



MATH 16210 40 - Honors Calculus II (IBL) - Instructor(s): Oron Propp

Project Title: **College Course Feedback - Winter 2024**

Number Enrolled: **16**

Number of Responses: **15**

Report Comments

Opinions expressed in these evaluations are those of students enrolled in the specific course and do not represent the University.

Creation Date: **Thursday, March 28, 2024**

What are the most important things that you learned in this course? Please reflect on the knowledge and skills you gained.

Comments
Understanding how to transfer the ideas we learned in the first quarter to build our knowledge of real numbers was important and extremely useful.
I learned about functions, sets, connectedness, limit points, cuts, and a lot more math things.
Working with real numbers, intervals, compactness of sets, continuity, limits, derivatives
We continued to develop the idea of Dedekind cuts, introduced field axioms, and spent the rest of the quarter elaborating on continuity through ideas like epsilon–delta arguments and compactness.
How to write proofs, limits, continuity, openness
I believe that the problem solving and proof–making skills are I learned in this course are by far the most valuable skills I received from this course. I feel as if these skills, along with the actual content of the course, will help me in many other areas of my life and education at UChicago.
Working with limits and algebraic techniques. I gained some knowledge in proof skills relating to sets and related areas.
Continuity was amazing and the compactness came and changed my life. Epsilon delta stuff was chill but really useful to learn. Obviously learning IVT, EVT, and MVT were cool to learn, but actually seeing the rigorous proofs for them was awesome.
Proof
Building the real number line and properties of them. Learned intervals, notion of continuity, compactness, limits, and derivatives.
Proofs, real numbers
construction of the real numbers, fields, intervals, limits, derivatives, compactness
The beginnings of calculus using proofs based on our proofs from the last quarter. Learned key concepts such as continuity, compactness, etc.
Limits, continuity, the real numbers, intervals, compactness.

Describe how aspects of this course (lectures, discussions, labs, assignments, etc.) contributed to your learning.

Comments
Psets and class discussions helped me understand proofs that i missed and build on work we'd done.
I thought lectures were extremely helpful towards my learning.
The IBL aspect of the class is great and I learned a lot. The lectures by Oron and Victor were also very helpful whenever they did them
The discussion sections were excellent. We were able to develop ideas on proofs during class and we spent a lot of time to make sure that all concepts were well understood. Additionally, the occasional lecture by professor Propp was super useful and helped us ground our proofs in the definitions and gave us direction on how to attack the problems. These lectures also gave us the opportunity to see compelling examples that motivated our answers to the proofs. Lastly, office hours were super useful and almost felt like a necessity. I still liked that office hours weren't just for giving the answers out, but inspired the same discussions that we had in class.
In class lectures and office hours were very helpful to understand the material.
The lectures and assignments are all IBL-based, so we students were expected to learn and solve these problems mostly on our own. Because of this, not only did I gain the material presented by the course, but I also gained valuable problem solving and independent improvisation skills.
The scripts were pretty helpful.
Preparing for presentations helped me digest and understand the material so much better than lectures. It's actually crazy how much better this class forces you to understand the proofs than regular classes.
TBH I did not gain too much from in class presentations, but office hours and instructors (Professor and Victor) were super helpful. Professor Propp assigned interesting additional exercises. The final was hard though.
Classes were nice and provided a useful discussion of the topic. Lectures to provide intuition were also helpful. Journal assignments were often long and due in very short notice, which affected students ability to be prepared for class.
Better at proofs
the classes helped with my understanding of the proofs and lectures helped with the logic of the topics
Because it's IBL, the homework is the class, and it contributed a lot to my learning.
The in-class lectures were very helpful – but I would say not to take this as the bulk of the learning experience. I think most of the learning experience is done outside of class in A-level of the reg where you sweat over proofs or in an office hour in Eckhardt where you try to figure out how solve a problem.

