



Matriculating **Sophomore** Bioengineers

UG

Pièce de résistance of the
UG Program

**HAND
BOOK**

Best **source** for program
requirements & more...

Living document

BIOE

(current slides accessible through
appendix I: **Matriculating
Sophomore Bioengineers**)

UG

**HAND
BOOK**

BIOE

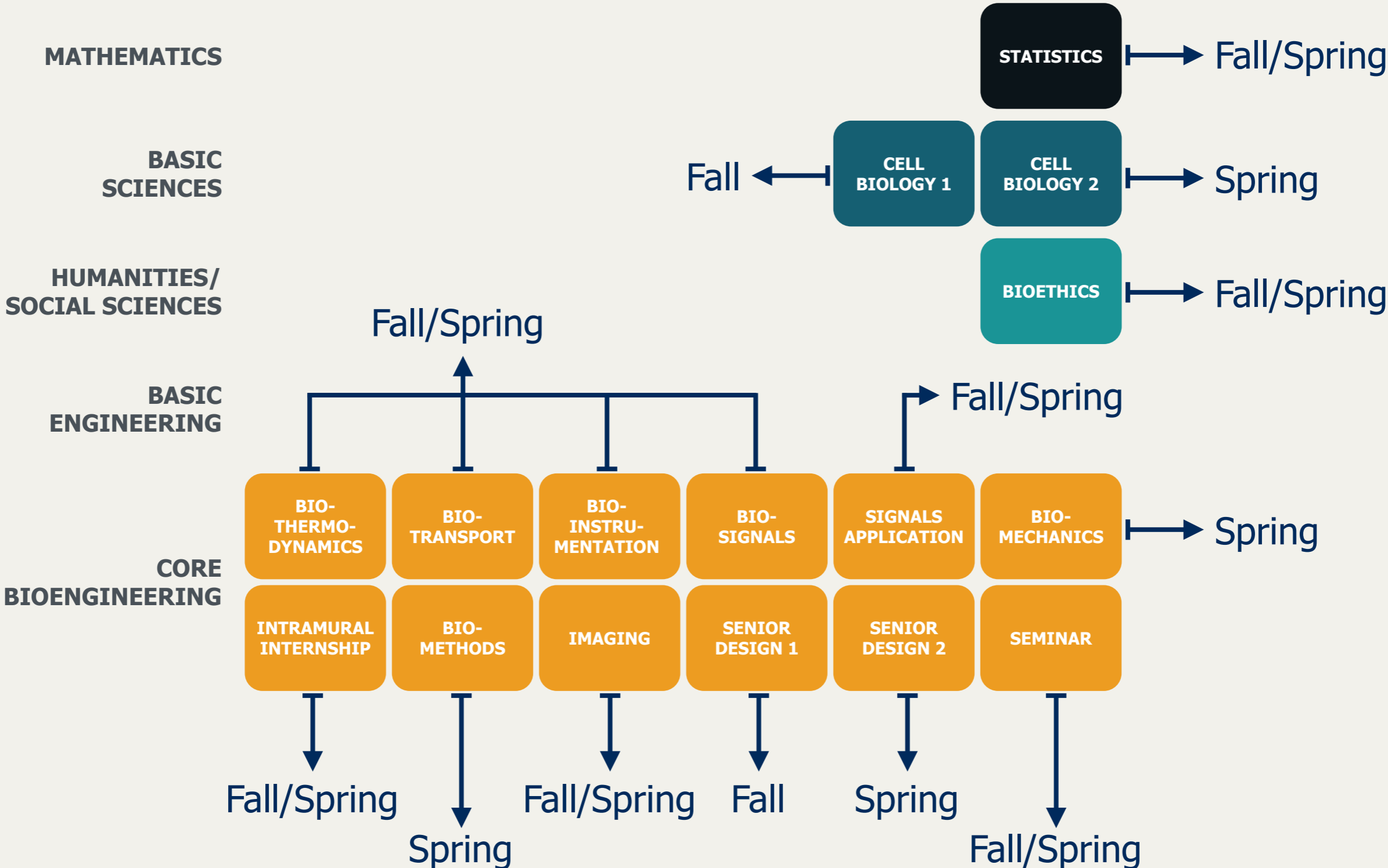
Please avoid googling the department website as you may link to older pages that are no longer maintained

