Student Evaluation of Teaching

Instructor: Christensen, Jens

Course: Calculus II

26 surveys / 29 enrolled in MATH 162 C (MWRF 1120)

Student: 1

Reason: Major or minor requirement

Effort: I spent a lot of time on the homeworks and I practiced many problems from the past homeworks and from the textbook in order to study for the tests.

<u>Understanding & Appreciation</u>: It gave me a better understanding on the course subject. At first the difficulty of the class made me appreciate the course less but once I started to develop better study techniques I was once again able to appreciate the course.

<u>Intellectual Growth</u>: It challenged me very much and made me have to come up with different study techniques that worked better for me and for the way the tests were setup.

<u>Quality</u>: I think that the quality of teaching is very good, however I find it to sometimes to be too fast paced to the point where I feel that I have not understood one topic as we are moving on to the next one. I also think that the grading can be unfair because we only have four tests and a final with no extra work besides homework that can help our grade.

Student: 2

Reason: Major or minor requirement

Reason: Exploration of possible major or minor

Reason: Core or Areas of Inquiry (distribution) requirement

Reason: Interest in the course material

<u>Additional Reason(s)</u>: I want to be either a mathematical economics major or a math and economics double major so this course was necessary to achieve that. I also enjoyed calculus in high school and wanted to continue pursuing it in college because it was intriguing.

<u>Effort</u>: I spent a lot of time doing the homework and studying my notes after each class, particularly because the material wasn't coming as easily to me as previous math courses had. I spent hours each week working to understand the material and practice its applications as well as attending the professors office hours once or twice a week too.

<u>Understanding & Appreciation</u>: In terms of understanding, I learned a lot about this type of calculus, but struggled with the material from time to time. Despite not necessarily performing that well on tests, I feel that I retained a lot of the important information that I learned. For appreciation, I certainly have a greater appreciation for people who understand and can explain the material thoroughly, but I wouldn't say this course grew my interest in calculus.

<u>Intellectual Growth</u>: This course was humbling in that even when I worked extremely hard and studied tirelessly I still couldn't perform as well as I would have liked. It felt demoralizing, but realistically it probably helped shape my interests and show me what I really have an interest in studying. However, I think it improved my problem solving ability and the way in which I approached certain calculations.

<u>Quality</u>: As someone who is especially fond of discussion style learning I didn't really enjoy a super lecture intensive class, and one where student questions didn't lead to more in depth conversations in order to achieve an answer but rather were answered immediately and forced to be accepted with understanding or not. While I did like the professor's enthusiasm and humor, each class seemed to go the same way and eventually became monotonous. I would have appreciated more variety in methods of approach to teaching this material.

Student: 3

Reason: Elective outside major or minor

Reason: Interest in the course material

<u>Effort</u>: I attended every class and still had to spend a lot of time outside of class teaching the material to myself from youtube videos and other textbooks and spent at least 10 hours studying for each test.

<u>Understanding & Appreciation</u>: This course was a lot different from my previous calculus course - I didn't really enjoy the topics covered or find them interesting or rewarding at any point but I think that was just the course and I'm still glad I took it. <u>Intellectual Growth</u>: This course developed my learning skills and independence as I had to make sure I reviewed everything covered in class everyday after class on my own. I improved my time management skills while having to balance studying for this course with my other courses.

<u>Quality</u>: The quality of teaching was good for the most part, sometimes better than other times depending on the topic being taught. There were many times when I was confused or what was being written on the board was not fully explained but I still learned what I was supposed to learn for the most part.

Student: 4

Reason: Exploration of possible major or minor

Reason: Core or Areas of Inquiry (distribution) requirement

Reason: Interest in the course material

Student Evaluation of Teaching

Instructor: Christensen, Jens

Course: Calculus II

26 surveys / 29 enrolled in MATH 162 C (MWRF 1120)

Effort: I put a lot of effort into this course especially in studying for big exams.

<u>Understanding & Appreciation</u>: This course helped expand my understanding of calc II and explore the applications in which math is used in the real world.