Please respond to the following:

	Mean	Median	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
This course challenged me intellectually.	4.87	5.00	0.00%	0.00%	6.67%	0.00%	93.33%
I understood the purpose of this course and what I was expected to gain from it.	4.93	5.00	0.00%	0.00%	0.00%	6.67%	93.33%
I understood the standards for success on assignments.	4.67	5.00	0.00%	0.00%	6.67%	20.00%	73.33%
Class time enhanced my ability to succeed in graded assignments.	4.67	5.00	0.00%	0.00%	6.67%	20.00%	73.33%
I received feedback on my performance that helped me improve my subsequent work.	4.80	5.00	0.00%	0.00%	6.67%	6.67%	86.67%
My work was evaluated fairly.	4.67	5.00	0.00%	0.00%	6.67%	20.00%	73.33%
I felt respected in this class.	4.93	5.00	0.00%	0.00%	0.00%	6.67%	93.33%
Overall, this was an excellent course.	4.67	5.00	0.00%	0.00%	6.67%	20.00%	73.33%

Additional comments about the course:

Comments
It's an excellent course if you can handle it, which I can't
Very fun class. There is less set theory than 16110 so it feels a bit different near the end but mostly the same
This course is super good and feels very different. Beyond just the IBL format, this course gets into ideas in math that we use frequently and gives them rigorous grounding. This is even more true with this quarter as compared to last quarter, as ideas like limits and continuity feel very intuitive and natural, but have a lot of necessary foundation to generate the concepts.
This is my favorite course I have ever taken. You get what you put in. If you really like math, I suggest attempting every proof before class. It's hard and challenging and sometimes really frustrating, but it will pay off and you will see that this material is really beautiful.
more work and far harder final than other professors sections but great lecture

I would recommend this course to:

	No	Yes
Highly-motivated and well-prepared students	0.00%	100.00%
Anyone interested in the topic	33.33%	66.67%

Thinking about your time in the class, what aspect of the instructor's teaching contributed most to your learning?

Comments
Lectures at the start of scripts and class time when we didn't understand proofs
Prof. Propp did a great job listening to student feedback and stepping in whenever it was clear that we needed help. He was, I thought, an excellent professor. It was never difficult to get in touch with him, and his office hours were extremely useful.
Lectures and feedback on problems
I think that professor Propp's lectures were super helpful. Our previous professor didn't do these mid class lectures and this made it difficult to understand what our goals and motivations were with each new script. Additionally, professor Propp motivated people to ask questions, and in doing so we would generate excellent discussions, even if the result seems trivial or would have been ignored had the person not asked.
Very helpful in office hours! Very informative
I believe that the presentations and overview-level explanations preceding every script we were expected to solve were extremely useful. Not only did they provide assistance on understanding the uses of what were about to learn and the connection to previous material, but they also helped to outline what we could do to solve the problems presented by each script.
The scripts guided me well
His mini lectures were extremely helpful. Professor Propp encouraged discussion and asked great clarifying questions after presentations. His office hours were amazing. Honestly, he was one of the best professors I have ever had.
His mini lectures
Lectures at the beginning were nice. Professor's comments and feedback during discussions were also helpful.
Lecture
the lectures were very helpful when trying to understand the topics, sometimes it was more helpful than the ibl presentations
Lectures and comments on students' proofs.
The office hours were very helpful.

What could the instructor modify to help you learn more?

Comments
nothing
Sometimes, especially towards the beginning of the course, it felt as though Prof. Propp didn't really understand how much we were struggling to keep up with the workload. To his credit, he took feedback and adjusted accordingly, which is very respectable.
Nothing
I really wouldn't change anything. I think that the way this course progressed was exactly how and IBL class should be run.
I believe that spending a little more time in class to let students engage with each other and solve problems or questions presented by the teacher would go a long way to facilitating understanding of the material.
Some of the journal requirements were unnecessarily long and didn't really help me learn
This got better as the quarter went on, but just giving us a bit more time to turn in assignments would've been nice.
The pace of the class is a little bit fast; also, it would be good if the solutions to the additional exercises can be provided sooner
Only thing I would change is to give us more time on the journal assignments. The pace of the class was good, but a couple days longer to turn in the assignments would give us some time so that we could do the readings for class.
More reasonable final and more direct instruction. He is amazing though
sometimes the journals were too long
Make clearer in class the aspects of proofs that are incomplete. Most of the time the instructor did this but sometimes, although rarely, not
I think a midterm or even mid-quiz of some kind would have better prepared me for a written final.

The Instructor . . .

