Homework Zero

Precalculus: Functions, Geometry, Trigonometry, & Modelling UCR Math-005-E01, Summer 2020

Please upload your responses to these prompts to Gradescope before 8am next Monday morning. That way I have time to read over them to prepare for the coming week. There are three sections: Exercises, Writing, and Reflection. Please upload your responses to each section separately to help me keep organized.

gradescope.com/courses/125651

Let's treat this Homework Zero as a test run for uploading things to Gradescope. Email me if you have any technical questions or struggles so we can figure things out together. :)

Exercises

1. Write down all the decimal digits of π that you can remember off the top of your head. (I know it's a silly question; the points is just to have something to upload to Gradescope)

Writing

Whereas the previous Exercises are for you to practice what you've learned and for you to test yourself, these short writing assignments are (1) for you to get experience writing down your mathematical thoughts in words, which I suspect you haven't had much practice with in previous math classes, and (2) to give me something to read to assess your thinking: it's much easier to tell if you're thinking about things correctly from writing like this than from looking over calculations.

1. What $is \pi$ anyways? Suppose someone you know, a friend or coworker who hasn't taken a math class in many years asks you "why is π even a thing?" How would you respond? Note that since your friend/coworker hasn't taken math for awhile, you can't get too technical in your response.

Reflection

I'm going to ask you to reflect on your own learning progress each week. This will be the first thing I read of your uploaded homework. Don't think of this reflection as a formal task; think of it more as a conversation starter with me. I'll ask you some specific questions that I've got on my mind, but generally just let me know how you're doing.

There are way more questions this week than there will typically be. This is because I've included some "pre-class survey" sort of questions too. Just answer whatever you feel like, in whatever detail you feel like.

I imagine this course has a very different vibe than most other classes you've taken in the past, both because of the pandemic and because of the whole "no grades, only feedback" thing. Are there any aspects of this course that have you concerned? Excited?

A more concrete version of the previous question since we're doing this class remotely: Do you have reliable internet? Are you anticipating any technological or logistical issues participating in this class?

How did you feel about being asked to write in a math class? I suspect this is a new thing for you too.

Please tell me about your academic/professional self! Like, what's your major? What kind of person do you aspire to be? What is your purpose for attending college? More specifically, what's your motivation for taking this class?

Is there any mathematical idea that you've heard about, either in a math class or not, that you've been curious about and wanted to explore further? More directly, do you want me to teach you any mathematics outside the usual curriculum of this course?

How do you feel about email? Like, it's the official means of communication at this university, but maybe there are other means of digital communication that, if you were in charge of things, you'd use instead of email.

Is there anything else you'd like me to know before we begin the term? Your preferred pronouns? Any personal reasons you expect this course to be tough? And if there is anything you'd like to let me know anonymously, please use this Google Form. And feel free to use this Google Form anytime during the term.

forms.gle/8LrDkjLoXbvruG3X6