

Sabbatical Application

An eligible applicant who wishes to apply for a sabbatical leave submits an electronic application to the faculty senate president no later than October 15th of the year proceeding the year of the requested leave. The faculty senate president appoints a sabbatical review committee for the application. The sabbatical review committee consists of one faculty member designated by the applicant and two members recommended by faculty senate from senior faculty or experts in the field of study of the applicant.

Peter Surgent	John Lawrence	10/10/2023
Faculty Name	School Dean	Today's Date

1. The dates for which the leave is being requested.



2. The purpose for requesting the leave. The purpose must be one of the following:



To conduct independent research

X

To study pedagogy or a state-of-the-art functional area

- × To obtain further knowledge in a faculty discipline or functional area.
- 3. The plan shall specify the goals the faculty member will achieve while on sabbatical:

In the math classroom, students often ask "what good is this stuff?" A typical math textbook will introduce the topic, show examples without any application, then include a couple of application problems (roughly 80% non-applied math problems, 20% application problems). My new teaching method will focus on application (50% application, 50% skill building with non-applied problems). Students are more engaged and learn best when they know why they are doing what they are doing.

Goal-

Revamp two math courses, Intro to Statistics and Calculus I, to focus on applications and create application-based course materials.

4. A detailed description of the activity(ies) the applicant will be engaged in or the course(s) of study contemplated. The plan shall specify how the sabbatical activity will enhance student learning; how the applicant's contributions to his/her discipline will benefit the institution and faculty, and an analysis of how the sabbatical fits personal and professional goals and the goals of the college.

1. Research best practices in application-driven math classes.

2. Study Calculus-based physics to learn which physics applications can be incorporated into my Calculus Courses.

3. Create guided notes and lesson plans for Intro to Statistics and Calculus I. These notes will change how I teach these courses going from a traditional approach (80% non-application problems, 20% applied) to fifty percent application/fifty percent skill building. The notes will include embedded videos (will work well with the online class modality). Guided notes will essentially be mini-textbooks. I am imagining the notes being 6+ pages per week, or a total of 80+ pages for each course.

4. Create three semester projects for each course.

5. For the statistics course, prioritize DEI applications/examples. For example, it is very common in a statistic textbook to group populations into male and female. My examples will consider non-binary populations.

6. Create three exams per course that are at least 50% application problems. One additional benefit to this is that these types of problems are more difficult to find solutions online, reducing the need for proctoring.

7. Make guided notes, projects and exams available for all math faculty to use for both courses.

For goals (1) and (2), I plan to share what I learn by presenting to the math department during a department meeting. For goals (3) through (7) where I am creating content, I will share all of this with anyone teaching these courses by putting the resources in the math department Canvas shell.

The goals listed above will enhance student learning by focusing on the "why" which will contribute to the motivation, engagement and hopefully retention of students.

I have been planning on focusing my teaching on applications for a few years, but just have not had the time to revamp my courses. This sabbatical will provide the opportunity for me to reach this goal.

5. List of all courses taught

Here is a list, by semeter, of all classes I have taught.

https://coloradomtn-my.sharepoint.com/:x:/g/personal/psurgent_coloradomtn_edu/EVZNHf-ZE29GhVm5OkLN7jYBPqgDU-yNJ7lq AQo9zzVpxA?e=hyGpgf

6. Outline the scope of work for sabbatical leave in the form of a timeline

January/February 2025

1. Research best practices in application-driven math classes.

2. Study Calculus-based physics to learn which physics applications can be incorporated into my Calculus Courses.

February/March 2025

3. Create guided notes and lesson plans for Intro to Statistics and Calculus I. These notes will change how I teach these courses going from a traditional approach (80% non-application problems, 20% applied) to fifty percent application/fifty percent skill building. The notes will include embedded videos (will work well with the online class modality). Guided notes will essentially be mini-textbooks. I am imagining the notes being 6+ pages per week, or a total of 80+ pages for each course.

4. Create three semester projects for each course.

5. For the statistics course, prioritize DEI applications/examples. For example, it is very common in a statistic textbook to group populations into male and female. My examples will consider non-binary populations.

April/May 2025

6. Create three exams per course that are at least 50% application problems. One additional benefit to this is that these types of problems are more difficult to find solutions online, reducing the need for proctoring.