	Mean	Median	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	N/A
Organized the course clearly.	4.64	5.00	0.00%	0.00%	14.29%	7.14%	78.57%	0.00%
Presented lectures that enhanced your understanding.	4.86	5.00	0.00%	0.00%	0.00%	13.33%	80.00%	6.67%
Facilitated discussions that were engaging and useful.	4.80	5.00	0.00%	0.00%	0.00%	20.00%	80.00%	0.00%
Stimulated your interest in the core ideas of the course.	4.79	5.00	0.00%	0.00%	0.00%	21.43%	78.57%	0.00%
Challenged you to learn.	4.87	5.00	0.00%	0.00%	0.00%	13.33%	86.67%	0.00%
Helped you gain significant learning from the course content.	4.86	5.00	0.00%	0.00%	0.00%	14.29%	85.71%	0.00%
Was available and helpful outside of class.	4.79	5.00	0.00%	0.00%	7.14%	7.14%	85.71%	0.00%
Motivated you to think independently.	4.71	5.00	0.00%	7.14%	0.00%	7.14%	85.71%	0.00%
Worked to create an inclusive and welcoming learning environment.	4.93	5.00	0.00%	0.00%	0.00%	7.14%	92.86%	0.00%
Overall, this instructor made a significant contribution to your learning.	4.79	5.00	0.00%	0.00%	0.00%	21.43%	78.57%	0.00%

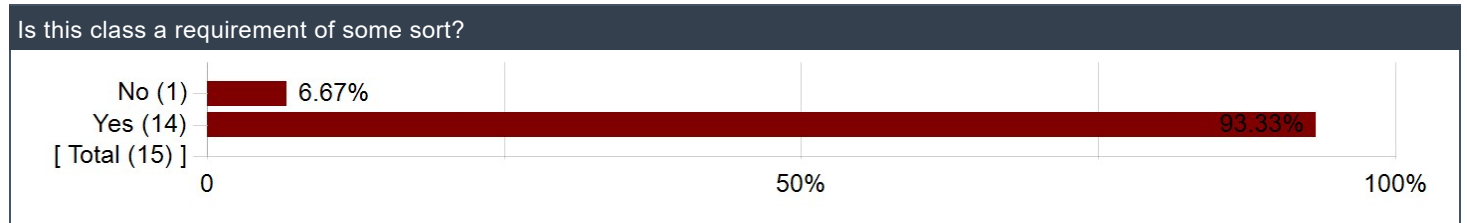
Please include the name of the TA/CA/Intern you are evaluating. What aspects of the TA's teaching contributed most to your learning? What could the TA modify to help you learn more? Please include any additional feedback for the TA/CA/Intern.

Comments
Victor Hugo Almendra Hernandez. He was extremely helpful and shouldn't modify anything.
Victor Huga Almendra Hernandez was a great TA. His office hours were helpful, as was his homework feedback.
Victor was great and he was always available. He gave a lecture on compactness that was great since a lot of us had never heard of it before.
Victor Hugo Almendra Hernandez
Victor Hugo
Victor. He is an amazing TA and his lecture on compactness was awesome.
Victor. HIs office hours
Victor
Victor
victor
Victor lectured for our class about compactness which very much enhanced my knowledge of the topic. He also had biweekly office hours. Great TA
Victor

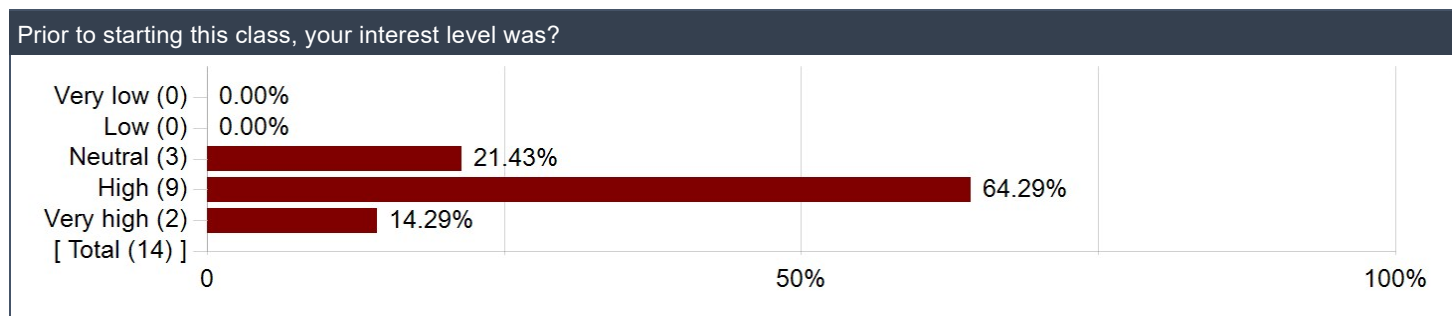
The TA/CA or Intern. . .

