STA490: STATISTICAL CONSULTATION, COMMUNICATION AND COLLABORATION

DO GOOD WORK, WITH OTHERS, AND TALK ABOUT IT WELL

WEEK I - THURSDAY SEPTEMBER 8TH, 2022

PLAN FOR TODAY

- Introductions
 - Me, you and a quick scavenger hunt
- What is this course?
- Syllabus
- Quercus tour
- Participation in STA490. What should this look like?

PROF. NATHALIE MOON

- Born and raised in Kingston, Ontario (at the other end of lake Ontario!)
- Undergrad in math & stats from Queen's University
- Masters and PhD in biostatistics from the University of Waterloo
- Current hobbies: Baking, going to the park with my toddler!

Research interests

- Statistics education
- Biostatistics and study design

Two truths and one lie

- I have more than 10 toes
- I have never had dark soft drinks (like Coke, Pepsi, or Root Beer)
- I have visited every continent except Antarctica.





WHAT I LEARNED FROM YOUR APPLICATIONS

- The most common focus is Economics, but we also have students focusing in Cognitive Psychology, Biochemistry, Physics, Social Psychology, Health and Disease, and Health Studies! Looking forward to learning about your perspectives on this wide range of disciplines throughout the year ©
- 35% (14/40) of you indicated they planned on participating in Zoom classes from the reserved classroom on campus. If you are meeting from there, each student should still have their own computer, logged in to Zoom, but some of the small group activities can be done with the people who are with you in the room.
 - Make sure you have headphones to listen to the whole-class discussion, otherwise you will get audio feedback which will be unpleasant for everyone!

YOUR TURN!



Scavenger hunt

You will have until the song ends to find and bring back an item for each of the below descriptions (if you can – of course, if you're not at home this will be harder... in that case you can just tell us about the item you would have chosen!):

Something that represents a fun thing you did this summer OR something new you got this summer

2

Introductions



Please tell us:

Your name

Your Program of Study (including your focus, if you have one)

Tell us about the object you found during your scavenger hunt

- Please correct me if I say your name wrong.
- If possible, I would love to see and hear you, but trust you to make the best choice for your own environment, comfort and learning. You can post in chat instead. You should have permission to turn on your microphone/camera (let me know in the chat if you don't!)

I HAVE SPENT A LOT OF TIME IN INSECURE CANYON

CONVICTION

Questioning whether you actually know that much CHILD'S HILL **@** Acknowledging that you don't know that Realizing that much knowing how little you know is the first step in becoming someone who actually knows stuff Feeling ashamed and embarrassed **INSECURE** about not knowing CANYON that much

SOURCE: <u>@WAITBUTWHY</u>

COURSE MANTRA

It's OK not to know.

Expressing ignorance is encouraged.

It's not OK to not have a willingness to learn.

Risk communication and community engagement for health emergencies: learning lessons from COVID-19 in the Western Balkans

TALKING RISK: HOW TO BETTER UNDERSTAND AND COMMUNICATE ABOUT UNCERTAINTY

BY SARAH CARPENTER MAY 5, 2022

Data is Worthless if You Don't Communicate It

by Thomas H. Davenport

June 18, 2013

May 5, 2022



Data Storytelling: The Essential Data Science Skill Everyone Needs

Brent Dykes Contributor ①

I write about how to drive more value with data and analytics.

March 31, 2016

The Need for Effective Risk Communication Strategies in Today's Complex Information Environment

As information becomes more immediately accessible—especially through digital platforms—it is crucial to have an effective risk communication plan to reach the right audiences in times of need.

Jan 5, 2018

by Lisa D. Ellis

Op-Ed

THE RISE OF THE DATA TRANSLATOR

Louise Maynard-Atem & Ben Ludford

Pages 12-14 | Published online: 03 May 2020

66 Download citation

▶ https://doi.org/10.1080/2058802X.2020.1735794



ENTERPRISE TECH

Forget Data Scientists And Hire A Data Translator Instead?

Bernard Marr Contributor @

Follow

Mar 12, 2018, 01:41am EDT



You can invest in data technologies and collect all the data you can possibly imagine, but it's worthless if it's not analyzed or communicated to decision-makers so that action can be taken from the insights. Some organizations attempt



COURSE OVERVIEW

- Syllabus highlights
- Brief tour of Quercus
- Tentative course schedule
 - Make sure to make note of all project meeting dates & Tuesday workshops (the exact dates for Winter will be shared later) in your calendar!

