

Syllabus-Revision 1
Rutgers, The State University of New Jersey-Camden Campus
56:160:601/602 Seminar in Chemistry
Fall 2024
Department of Chemistry

Class Description:

The seminar in chemistry introduces the techniques and styles of technical oral presentation generally accepted by the scientific community and professional chemists. The course consists of a series of presentations given by current students, local researchers, and outside researchers from other universities, and industrial and governmental laboratories.

Purpose:

The purpose of the Chemistry Seminar is:

- To engage students in recent research in chemistry
- To develop skills in the oral and written presentation of scientific research
- To develop skills to locate relevant scientific literature and methods used to stay up to date with scientific literature.

Instructor: David Salas-de la Cruz, Ph.D., EIT

Associate Professor
Department of Chemistry
Center for Computational and Integrative Biology
Rutgers, The State University of New Jersey, Camden

Science Building, Room: 200A

Primary Phone: (856) 225-6147
Secondary Phone: (856) 225-6142
E-mail: david.salas@camden.rutgers.edu

Course Location and Time:

Wednesdays 3:45 pm to 4:35 pm

Location: SCI-Lecture Hall

Research Seminars

All **Chemistry Research Seminars** will be held on Thursdays at 12:45 pm except one seminar that will be held on Wednesday at 11:20 am. All seminars will be located in the Lecture Hall. **Lunch and beverages will be provided**

Note:

This course is an in-person course; however, no class will be offered during chemistry research seminar talks. Some research seminars will be held online. **Check your Syllabus and CANVAS email regularly.**

Attendance is Mandatory

Office Hours: By appointment in-person or using ZOOM OR WEBEX.

Textbooks:

There is no textbook for the course. All reading will be available on Canvas under Course Files. It is essential that you check your Rutgers email as all course announcements will be posted there.

Course Goals:

Students will develop an overall understanding of the principles of oral communication in chemistry including the development of presentation techniques, listening skills, critical analysis of scientific presentation, scientific literature, and participation in scientific discussion.

Learning Outcomes:

1. Demonstrate an ability to listen to a scientific presentation by asking relevant questions regarding the presented material.
2. Demonstrate the ability to critically evaluate research presented in an oral presentation and in a peer-reviewed scientific article by writing or presenting a report.
3. Demonstrate the ability to find relevant peer-reviewed scientific literature and distinguish between impact factor and altimetric by analyzing a series of journal articles.
4. Explain the differences between open-access and traditional journals.
5. Demonstrate the ability to present scientific materials through the delivery of a presentation.

Assessment:

The assessment for this course consists of various components each contributing to the final grade as outlined below.

Grading Assessment for 50:160:601

Hypothesis and Rationale Statement using EndNote	10%
Journal Article Presentation or Research Proposal/Data	20%
Scientific Analysis of Outside Speakers	50%
Resume	10%
Attendance	10%
Total	100%

Grading Assessment for 50:160:602

Two-Page Research Introduction using EndNote	10%
Practice Final Research/Project Presentation	20%
Scientific Analysis of Outside Speakers	50%
Resume and Letter of Intent	10%
Attendance	10%
Total	100%

Note: A total of three absences without a doctor's note will result in an automatic 10% deduction of the grade.

Assessment Descriptions:

1. **Peer-Review Article Finder:** It is critical for students to understand how to search and critique relevant scientific information. In this exercise, students will find pre-selected relevant and up-to date topics related to their projects/interests in chemistry and present findings in a brief presentation. The students must differentiate between impact factor and altimetric. Students will learn how to use EndNote for referencing articles and books.

2. ***One- or Two-Page Summary or Introduction:*** It is critical for the students to be able to summarize findings or explain results appropriately. In this exercise, the students will present a qualitative section of a selected paper from the previous assessment and, if applicable, relate it to their projects.
3. ***Journal Article Presentation:*** To foster scientific understanding and creativity, students must be able to critique a scientific paper. For the selected assessment, the students will present and explain a full peer-reviewed scientific paper that is related to their research/area of specialty by showing its content and relevant information including the utilization of other references.
4. ***Scientific Analysis of Outside Speakers:*** Students are required to attend oral presentation(s) by local and outside researchers. In this exercise, students must submit a **1-page critique** of an oral presentation that provides an overview, hypothesis, intellectual merit, broader impact, strength, and weaknesses.
5. ***Short Oral Presentation of Research Data or Project:*** Second year students are required to present relevant data to their investigation. In this scenario, a student is required to present a short presentation explaining several results from their investigation.
6. ***Practice Final Research /Project Presentation:*** Second year students are required to present their research thesis or project. In this assessment, the student is required to present, as practice, their research thesis presentation or project.
7. ***Resume & Letter of Intent:*** It is essential for second year students to be ready to find a job. In this assessment, students are required to prepare their resume and letter of intent.

The grading scheme is as follows:

A	100-90
B+	89-86
B	85-80
C	79-70
F	69 and below

Attendance:

Attendance is a large part of the final grade. ***Unexcused absences bring the risk of grade consequences.*** Absences normally impair both student proficiency and the accuracy of their instructor’s evaluations. Students with excessive absences may, at the discretion of the instructor, be given a failing grade in the course.” - Camden Undergraduate Catalog.