	Mean	Median	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	N/A
Facilitated discussions that supported your learning.	4.60	5.00	0.00%	0.00%	0.00%	33.33%	50.00%	16.67%
Gave you useful feedback on your work.	4.50	5.00	0.00%	8.33%	0.00%	25.00%	66.67%	0.00%
Stimulated your interest in the core ideas of the class.	4.40	5.00	0.00%	0.00%	16.67%	16.67%	50.00%	16.67%
Challenged you to learn.	4.36	5.00	0.00%	0.00%	25.00%	8.33%	58.33%	8.33%
Helped you succeed in the class.	4.45	5.00	0.00%	8.33%	0.00%	25.00%	58.33%	8.33%
Was available and helpful outside of class.	4.64	5.00	0.00%	0.00%	8.33%	16.67%	66.67%	8.33%
Overall, this individual made a significant contribution to your learning.	4.50	5.00	0.00%	0.00%	16.67%	8.33%	58.33%	16.67%

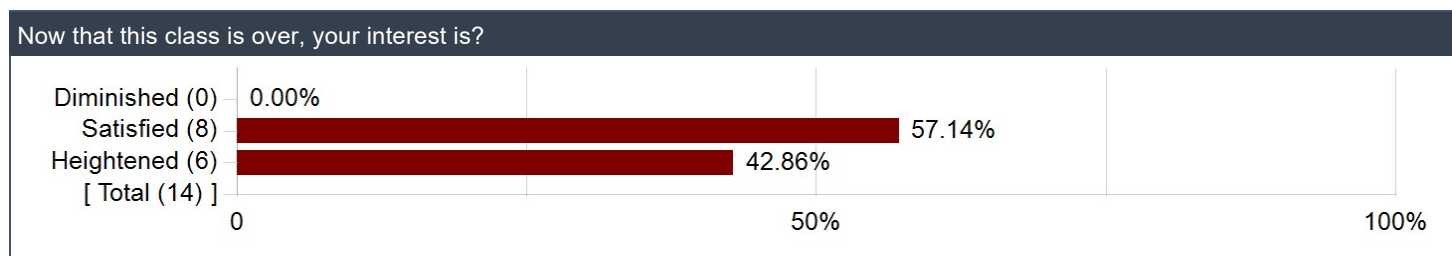
Is this class a requirement of some sort?



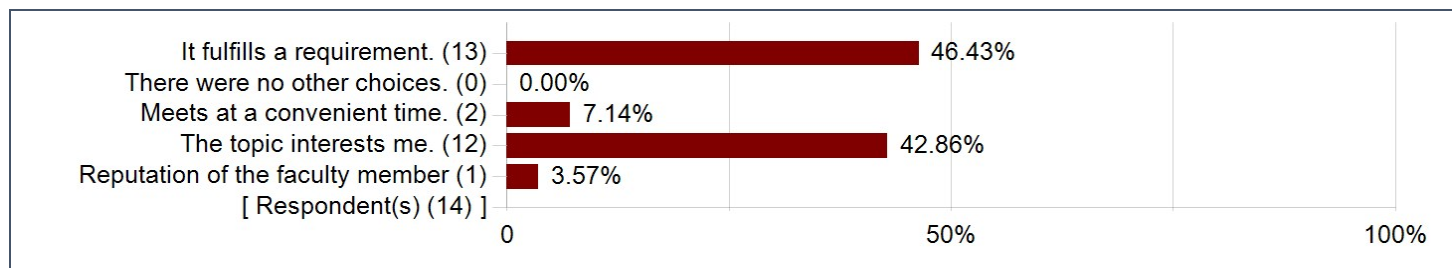
Prior to starting this class, your interest level was?