Intellectual Growth: This course helped me learn how to properly study for college exams and will definitely help for future classes <u>Quality</u>: I really likes Professor Christensen's use of WebAssign for homework because of how easily accessible it is and how it takes us directly to the textbook if we have a question on a certain section. This was also a good way to prepare for tests. I also like his grading and the partial credit he gives as well as how he weights your best test scores the most and your worst test scores the least. I think he needs to improve the way he answers questions because they can sometimes be prolonged and he often shows us incorrect ways to answer questions so we avoid them, however this gets very confusing with the correct ways to solve questions.

Student: 5

Reason: Major or minor requirement

Reason: Exploration of possible major or minor

Reason: Other requirement

<u>Reason:</u> Interest in the course material

<u>Effort</u>: I worked hard on all the homework, making sure I understood how to do each question. I studied at least 3-4 days out from each test by redoing problems and taking practice quizzes and by working with other students. I went to office hours with questions.

<u>Understanding & Appreciation</u>: The professor made it an interesting and lively class to be apart of which made the course material more interesting. He presented it in a way that I could see the method of attaining the answer to later be able to deduce it on my own. It definitely made me want to take another math class even though this is not my intended major.

<u>Intellectual Growth</u>: It provided new problem solving skills that can be applied to things other than math. It also made me more open to trying something I am not so good at, which will expand my intellectual opportunities. Also, in general, math provides a new way of looking at the world and through that, a better understanding of how things work.

<u>Quality</u>: I think Professor Christensen does an excellent job of providing examples and methods for solving problems as well as spends a good amount of time addressing homework questions. He keeps the class lively and interesting and is open to answering questions about the material. I think it would be beneficial if he provided more explanations for why he did what he did.

Student: 6

Reason: Major or minor requirement

Reason: Interest in the course material

Effort: Not much effort was needed to do very well in this class. I rarely study for exam and receive very high grades.

<u>Understanding & Appreciation</u>: Some interesting tangential topics we're discussed that provided an insight into deeper levels of understanding.

<u>Quality</u>: Professor Christensen taught this class very well. He made the material as engaging as possible. However the pace of the class was too slow and as a result it was inevitably boring at times.

Student: 7

Reason: Core or Areas of Inquiry (distribution) requirement

Additional Reason(s): I let myself be talked into it and that was a mistake

Effort: Needed supplementary reading from the textbook and online video tutorials

<u>Understanding & Appreciation</u>: Will not be taking Calculus ever again but also that's because I really don't like Calculus it's not the way this class was taught

Intellectual Growth: Made me sure I'm not going to major in STEM

<u>Quality</u>: I think if we had small amounts of homework due every class instead of one big assignment due once or twice a week it would've helped understanding of the material better

Student: 8

Reason: Major or minor requirement

Additional Reason(s): Wanted to major in Math or Mathematical Economics.

Effort: I often went to office hours and spent plenty of time studying and doing the homework, however, since I liked the material it didn't seem like a chore.

Understanding & Appreciation: I definitely understand calc much better. The web assigns helped a lot for studying.

Intellectual Growth: I definitely enjoyed this course. It gave me more confidence in Math and my abilities and convinced me that I would want to major.

Student Evaluation of Teaching

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Course: Calculus II

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<u>Quality</u>: I love Professor Christensen! He's super helpful during office hours and just a nice human being as well. He was very available for helping us with the tough homeworks he assigned. Sometimes he can be a bit confusing with the stuff he goes over in class/what he writes on the board, but usually he does enough examples that you can catch on. So normally its not his teaching per say that I understand the material best from but it's the many examples he clearly goes over in class with that I begin to really understand the subject.

Student: 9

Reason: Major or minor requirement

<u>Effort</u>: We have about two homework assignments weekly which I really like cause I can spend real time on them to make sure I fully understand the material.

<u>Understanding & Appreciation</u>: I already really like calculus going into this class and that hasn I changed.

Intellectual Growth: Studying for tests in the class has definitely been a learning curve for me but learning those skills have been important.

<u>Quality</u>: The Professor seems to really care about what he teaches and making sure we understand it. It \Box s nice to have that kind of positivity. I really liked his teaching style too because he always gave us the rules and then demonstrated how they worked with lots of examples and those were really useful.