Other Policies and Student Expectations:

Academic Integrity and Student Code of Conduct

Rutgers University–Camden seeks a community that is free from violence, threats, and intimidation; is respectful of the rights, opportunities, and welfare of students, faculty, staff, and guests of the University; and does not threaten the physical or mental health or safety of members of the University community, including in classroom space, and a community in which students respect academic integrity and the integrity of your own and others’ work.

As a student at the University, you are expected to adhere to the [Student Code of Conduct](#) and [Academic Integrity Policy](#).

Academic Integrity is critical to the success of our students and the community and is everyone’s responsibility to take their education seriously and follow the requirements to ensure that you are doing your own work and following the guidelines of the course and professor and program.

Please Note: The conduct code specifically addresses disruptive classroom conduct, which means “engaging in behavior that substantially or repeatedly interrupts either the instructor’s ability to teach or student learning. The classroom extends to any setting where a student is engaged in work toward

academic credit or satisfaction of program-based requirements or related activities.” Please be aware of in-classroom and out-of-classroom expectations by making yourself familiar with and by following the Student Code of Conduct.

Center for Learning and Student Success

The Center for Learning and Student Success (CLASS) provides academic support and enrichment services for students, at no additional cost, including one-on-one tutoring, small group tutoring and workshops, online tutoring, writing assistance, student success coaching, learning assessment, and metacognition training. Through collaboration with academic departments and faculty, CLASS facilitates programs and provides academic resources to students. Our Learning Specialists provide learning-specific resources and support to students on academic or continued probation. CLASS is in Armitage Hall, second floor, suite 231. To learn more or to schedule an appointment, visit the [CLASS website](#), [email us](#) or call us at [\(856\) 225-6442](#).

Mid-Term Progress Reporting

Each semester, typically from Week 6 through Week 8, faculty are offered the opportunity to provide students with feedback regarding their academic performance. Mid-Term Progress Reports are intended to encourage students to reflect on their academic performance and to take action, if necessary, to improve their academic outcomes. Students are notified immediately and provided information regarding available resources via email if they receive a progress report indicating concern. Students can access the details of their current and past progress reports by signing into [Raptor Connect](#). Mid-Term Progress Reporting encourages communication among faculty, students, advisors, and student success staff, which is critical to our academic mission.

Chosen Name (Preferred Name), pronunciation, and pronouns

If you have a chosen name or preferred name or pronouns other than what is listed on the roster, let us know. If you would like to have your name changed officially on Rutgers University–Camden rosters, please follow our [Chosen Name Process](#).

In addition, within your Canvas course sites, the [Rutgers Shout-Out](#) tool allows you to type the phonetic spelling of your name and record the pronunciation of your name in a shared audio recording for your professor and fellow students.

Dean of Students Office—CARES Team

College is a time when you may be testing your independence and/or striving to find yourself. It’s not uncommon for these journeys to have rough points. The Dean of Students Office is here to assist you by strategically and effectively handling and referring student concerns/needs across all areas of the campus and University as needed. For some students, personal, emotional, psychological, academic, or other challenges may hinder their ability to succeed both in and outside of the classroom. The Dean of Students Office serves as your initial contact if you need assistance with these challenges. You can learn more about the free services by calling [\(856\) 225-6050](#), [emailing](#), or visiting the [Dean of Students website](#).

Office of Disability Services (ODS)—Students with Disabilities

If you need academic support for your courses, accommodation can be provided once you share a Letter of Accommodation issued by the Office of Disability Services (ODS) that specifies your accommodation indicated. If you have already registered with ODS and have your Letter of Accommodation, please share this with your instructor early in the course. If you have not registered with ODS and you have or think you have a disability (learning, sensory, physical, chronic health, mental health or attentional), please visit the [ODS website](#), [email](#), or call [\(856\) 225-6954](#).

Please Note: Accommodations will be provided only for students with a Letter of Accommodation from ODS. Accommodation Letters only provide information about the accommodation, not about the disability or diagnosis.

Help Desk (IT support and services)

For technical assistance, visit Help Desk in the Rutgers Student Computer Lab on the first floor of Robeson Library, call [\(856\) 225-6274](tel:856-225-6274) or [email](#). Help Desk support is available during [lab hours](#). Visit the [IT FAQ page](#) for information and documentation.

Paul Robeson Library (reference desk, study space, computer lab, resources)

We are here to help you succeed! Our dedicated library team will boost your library research skills via workshops and reference help. Our experts will help you find the latest resources to advance your research and strengthen your teaching. If we don't have what you are looking for, our team will get those items from partner libraries. Our vibrant exhibits and displays will tell you many new stories and our Rutgers–Camden faculty publications area will inspire you. Robeson Library is part of what makes Rutgers–Camden an exciting place to learn! More information is available on the [Robeson Library website](#).