Please **do not** download the handbook as it is a **living document**

Bioengineering Undergraduate Program



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Bioengineering Undergraduate Program



First-Year Courses

- May have **AP** or other **Transfer Credits**
- May have taken more **advanced courses**
- Hopefully, will have completed **Calculus 1 & 2, Physics 1 & 2, Chemistry 1 & 2, Engineering Analysis & Computing, and English Composition 1 & 2** by Fall semester of sophomore year

Fall Semester | Sophomore-Year Courses

Calculus 3 (**MATH 0240**, 4 credits)

Differential Equations (**MATH 0290**, 3 credits)

Cell Bio 1 (**BIOENG 1070**, 3 credits) → Fall only course

Biology Lab (**BIOSC 005x** or **BIOSC 006x**, 1 credit)

Statics (**ENGR 0135**, 3 credits)

BioE Seminar (**BIOENG 1085**, 0 credits)

Other Courses

BioE Seminar (BIOENG 1085, 0 credits)

You **must** register for **BIOENG 1085** every semester

Six (6) S grades in **BIOENG 1085** are required for graduation (special case applies to semester abroad)

Attending seminar during **first semester of sophomore year** is a **requirement**

However, after first semester of sophomore year, you are permitted to enroll in a class that has a time conflict with seminar

Other Course Suggestions

TRACK	COURSE/CHOICE
Bioimaging & Signals	CHEM 0310 (OCHEM 1)
Biomechanics	CHEM 0310
Cellular Engineering	CHEM 0310
Medical Product Engineering	CHEM 0310 or BIOENG 1024 or MEMS 0024 or IE 1051

CHEM 0310 and **CHEM 0320** (OCHEM 2) are approved Track Courses for all BioE Tracks

Pre-med students can choose any Track! Pre-med students should plan to take **CHEM 0310** in Fall & **CHEM 0320** in Spring (w/ **CHEM 0345** — lab, 2 credits)

Other Course Suggestions Cont.

In case you have completed some of the **sophomore-year courses**, you can consider:

Completed **MATH 0240** → consider biostatistics (**BIOENG 1000**, 4 credits) or bioinstrumentation (**BIOENG 1310**, 3 credits)

Completed **MATH 0290** → consider linear algebra (**MATH 0280**, 3 credits) or biothermodynamics (**BIOENG 1210**, 3 credits)

Completed **CHEM 0310** → consider **CHEM 0320** (& possibly **CHEM 0345** towards a Chemistry Minor)

If you have **AP** credit for **BIOSC 0160** — consider human physiology (**BIOSC 1250**, 3 credits)

BIOENG-Designated Courses

Please note that **BIOENG**-designated courses are **not offered** during the Summer Term

Prior to officially entering the Bioengineering Program, you require permission codes to **enroll** in **BIOENG**-designated courses

Kindly stay tuned for further communication from the department undergraduate administrator (BIOEUGAD@pitt.edu)

Important Notes

Students are responsible for knowing degree requirements
Peruse chapters 1 & 2 of the handbook

Students are responsible for selecting courses
Be cognizant about semester offerings (Fall/Spring),
level (Soph/Jr/Sr), and pre-requisites

Students will be assigned a departmental faculty advisor
during their junior year

Looking Ahead

Differential Equation & PHYS 0175 & chemistry 2 pre-requisites of biothermodynamics (BIOENG 1210, 3 credits)

MATH 0240 & PHYS 0175 pre-requisites of bioinstrumentation (BIOENG 1310, 3 credits)

ENGR 0135 pre-requisite of biomechanics 1 (BIOENG 1630, 3 credits)

BIOENG 1070 pre-requisite of Cell Bio 2 (BIOENG 1071, 3 credits → Spring only course)

Contact Information

Prof. Arash Mahboobin (mahboobin@pitt.edu)

Office: 302D Benedum Hall

Office Hours: By [appointment](#) or open-door policy



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