

# Bachelor of Science Degree **Mathematics** [Traditional Track] 2005-2006

## Department of Mathematics

638 Wachman Hall (215) 204-7841

**Chairperson:** Dr. Omar Hijab

**Faculty Advisor:** Dr. Boris Datskovsky

<http://math.temple.edu>

- 123 credits, 90 of which must be in CST/CLA courses
- 45 credits must be upper level (UL) coursework in either CST/CLA or UL course(s) that can be credited towards the major or declared 2nd major/minor chosen in consultation with an advisor.

- Appropriate Core Curriculum requirements:
  - Traditional
  - Core 45
  - Core to Core

- The following requirements for the Mathematics Major

**Math Sequence:** 0045 > C073 > C074 > C085 > 0086

### First Year

- Calculus I (Math C085 or H095) ♦
- Calculus II (Math 0086 or H096) ♦
- Elementary Classical Physics I (Physics C087) ♦
- Elementary Classical Physics II (Physics C088) ♦
- Programming (CIS C061, 0067, 0068 or C071) ♦
- Programming (CIS C061, 0067, 0068 or C071) ♦

### Second Year

- Calculus III (Math 127) [prereq: Math 0086 w/ "C" or better]
- Linear Algebra (Math 0147) ♦ must be taken before math W205 or 247
- Intro to Probability (Math 0233) [prereq: Math 0086 w/ "C" or better; co-req: Math 0127]
- Differential Equations I (Math 0251) ♦

### Third Year

- Numerical Analysis (Math 0253) [prereq: CIS programming, Math 0127 and either Math 0147 or 0148]
- Advanced Calculus I (Math 0247) [prereq: Math 0127]
- Advanced Calculus II (Math 0248) [prereq: Math 0247]
- Modern Algebra (Math W205) ♦
- Math Elective (200+) or choose from list below\* ♦

### Fourth Year

- Senior Prob Solv (Math W363) [prereq: Math W141 or W205, & 0248]
- Complex Analysis (Math 0347) [prereq: Math 0247, 0248]
- Math Elective (300+) ♦

\***Actuarial Science** 0305, 0306, **Chem** 0231, 0232, **CIS** 0211, 0242, **Econ** 0241, **Physics** 0187, 0188, 0201, 0202, 0211, 0231, 0306

♦Courses have pre- and/or co-requisites, consult course descriptions for details.

## Traditional Core

For students starting as freshmen or transferring with fewer than 45 credits.

- English C050 \_\_\_\_\_
- American Culture \_\_\_\_\_
- The Arts \_\_\_\_\_
- Individual and Society \_\_\_\_\_
- Studies in Race \_\_\_\_\_
- Foreign Language 2<sup>nd</sup> level\* \_\_\_\_\_
- Foreign Language 3<sup>rd</sup> level\* \_\_\_\_\_
- International Studies\* \_\_\_\_\_
- International Studies (non western)\* \_\_\_\_\_
- Science and Technology (SA) \_\_\_\_\_
- Science and Technology (SB) \_\_\_\_\_
- Quantitative Reasoning (QA) \_\_\_\_\_
- Quantitative Reasoning (QB) \_\_\_\_\_
- Intellectual Heritage X051 \_\_\_\_\_
- Intellectual Heritage X052 \_\_\_\_\_
- Writing Intensive Elective \_\_\_\_\_
- Writing Intensive Elective (Must be taken at Temple) \_\_\_\_\_
- Writing Intensive in Major (Must be taken at Temple) \_\_\_\_\_

### \*B.S.

- 2 International Studies (IS) 1 non western or
- 2<sup>nd</sup> level of a language + 1 IS or
- 3<sup>rd</sup> level of a language /Exempt^

## Core 45 +

For students receiving 45 credits or more in transfer.

- English C050 \_\_\_\_\_
- American Culture \_\_\_\_\_
- The Arts \_\_\_\_\_
- Individual and Society \_\_\_\_\_ } 2 of the 3
- Studies in Race \_\_\_\_\_
- Science and Technology (SA or SB) \_\_\_\_\_
- Quantitative Reasoning (QA or QB) \_\_\_\_\_
- Intellectual Heritage X051 or X052 \_\_\_\_\_
- Writing Intensive Elective (Must be taken at Temple)
- Writing Intensive in Major (Must be taken at Temple)
- Foreign Language\* \_\_\_\_\_
- International Studies\* \_\_\_\_\_

### •B.S.

- 1 International Studies (IS) or
- 2<sup>nd</sup> level of a language/Exempt^

## Core to Core

For students who have completed an approved Associate's degree from a college that has an established transfer agreement with Temple.

- Writing Intensive Elective (Must be taken at Temple) \_\_\_\_\_
- Writing Intensive in Major (Must be taken at Temple) \_\_\_\_\_
- Library Skills (TILT) [www.library.temple.edu](http://www.library.temple.edu)  
(Must be taken in order to graduate)

^If English is your second language, speak with an advisor about possible exemption.  
Revised 7/7/05