7. Make guided notes, projects and exams available for all math faculty to use for both courses.

7. Describe a plan for evaluation of effectiveness of sabbatical work

1. Survey students to gauge opinion on this type of instruction.

- 2. Compare DFW rates and retention rates with classes taught this way versus previous way.
- 3. Solicit opinion and feedback from other faculty members who adopt my created content.

8. Explain your plan for implementation of sabbatical findings

I plan to implement this new pedagogy approach that I develop after researching best practices and refreshing my Physics knowledge.

I plan to use all of my new materials that I create in my classes.

I plan to gauge student opinion on this method of teaching by surveying my students three times per semester.

9. Explain your plan to present findings to college and/or community stakeholders

I plan to present my findings to the SB faculty when we meet before semester start of FA25. I will present my findings to the math department at our first Math Meeting in FA25.

Please attach the following documents:



- a. Attach Current Curriculum Vitae
- b. Attach documentation of advance arrangements (if applicable)
- c. Attach letters of invitations to observe, interview appointments, when applicable.



d. Documentation from the applicant's school dean and campus VP that indicates the specific plan for how the integrity of teaching/program will be maintained during the faculty member's absence.



- e. Documentation from the school dean that notes the merit of the request and ranks the applications for sabbatical in priority order.
- A statement of all compensation to be received from sources directly related to the sabbatical leave activity(ies) or course(s) of study except to be received from CMC while on sabbatical. (If applicable)
- g. If international travel will be needed activity includes international travel as an integral component required to achieve the project objective, faculty shall consult with the CMC Risk Management Director to ensure foreign travel insurance coverage is in place covering foreign sabbatical activities. Attach Risk Management confirmation. (If applicable)
- h. If applicable, please include documentation/information regarding the following items such as risk management concerns, IRB approval, human subject research, survey creation and implementation, and so on.

10. Name one individual who would you like on your sabbatical review committee?

Joyce Treulieb



Sabbatical Applicant

Steamboat Springs Campus

Sabbatical Coverage for Spring 2025, Pete Surgent

To: Sabbatical Review Committee

From: Kevin Williams, JC Norling

Date: October 11, 2023

Re: Sabbatical Coverage

Dear Sabbatical Review Committee,

Pete Surgent is applying for a sabbatical in the Spring of 2025. We have a few adjuncts to help cover his load, we hired a new adjunct this fall, Victoria Renfro, who teaches on campus and in the CEPA program. We also have been utilizing a former engineering adjunct, Mike Kimble, to cover some classes as well. There might be potential for another full-time faculty to help cover some of the collegewide offerings.

Please let me know if you have any more questions or need more clarity.

Thanks,

JC Norling Date: 2023.10.13 09:11:03 -06'00'

Pete Surgent

Experience

August 2018-PresentColorado Mountain CollegeSteamboat Springs, CO

Associate Professor of Mathematics

• Taught 15-18 credits of developmental and college level mathematics each semester.

 Taught the following courses: Intermediate Algebra, College Algebra, Intro Statistics, Pre-Calculus, Calculus I, Calculus II, Calculus III and Introduction to Statistics as face-to-face, blended and online, both synchronous and asynchronous.

- Served on committees including Faculty Senate, Emergency Response Committee, Assistant Dean of Instruction Hiring committee.
- Advised students.
- Held five to seven office hours each week and additional office hours for all math students at the Steamboat campus.
- Created many videos for each of my classes, including online, remote, and face-to-face.

August 2019-PresentCommunity College of Colorado OnlineColorado

Adjunct Online Math Instructor

- Taught 6 to 12 credits of developmental and college level mathematics each semester in an asynchronous online format.
- Taught the following courses: Intermediate Algebra, College Algebra, Career Mathematics
- Attend regular Professional Development conferences.
- Support students online with Zoom meetings, emails and phone calls.

2005-2018Community College of Baltimore CountyBaltimore, MD

Associate Professor of Mathematics

- Taught 15-18 credits of developmental and college level mathematics each semester in various delivery methods including self-paced, traditional lecture, online and blended.
- Taught the following courses: Basic Mathematics, Beginning Algebra, Intermediate Algebra, Math for Liberal Arts Majors, Applied Algebra and Trigonometry for the Allied Health Sciences, College Algebra, Pre-Calculus, Calculus I, Calculus II, Calculus III and Introduction to Statistics.

