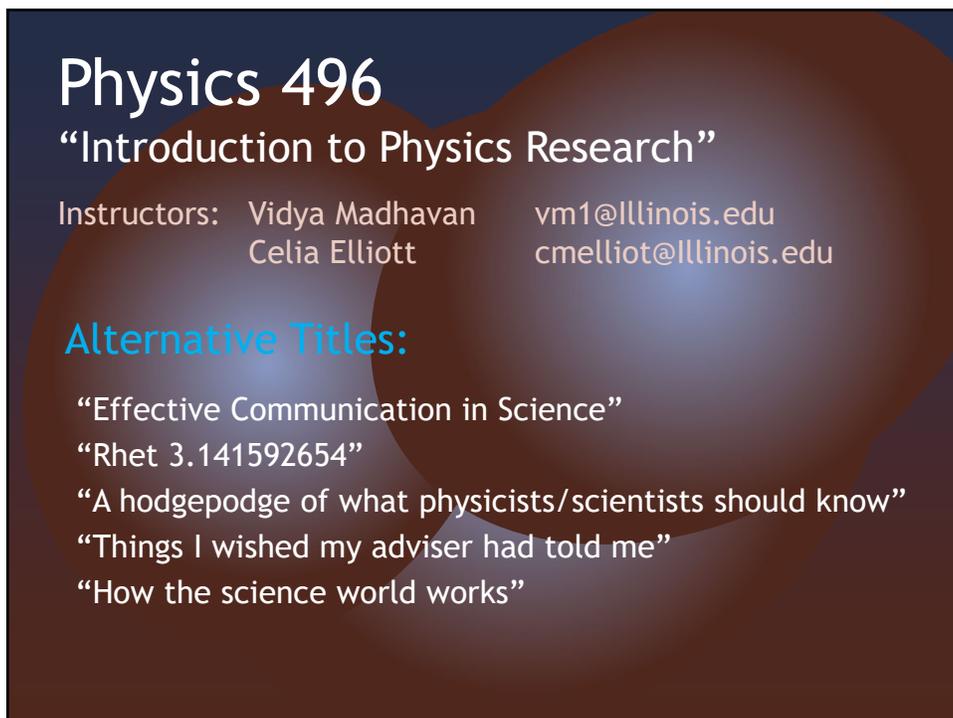


1



2

# Our goals for you in PHYS496

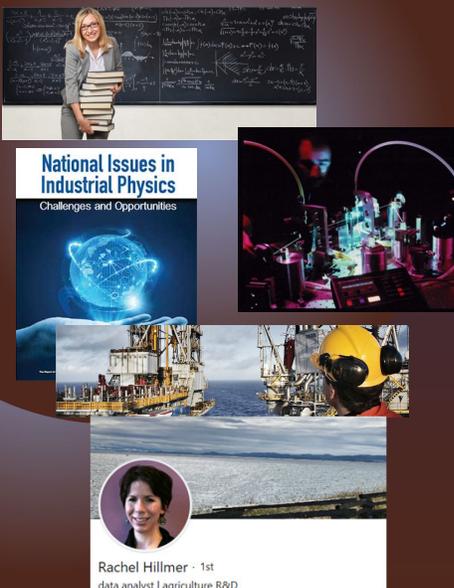
- Help you learn to think critically**  
About others' work and yours!
- Help you learn methods to write and speak persuasively**  
The scientific community (and just about everyone else!) tends to be skeptical, so you can't rely just on great results!
- Help you learn to navigate the scientific literature**  
Researching existing literature is critical for planning future work, writing proposals, writing papers, being scientifically literate
- Teach you how the "world of science" works**

**We want to teach you how to become effective scientists and communicators!**

3

# PHYS496

- Useful if you want to go to graduate school, academia
- Useful for graduate school, industry
- Useful for undergraduate degree, industry
- Useful for undergraduate degree, anything!



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## Components of the Course

### Writing, Speaking, & Presentation Skills

Writing workshops, journal club, colloquium reports, figures, communicating with non-scientists,...

### Resources for Scientists

How to use on-line databases useful for research

### Scientific Ethics

Case studies

### Exposure to Physics Research & Careers

Invited speakers, colloquia, journal club

5

## Our expectations of you

**In-class participation:** mandatory attendance

### Written assignments

Don't start too late!

We prefer a Word file via email, but an emailed pdf file is OK

### Feedback on your classmates' writing

### Oral presentations

Professional and polished

Plan to use PowerPoint (sent to me via email) on my laptop

6

## A Word about Plagiarism

Never copy phrases longer than 3-4 words

Never copy phrases  
longer than 3-4 words

Providing a citation to a bibliographic entry  
or footnote does not make copying words OK

### Includes:

Figure captions

Text from published paper

Text from paper you are working on with adviser

Websites

7

## Direct Quotes

Celia said “Never copy phrases  
longer than 3-4 words.”

Uncommon to have direct quotes in  
scientific writing

You can quote only words that someone  
said in person, in an email, over the  
phone, or in a letter **to you**.

8

# Comments

You will get out as much as you put in

Talk with us if you have questions regarding homework, plagiarism, life/career issues, ...

This course is an opportunity to ask us questions about whatever you'd like to know regarding physics, careers, communication in science, publishing, funding, ...



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