

PHY 386/486 – Undergraduate Research I/II
Department of Physics, Astronomy, and Materials Science
Missouri State University

The following document contains important information about the policies and procedures as it relates to a successful completion of both **PHY 386** and **PHY 486**.

I acknowledge receiving the **PHY 386/486 Policies and Procedures** document that describes how to complete a PHY 386/486 project, select a project advisor, and form an Advisory Committee before registration for PHY 386.

I understand that I should consult **several faculty members (from any discipline) in the department** prior to selecting an advisor.

I understand that both PHY 386 and 486 are **seated classes** that meet weekly on a specific day and time.

I understand that I must **pass the Major Field Achievement Test (MFAT)** prior to graduation.

I understand that I must **meet with the Department Head for an EXIT interview** prior to graduation.

Date: _____

Student Name: _____

Student Signature: _____

PHY 386/486 Policies and Procedures
Department of Physics, Astronomy, and Materials Science
Missouri State University

A student is eligible to enroll in PHY 386 after completing 80 credit hours of course work. Before enrolling in PHY 386, students are advised to satisfy the following specific course requirements:

- (1) Completion of: PHY 203, 204, 375, and 385.
- (2) Completion of at least one of: PHY 333 or 353; and
- (3) Completion of at least one of: PHY 325, 343, 476, or MAT 580.

Introductory Information for the Student:

- Fill out the top page of this document for departmental records.
- Find a faculty member (from any discipline within PAMS) to serve as your project advisor. Make sure you consult with several faculty members before choosing.
- Form an Advisory Committee which comprises your advisor and two other faculty members (of which at least one must be from a discipline within PAMS). The members of the Advisory Committee will sign the Signature Slip of this document. Electronic signatures are accepted.
- Submit the signed sheet to the PHY 386 instructor for their signature. The PHY 386 instructor keeps the document.
- Obtain permission to register for PHY 386 from the Department Head or the Administrative Assistant.

PHY 386 Course Requirements:

- Prepare a written feasibility study, including an appropriate literature search, with the guidance of your advisor. This study typically takes a full semester and may include preliminary results.
- Submit the feasibility study to the Advisory Committee no later than a week prior to your oral presentation. A copy must also be sent to the PHY 386 instructor.
- Present your study before the Advisory Committee on Study Day (the Friday before finals week).
- The Advisory Committee will evaluate the report and the presentation and determine whether you pass, must make modifications to pass, or fail the course. The evaluations will be submitted to the PHY 386 instructor.
- The PHY 386 instructor will submit your written feasibility study and the evaluation forms to the department office. The PHY 386 instructor will also enter your grade.

PHY 486 Course Requirements:

- *If* you pass PHY 386, the PHY 386 instructor will send the Signature Slip to the PHY 486 instructor for their signature. The PHY 486 instructor keeps the document and gives you permission to register for PHY 486.

- Complete the proposed project with the guidance of your project advisor. The project typically takes a full semester.
- Prepare a written report of the result of the project, including appropriate references, in the format required by the Journal of Undergraduate Research in Physics.
- Submit the project report to the Advisory Committee no later than a week prior to your oral presentation.
- Present your study before the Advisory Committee on Study Day (the Friday before finals week).
- The Advisory Committee will evaluate the report and the presentation and determine whether you pass, must make modifications to pass, or fail the course. The evaluations will be submitted to the PHY 486 instructor.
- The PHY 486 instructor will submit your project report and the evaluation forms to the department office. The PHY 486 instructor will also enter your grade.

The Major Field Achievement Test (MFAT) must be taken prior to graduation.

The student should notify the PHY 486 instructor of their need to take the test. The PHY 486 instructor will coordinate with the Testing Center on campus regarding the procedures and scheduling for taking the test. A pass/fail report on the outcome of this exam will be submitted to the PHY 486 instructor by the Testing Center.

The PAMS Exit Interview will also take place during the last week of classes.

The student will need to schedule this with the Administrative Assistant who will send the student a PAMS exit interview questionnaire that they will fill out and bring with them to the interview.

PHY 386/486 – Signature Slip
Department of Physics, Astronomy, and Materials Science
Missouri State University

Student Name: _____

Faculty Advisor for the project: _____

I, _____, agree to work with the above student.
(Signature of faculty advisor)

Date: _____

Instructor-of-record approval for PHY 386: _____

Date: _____

Instructor-of-record approval for PHY 486: _____

Date: _____

Advisory Committee members (in addition to the project advisor):

1. Name: _____

Signature: _____

2. Name: _____

Signature: _____