Student: 10

Reason: Major or minor requirement

Reason: Interest in the course material

<u>Effort</u>: I have dedicated numerous hours to studying the material for this class. I spend a great deal of time on all written and online homework, usually completing the assignments two times to ensure that I have absorbed the material. I read over all class notes at the end of every week of class and I follow along in the book with the material being presented in class.

<u>Understanding & Appreciation</u>: I truly feel that I understand Calculus better now than I did in the beginning. Having only taken AP Calculus AB, I was nervous about jumping into Calculus II, but I think that it was worth it because I have learned a great deal of new material that I believe to be able to effectively utilize.

<u>Intellectual Growth</u>: This course has definitely challenged me in a way that I have not been challenged before. I have had to dedicate a substantial portion of my time to studying and preparing for exams, as well as just trying to understand concepts. I believe that this challenge has helped me to grow as a student and to understand that sometimes a lot of work is necessary to do well in a class. It has also helped me to realize that I do not have to do incredibly well in every class. I have a B in the class as of right now. Normally that would stress me out but this is a difficult class and I really feel as though I am doing as well as the majority of my classmates. Overall, it has taught me a few lessons.

<u>Quality</u>: Professor Christensen is a very intelligent man who knows the material that he presents incredibly well. He is very knowledgable and his skills in Calculus are impressive. There are times when he does not always understand the questions asked during class, but he makes every effort to ensure that he does in fact answer the questions, whether that be during the actual class or during private, one-on-one office hours. I believe that he cares a great deal about the students who take this class and he truly wants them to understand the material. He is a fair grader, and his examinations are relevant to the topics covered in class. He is a very good professor.

Student: 11

<u>Reason:</u> Exploration of possible major or minor

Reason: Core or Areas of Inquiry (distribution) requirement

<u>Effort</u>: I always do the online assigned homework to completion, and study multiple hours the two days leading up to tests. <u>Understanding & Appreciation</u>: I didn't grow in my excitement for math, but that has nothing to do with the professor. I just realized that I don't want to continue doing math forever.

Intellectual Growth: Tests helped my studying techniques, and homework encouraged working with peers.

<u>Quality</u>: Professor Christensen is a good math teacher. It is obvious he loves what he does, and is always trying to get us excited about it as well. I think sometimes the grading systems on tests have been questionable, but that is generally the case. Homework could be worth maybe 15-20 percent instead of 10 percent, seeing as that is what the bulk of our time spent on this class outside of the classroom is spent on.

Student: 12

<u>Reason:</u> Exploration of possible major or minor

Additional Reason(s): I took Calc 1 and did very well in that.

Effort: I have put a lot of effort into this course and have studied far more than I did when I took Cale I.

Understanding & Appreciation: It has taught me a lot about the subject, but has not made me appreciate it.

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Intellectual Growth: It has not.

<u>Quality</u>: A strength is how it taught me when I am confused by how a professor teaches, to seek outside help. A weakness is the way this course is taught, is far more confusing than it has to be, and very unclear even during office hours.

Student: 13

Reason: Major or minor requirement

<u>Effort</u>: I put a decent amount of effort into this course, and really enjoyed every minute of it. The homeworks were challenging but reasonable, and Professor Christensen was very helpful in explaining anything that we did not understand. Tests were difficult, but not unreasonably so, and he taught the material well enough that it was well understood.

<u>Understanding & Appreciation</u>: This course was really well taught and so the understanding and appreciation for the subject are both quite high. I have been more of a math-science person for a while, and as a result tend to enjoy/be better at math and science classes, and this was no exception.

<u>Intellectual Growth</u>: This class was a really great introduction to the Math department and the level of academic rigor at Colgate. I have always been a quant person, and enjoyed calculus in high school, and continued to enjoy the new material (as well as the practical applications of it). This course really made me consider moving over to a math major, and it is still in the cards. <u>Quality</u>: I think the teaching quality was incredible for this course, I actually tried to take one of this professor's other courses taught next semester even (it ended up conflicting with something else). His sense of humor and ability to explain concepts in understandable and usually humorous ways (like modeling population with bunnies) made the class a real pleasure to attend. Professor Christensen has been my favorite teacher this semester, and I hopefully will have him again later on in my Colgate

career.