Office of Military and Veteran Affairs—Veteran, Active Duty, & National Guard Member Services

The Office of Military and Veterans Affairs and Rutgers University–Camden support our students who have served and their family members, including providing explanations of benefits, referrals to resources on and off campus, supporting students who are deployed for active duty, and answering questions. If you need assistance and are an active duty, National Guard, or veteran (or are a family member), we can assist. Find more information by calling 856-225-2791 or visiting the [Office of Military and Veteran Affairs website](#)

Title IX and the Violence Prevention & Victim Assistance Office

Rutgers University–Camden strives to create a campus community free from discrimination and interpersonal violence and harm. If you have experienced sexual violence, domestic/dating violence, stalking or any form of sex or gender discrimination, help is available. The office for Violence Prevention and Victim Assistance provides support to students. For more information about VPVA or to schedule a time to speak with an advocate visit the [VPVA website](#). To report an incident or speak with the Title IX coordinator, please visit our [Title IX website](#). If you choose to disclose it to me, thank you for trusting me. I am obligated to report any disclosures to our title IX coordinator to ensure you receive the appropriate support and university response.”

Please Note: All Rutgers employees (other than those designated as confidential resources such as advocates, counselors, clergy, and healthcare providers as listed in Appendix A to Policy 60.1.33) are required to report information about such discrimination and harassment to the University. This means that if you tell me or any faculty member about a situation of sexual harassment or sexual violence, or other related misconduct, we must share that information with the University's Title IX Coordinator.

Wellness Center—Health and Wellbeing Resources

Health and well-being impact learning and academic success. Throughout your time in college, you may experience a range of concerns that can create barriers to your academic success. These might include illnesses, strained relationships, anxiety, high levels of stress, alcohol or drug problems, feeling down, or loss of motivation. The Wellness Center Medical and Counseling staff can help with these or other issues you may experience. You can learn about the free, confidential medical and mental health services available on campus by calling [\(856\) 225-6005](tel:856-225-6005), visiting the [Wellness Center website](#), or visiting the Wellness Center on the 2nd Floor of the Campus Center.

Wellbeing—National and State Resources in Alphabetical Order

- Crisis Text Line: text HOME to 741741
- Crisis Text Line for Students of Color: text STEVE to 741741
- National Domestic Violence Helpline: [\(800\) 799-7233](tel:8007997233) or text LOVEIS to 22522
- National Substance Abuse helpline, SAMHSA's National Helpline, [\(800\) 662-HELP](tel:8006624357) (4357)
- National Suicide Prevention Lifeline: [\(800\) 273-8255](tel:8002738255)
- [NJ HOPE line](http://njhope.org) website
- The Sexual Assault helpline at [\(800\) 656-HOPE](tel:8006564673) (4673)
- Trevor Lifeline (LGBTQ+): [\(866\) 488-7386](tel:8664887386)

Writing and Design Lab—Writing Support and Services

If you need assistance with writing, audio recordings, web creation, or other technology used in class for creating content, the Writing and Design Lab can help. They offer personal tutoring, workshops, and online assistance. You can learn more by emailing rutgers.wdl@rutgers.edu or visiting the [WDL website](http://wdl.rutgers.edu). From the website, you can schedule an appointment.

SCHEDULE

Week 1: 9/4 First Day of Class
Introduction and Expectations
Scientific Analysis of Outside Speakers Rubric
Preparation for Proposal and Thesis or Capstone Defense

Week 2: 9/11
Cont. Preparation for Proposal and Thesis or Capstone Defense
Your Thesis / Capstone Write Up

Week 3: 9/18
Hypothesis Based Research
How to Find Scientific Literature

Week 4: 9/25
Cont. How to Find Scientific Literature
Altmetric

Week 5: 10/2 No class due to Chemistry Seminar
Chemistry Seminar Thursday, October 3 at 12:45pm by Dr. Cristiano L. Dias,
Department of Physics, New Jersey Institute of Technology.

Week 6: 10/9
Endnotes

Week 7: 10/16 No class due to Chemistry Seminar
Chemistry Seminar **Wednesday, October 16 at 11:20am by Dr. Kyle Vinning, DDS,**
School of Dental Medicine and Department of Materials Science, University of
Pennsylvania

Week 8: 10/23
Publications/Ethics in Research

Week 9: 10/30 How to Prepare Your Resume and Letter of Intent

Week 10: 11/6: No class due to Chemistry Seminar
Chemistry Seminar Thursday, November 7 at 12:45pm by Dr. Sarah Seashols-William,
Department of Forensic Science, Virginia Commonwealth University

Week 11: 11/13 1st Year Research Paper Presentation 15min per student

Week 12: 11/20 No class due to Chemistry Seminar
Chemistry Seminar Thursday, November 21 at 12:45pm by Mr. Alex Maggitti, Senior
Clinical Development Scientist, DrugScan Inc.

Week 13 11/27 NO CLASS DUE TO THANKSGIVING

Week 14: 12/4 Practice Final Research/Project Presentation
Upload Resume & Letter of Intent

Week 15: 12/11 **Last Day of Class**
Cont. Practice Final Research/Project Presentation

Revisions History

Revision	Comments
1	Original