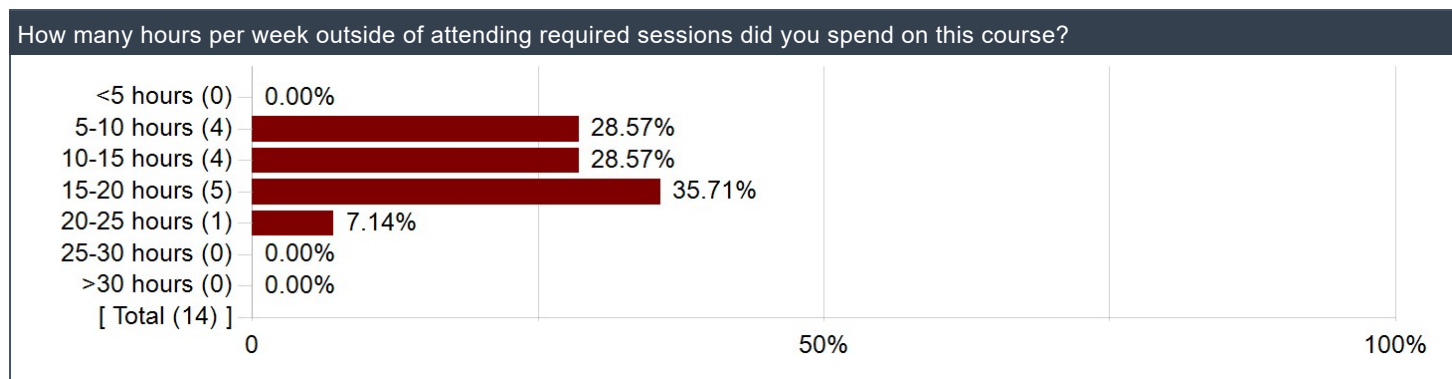
Now that this class is over, your interest is?



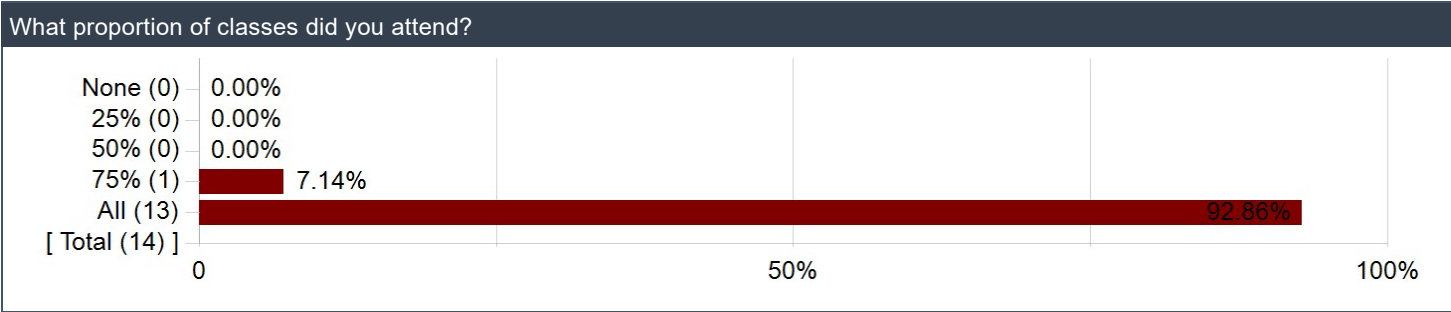
Why did you choose to take this course? (Select all that apply)



How many hours per week outside of attending required sessions did you spend on this course?



What proportion of classes did you attend?



Please comment on the level of difficulty of the course relative to your background and experience.

Comments
not too difficult but challenging
It was beyond what limited experience I had.
About the same as 16110
This course is very difficult and feels like a step up from the first quarter. However, I think that the cursory knowledge from high school calculus is actually useful in this course and helps with intuition even if these presentations aren't rigorous.
Lots of work but the math was not bad
It was very hard if you want to prepare most proofs. Else, it's as hard as you want it to be.
No math background — its hard
It was at an appropriate difficulty given experience from fall quarter.
the course was fairly difficult but not that different from math 16110
Difficult course but very doable. Highly encourage.
Easily the hardest class I've taken at the university