Student: 14

<u>Reason:</u> Exploration of possible major or minor

Reason: Core or Areas of Inquiry (distribution) requirement

<u>Effort</u>: I was eager to take Calculus 2 coming into the school year. Once I started the course, I found it very difficult, but I still tried to complete the assignments well and study for the tests.

<u>Understanding & Appreciation</u>: Math has always been my strongest and favorite subject, but this course has been discouraging towards my math skills.

Intellectual Growth: It has definitely challenged and demanded a lot from me.

<u>Quality</u>: I believe that the teacher does care about his students' well being and wants to offer help outside of class, which is excellent. I think that he goes too quickly in class and does not effectively explain every concept in great detail. I think overall that he is a good teacher though and he wants to make sure all of his students are doing well and are comfortable with the material.

Student: 15

Reason: Major or minor requirement

Reason: Core or Areas of Inquiry (distribution) requirement

<u>Effort</u>: I attended all lectures, completed the assigned problem sets and WebAssigns, and practiced problems outside of assignments in preparation for exams.

<u>Understanding & Appreciation</u>: I feel as though I understand the applications of calculus outside of math and have a better understanding of how various theorems can be applied in Calculus as well.

<u>Intellectual Growth</u>: By studying calculus, I have gained a better understanding of where certain equations are derived from both in my calculus course and my chemistry course. This has allowed me to gain a better understanding of the theories involved as opposed to fixating on why an equation is a certain way.

<u>Quality</u>: For the most part, I believe the course was well taught. However, I wish the professor had made himself more available as far as outside help and office hours.

Student: 16

Reason: Major or minor requirement

<u>Effort</u>: I spent much time on Webassign completing the assignments, as well as completing written assignments. I put much effort into studying for the exams and reading chapters that I did not understand.

<u>Understanding & Appreciation</u>: This course has allowed me to gain a more in-depth understanding of calculus and it \Box s uses. <u>Intellectual Growth</u>: This class has encouraged me to think independently about solving problems and using knowledge from previous math courses to create solutions to foreign-looking problems.

<u>Quality</u>: I thought that Professor Christensen did a good job teaching this class. He conveyed the information in a clear manner and offered many assignments to allow us to understand how to handle a variety of problems.

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Student: 17

Reason: Major or minor requirement

<u>Effort</u>: I am not very strong in calculus so I needed to put a lot of my own time and effort into understanding the material outside of class. I went into office hours when I had a question that I or my peers couldn't figure out on our own. Going in for help always benefited me since I had specific questions that he could answer and he was willing to sit with us while we resolved in and made sure that the answer was correct on the online source.

<u>Understanding & Appreciation</u>: This course made me appreciate how hard this subject can be. It made me become a better learner and focus extremely well and go into get help when I didn't understand something.

<u>Intellectual Growth</u>: As stated before I needed to learn how to be a better learner. Math had always come so easy to me so I never needed to go in for help and take extra time to do the homework and course work, but now it is the exact opposite. I needed to spend the most time on this course out of my four courses and I feel that I got exactly out of it what I put in.

Quality: The teaching was very well. The second time we went over something, whether it be for the web assign homework or he was recapping the last class, I understood the material. It was the specific times when we only went over it once in class that I had a hard time grasping the new concept and never fully understood it until I had to teach it to myself again before taking the test. The hardest part of this course was his grading. He is very fair but I feel as though it is very subjective instead of this is the exact answer and if you didn't get it, it's wrong. It very much relied on what the other students put for the answers to receive partial credit which I thought wasn't the most fair way of grading but it made sense when he explained that's how he grades the test at the beginning of the semester.

Student: 18

<u>Reason:</u> Exploration of possible major or minor

Reason: Interest in the course material

Effort: I put enough effort into this course to complete all, the assignments and do fairly well in the assessments. I regularly attended class but have not gone to office hours.