- Conducted statistical research to determine success and to look for predictors of success for certain programs and classes offered at CCBC.
- Worked with colleagues to adopt Open Educational Resources including textbooks and the free online assessment tool called MyOpenMath for five college level mathematics courses.
- Served on numerous committees including a senate committee for student life, the Instructional Technology committee, several hiring committees to hire new full-time faculty, the hiring committee for the assistant dean of math and science, etc.
- Served as a Faculty Advisor for various Student Life affiliated groups. Prepared and advised students during service work and educational trips to Puerto Rico and to Rutland, Massachusetts.
- Chaired the college algebra course committee.

2004-2005	Archbishop Spalding High S	School Severn, MD		
High School Math Teacher				
Courses Taught: Geometry, Algebra II, Trigonometry.				
Education				
2015-Present	University of the Cumb	erlands Williamsburg, KY		
Doctorate of Philosophy- Educational Leadership				
• Started the program in Fall 2015. Anticipated graduation date is May, 2023.				
2011-2014	Boise State University	Boise, ID		
Master of Education	al Technology			
• 33 graduate credits in Educational Technology (4.0/4.0 GPA).				
• Program Des blends educat focuses on the today's learning	scription: The EdTech Program at Boise tional theory with applications of techno eoretical foundations, hands-on technolo ng environments.	e State is an online program that logy to pedagogy. Course work gy skills, and integration strategies for		
2003-2005	Towson University	Towson, MD		
Master of Science- Applied and Industrial Mathematics-				
• 39 graduate credits in mathematics (3.64/4.0 GPA).				
RESEARCH Analyzed Bal computer scie order to predi	I: Baltimore County Ground Water Reso timore County's well database by leadin ence majors using data mining technique ct well failure.	urce Evaluation g a team of undergraduate math and s and various statistical methods in		
1997- 2001	Salisbury University	Salisbury, MD		

Bachelor of Science- Mathematics Major with Computer Science Concentration- 3.7/4.0 GPA.

Sabbatical Coverage

Lawrence, John <jelawrence@coloradomtn.edu> Fri 10/13/2023 1:59 PM To:Surgent, Peter <psurgent@coloradomtn.edu> Pete,

You may use this for your upload regarding the Dean's message about coverage.

Pete and I discussed options for coverage including backfilling with adjuncts and other FT faculty around the college teaching online courses. I believe Pete and his ADI will find a manageable solution for the Spring of 2025.

Best, -John

JOHN LAWRENCE, PH.D.

Dean; School of Science, Technology, Engineering, and Math (STEM) <u>970.870.4413</u> office / <u>970.367.7010</u> cell / <u>jelawrence@coloradomtn.edu</u> He/Him/His

Colorado Mountain College 1275 Crawford Avenue / Steamboat Springs CO 80487 <u>ColoradoMtn.edu</u>



Sure, happy to help.

Joyce

From: Pollack, Justin <jpollack@coloradomtn.edu>
Sent: Saturday, October 28, 2023 1:43 PM
To: Treulieb, Joyce <jtreulieb@coloradomtn.edu>
Subject: You've been requested as a sabbatical reviewer

Hi Joyce,

I'm sorry to bother you on the weekend, and hope you are staying warm as our first winter storm comes in. Virginia and I are reaching out to you on behalf of Faculty Senate and the faculty to seek your engagement in the sabbatical review process for your colleague, Pete Surgent.

Process:

- We would need you and your group to review the sabbatical application materials submitted and provide a written memo of review to us **BY DECEMBER 1**.
- The memo of review should be from the entire group (about 4 faculty) with a statement of approval of the application OR suggestions/recommendations for improvement (in which case the applicant has 10 days to address recommendations and resubmit). The review will go to Pete through faculty senate leadership, and the reviewers themselves will remain anonymous unless you wish to disclose yourselves.

For now, we only need to know if you are willing to participate as reviewer. We have many applicants this year, thus, we need to recruit a number of faculty members for this process.

Can you please let us know by **Tuesday, October 31 at NOON**, if you DO NOT want to participate in this review work?

If we don't hear from you, we will assume you want to participate and will send out applicant review materials when committees have been set.

Thank you so much for your willingness to consider participating!

Sincerely,

Faculty Senate Leadership (Justin and Virginia)

Dr. Justin Pollack, N.D. *Professor of Biological Science, Health and Wellness* Faculty Senate President Pronouns: He/His (EI) series 970.406.1312 / jpollack@coloradomtn.edu

Colorado Mountain College Breckenridge & Dillon 107 Denison Placer Road, PO Box 2208 / Breckenridge, CO 80424

