | | | |
|-------|-----|-------------------------|---|
| PSYCH | 155 | General Psychology..... | 3 |
|-------|-----|-------------------------|---|

Physical (Select one)

| | | | |
|------|-----|------------------------------------|---|
| FCS | 203 | Nutrition and Health..... | 3 |
| FCS | 301 | Nutrition..... | 3 |
| HHP | 150 | Lifetime Fitness Concepts..... | 1 |
| NURS | 303 | Introduction to Public Health..... | 3 |

Human Heritage 6 hours

(Select one from two of the following three categories)

History

| | | | |
|------|-----|---------------------------------|---|
| HIST | 101 | World History to 1500..... | 3 |
| HIST | 102 | World History from 1500..... | 3 |
| HIST | 201 | American History to 1865..... | 3 |
| HIST | 202 | American History from 1865..... | 3 |

Literature

| | | | |
|------|-----|--------------------------------|---|
| ENGL | 113 | General Literature..... | 3 |
| ENGL | 114 | General Literature(Genre)..... | 3 |
| ENGL | 116 | General Literature(Theme)..... | 3 |
| ENGL | 120 | Literature and Film..... | 3 |
| ENGL | 315 | Mythology..... | 3 |
| ENGL | 320 | Literature and Film..... | 3 |

Philosophy

| | | | |
|------|-----|---------------------------------|---|
| PHIL | 103 | Introduction to Philosophy..... | 3 |
| PHIL | 105 | Ethics..... | 3 |
| PHIL | 112 | Biomedical Ethics..... | 3 |
| PHIL | 113 | Business Ethics..... | 3 |
| PHIL | 114 | Environmental Ethics..... | 3 |
| PHIL | 207 | Critical Thinking..... | 3 |
| PHIL | 208 | Logic..... | 3 |
| PHIL | 231 | World Religions..... | 3 |

Notes CIS 230 OR 240 satisfies the General Education requirements.

NOTE: The information contained herein is intended to be used for the planning of a student's academic program and does not constitute a contract. While this guide was prepared with the latest information, courses, graduation requirements, and curricula are subject to change.

When a student attains 85 semester hours of credit (including current enrollment) the student must apply for a degree check in the Office of the Registrar (Degree Checking Section), Room 102 Russ Hall.

MINIMUM GENERAL REQUIREMENTS: The minimum requirements for graduation include 124 semester hours of which 60 hours must be from a four year university. In addition, 45 semester hours must be upper division and 30 hours in residence at PSU (including 24 of the last 30). Minimum GPA for non-education degree is 2.0 overall [2.0 in major], secondary education degree is 2.5 overall [2.75 in major], and early/late childhood/unified degree is 2.80 overall [3.0 in major]. A minimum GPA of 2.0 in any minor and in residence coursework is required. General Education and all degree requirements are provided in the online catalog. Refer to individual departments for specific requirements.