<u>Understanding & Appreciation</u>: This course furthered my understanding of calculus greatly and made me excited to delve more deeply into math as a subject.

Intellectual Growth: This course helped me grow in the area of clear concise communication.

<u>Quality</u>: This course has the highest quality teaching. The greatest strengths is clarity on all fronts. I never felt like I did not know what was expected on tests and in the classroom. Moreover, in class everything is broken down into simple parts that are easily digestible.

Student: 19

<u>Reason:</u> Exploration of possible major or minor

Reason: Elective within major or minor

Reason: Core or Areas of Inquiry (distribution) requirement

Reason: Other requirement

<u>Reason:</u> Interest in the course material

Additional Reason(s): Pre-Med requirement

Effort: I spend about 10 hours on this class a week.

Understanding & Appreciation: It made me appreciate the ability to understand math, not memorize it.

<u>Intellectual Growth</u>: It made me understand that the value of repeating problems. In college, not only do you need to understand the material, but you need to understand it well enough to complete the problems efficiently.

<u>Quality</u>: The quality of teaching of this class was very good. I could always find time to get extra help, and was provided resources for help outside of class. The HW was organized such that it was easy to study from. The tests were fair, but not easy. This is an ideal teaching environment. However, sometimes, I felt like the teacher, rushed through some items where I did not have enough time to take notes, and consider my questions on the topic.

Student: 20

Reason: Major or minor requirement

Reason: Reputation of the instructor

<u>Effort</u>: I spent lots of time completing the homework assignments each week and looked to the textbook for further clarification of course material.

<u>Understanding & Appreciation</u>: This course helped me to learn even more about the depths of calculus and expanded upon the concepts that I had previously learned in Calculus I.

Intellectual Growth: This course helped prepare me for Calculus III and other math classes I intend to take as part of my major requirements.

Student Evaluation of Teaching

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<u>Quality</u>: Prof. Christensen was great at providing ample time to help students fully understand all the course material. He also gave students plenty of opportunities to ask him questions about any challenges faced in the homework assignments.

Student: 21

Reason: Major or minor requirement

Reason: Interest in the course material

<u>Effort</u>: Out of all my courses, I put some of the most effort into this course. I definitely had to work hard to complete the homework assignments, and I studied a lot for the exams.

<u>Understanding & Appreciation</u>: I understand the material and appreciate the course subject. Before this course, I was not a big fan of calculus, but now I can say that I do not mind it. I see how it applies to life and how it may be useful in my future endeavors.

<u>Intellectual Growth</u>: It challenged and motivated me to become a better student. As a first year, I wanted to start off my college career on a good note. Therefore, I had to really work hard in all my courses including this one. Between the homework and the multiple exams, I had to learn to manage my time wisely. In addition, it happened that my chemistry exams and calculus exams always fell within a day of each other. Therefore, I learned to manage my stress during those weeks which will definitely be helpful in my life.

<u>Quality</u>: For the most part, I was pleased with the teaching in this course. I understood the course material, and he was always willing to answer all of our questions. However, there are times in which he does not know exactly how to do a web assign problem. I feel like it will be more beneficial if he did all of our homework out beforehand so when we come to class with questions, he will be able to give a concise and clear answer. Overall, I learned a lot and was able to be successful in this course.

Student: 22

Reason: Major or minor requirement

Reason: Interest in the course material

Effort: I put a fair amount of effort, alot of time spent outside of class working towards better understanding

<u>Understanding & Appreciation</u>: The course helped with my appreciation of the subject with constant quizizng with webassign (even though it was very tedious at times)

Intellectual Growth: I grew intellectually with better study habits

<u>Quality</u>: The teaching style was very interactive which would have been better if there were more class participation. He is very nice and understanding especially when i comes down to encouraging students to work

Student: 23

Reason: Major or minor requirement

<u>Reason:</u> Exploration of possible major or minor

Reason: Interest in the course material

<u>Effort</u>: I did all that was required of me in the time that it had to be done. I also sought help with any concepts I was having trouble with either from my professor during his office hours or from a peer. For each test I devoted at least an hour each day for a couple days before the test.

<u>Understanding & Appreciation</u>: After taking this course, I am now considering doing an applied mathematics minor. I did not think coming into this course that I would consider pursuing any other math courses, but this class has made me much more interested in the field of mathematics. I also believe after taking this course that what I learn in future math courses would aid me in pursuing a career within the sciences.

<u>Intellectual Growth</u>: This course showed me the creativity that lies in courses outside of the arts. I never considered math being a creative subject, but with so many options to solve each problem you have assume fairly early on which method is going to be most useful to you. After choosing a method, you must use creative methods occasionally to make it work. This course has also taught me the importance of intuition. You have to have a feeling upon looking at a problem as to how it may be solved so you can narrow down your options

<u>Quality</u>: I liked the environment of the professor's office hours. You could either pop in really quickly to ask a singular question or camp out in there while you finished the latest homework assignment. I also liked in office hours how my professor was willing to pour over every detail of your work for a problem to find the mistake within it. During class, this professor would be engaging, often using volunteers or analogies. The only problem I had with the teaching style was the pace of the class. I felt as though some classes we would cover three entirely different subjects.

Student: 24

<u>Reason:</u> Major or minor requirement <u>Reason:</u> Elective within major or minor

Student Evaluation of Teaching

Instructor: Christensen, Jens

Course: Calculus II

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Effort: This course has been challenging but Professor Christensen was very accessible and fair.

<u>Understanding & Appreciation</u>: This course helped me delve deeper into the topics I learned in BC Calculus in high school. Intellectual Growth: I have a better understanding of the material and feel prepared for all future math classes.

Quality: Professor Christensen is a great teacher who really cares about the material and is always open for questions. The only weakness is promptness of handing back tests. Some of the class work was not handed back super quickly.

Student: 25

Reason: Major or minor requirement

Reason: Exploration of possible major or minor

Reason: Interest in the course material

<u>Effort</u>: I always put effort into this course. Whether in completing web assign or the written homework, I effectively completed and learned from them. I feel putting in effort was beneficial to success in this class.

<u>Understanding & Appreciation</u>: This course added upon my previous knowledge of Calculus that I took in high school. I had a previous understanding of the course information, and this course increased my previous knowledge. This course dove deeper into conceptual topics and proofs of calculus than the high school course which increased my understanding and appreciation for the subject.

<u>Intellectual Growth</u>: This course helped me to think critically and creatively when approaching math problems. Often, there is only one way to solve a problem, but in this course, we learn to apply various methods to problems to seek the correct answers. The ability to approach problems from various angles in different situations improved my problem solving skills that can be applied to other fields of inquiry.

<u>Quality</u>: Professor Christensen created a classroom environment that was friendly but also serious. This mixture allowed the course information to be effectively taught and comprehended at a high level while adding a level of enjoyment when coming to the class. I previously enjoyed math, and this class has increased my enjoyment and interest in math because of the way the calculus was taught. This balance is one key strength of Professor Christensen. In addition, Professor Christensen was available and open for questions during all times as well as during office hours.

Student: 26

Reason: Major or minor requirement

Reason: Interest in the course material

<u>Effort</u>: I had taken Calculus 2 as a senior in high school, but I did not validate it with an AP Exam, so I took this course for the second time this semester. Despite already having prior knowledge entering this course, I still found myself learning new material and this forced me to put a fair amount of effort into learning the material.

<u>Understanding & Appreciation</u>: During this semester, I can definitely say that I gained an appreciation and an enjoyment from going to Calculus four times a week. This might be because I naturally enjoy math, but this course helped me understand Calculus 2 and seems like it will prepare me well for Calculus 3.

<u>Intellectual Growth</u>: I gained a large appreciation and enjoyment for calculus after taking this course and it will be very beneficial towards my potential engineering/physics major.

<u>Quality</u>: I really liked Professor Christensen as a teacher and also as a person that was very easy to ask questions about the course material. I thought Professor Christensen answered questions very thoroughly as well as made time outside of class to make sure his students understood the material. I could easily follow the class material and most of it was relevant when doing the Web Assigns and the written homework.