We won't go through these fully now, but make sure you've read them on <u>Quercus</u>

CLASS PROTOCOLS

	Description	Reasoning and horror stories
Have a reliable internet connection.	Avoid public shared wireless such as coffee shops and restaurants. If you are connecting from a network with a firewall, verify that it will not block the link to our Zoom sessions by clicking on one of our class Zoom links. Get close to your WiFi router, ideally connect with an ethernet wire.	This is a discussion-based course with participation marks, you need to be able to hear/see and engage.
Find a quiet place where you will not be interrupted.	If possible, choose a room with a door that you can close, a space free from ambient sound (people talking, dishwasher running, open windows, etc.). If this is not possible, consider using earbuds or a headset.	Discussions will be much more awkward if we have to constantly mute and unmute people, or if we can't hear you. I also don't want to make your family/roommates etc. feel awkward by making a surprise guest appearance. Let anyone who lives with² you know when you will have synchronous classes.

	Description	Reasoning and horror stories
Turn your video on.	This may not always be possible. While I strongly prefer this, I trust you to make the best choices for your environment/internet connection/learning.	Body language cues help me and your fellow students connect and engage when we are having a discussion
Use good lighting, framing, and a stable surface for your camera.	Try to have your light source (window, lamps) in front of you, not behind you, and your camera/computer on a desk not your lap. Try to have your camera facing you head-on.	A Prof. gave a lecture with their laptop on their lap while in a ROCKING CHAIR. Basically everyone got motion sick. A low camera angle shows way more nostril than anyone wants.
groups/project when there are distracting and the con-		Keeping your microphone on allows you to jump into the conversation like you would in person. It helps make things as natural as possible while we're online.
Use earbuds or a headset.	These are not required but recommended.	Earbud and headset microphones localize your audio and reduce interruptions caused by ambient noise.

	Description	Reasoning and horror stories
Engage, engage, engage.	Speak up and ask questions throughout.	This is the best way for me understand how you're doing, get your questions answered right away and makes it easy for me to give you a good participation mark.
Come to class prepared.	Complete required readings and any other prep assignments. This will help make sure our time toget meaningful and advances your learning. I half the session to be taken up with bor Don't waste your classmates' time by be unprepared one.	
No attendance while operating a motor vehicle.		I hope this is obvious, but I've heard of students doing itplease, please don't endanger yourself and others. You also will need to be fully engaged during class, not just passively listening. This isn't a podcast.
Use a device that allows you to collaborate.	This will usually be a computer (laptop or desktop).	You want a screen that allows you to see everyone well. Tablets have some limitations. A phone will work as a backup but should not be your primary device. You might use more than one device if that works for your too, one for video/chat and one for notes/tasks. ¹⁴

	Description	Reasoning and horror stories
Use chat.	There is to everyone mode and private (to individual) mode in chat. Share ideas, ask for tech support, but keep the conversation on topic to the course.	This can be a great way to help each other, share links, and give me a general sense of how things are going. I also like when you use (appropriate) emoji.
Be aware and attentive to how you present yourself.	Though we are in different places, we are all attending class in a shared virtual classroom. Come to class in attire appropriate for the classroom and be mindful of your screen content and notifications when screen sharing.	A Prof. had someone attend class topless. You can imagine how distracting that was for people. Even though I know class will be at night for some of you, please don't Zoom from bed/in your PJs. It will make you more likely to nod off and make me jealous of your jammies.
Use names/make reference to what your classmates say	Where possible, link to what other students have said and use their names in doing so.	This helps create a better class community, helps you and me learn names, and it is always nice to get credit for your ideas and know how they influenced your classmates.

PARTICIPATION

PARTICIPATION IN STA490

Back at 11:24 am

What does participation look like in an online class?

Type your answers at pollev.com/sta

PARTICIPATION IN STA490

Discussions with your classmates are an important element of this course, as this allows me to observe how you **engage** with the material and how you **communicate** your understanding with your peers. A big part of the **learning experience** in STA490 comes from **asking questions** and brainstorming strategies for achieving increased understanding and insights.

STA490 is NOT a class where	STA490 IS a class where
you can simply show up and watch/listen without contributing to the discussion	you will take an active role in the class discussions (my role is to facilitate, not to lecture)
you can do no work for several weeks, and then pull an all-nighter before a big deadline	you will come prepared to discuss assigned readings
you can "sit in the back" (virtually) and be invisible	

THE STRUCTURE FOR THE REST OF THIS MEETING

- 5 minute water/snack break
- Introducing breakout room roles
- Breakout: Discussing on online discussion experiences
- Whole class discussion
- Recap and next steps









5-minute drink/snack stretch break

BREAKOUT ROOM DISCUSSION ROLES

Facilitator

Responsible for seeking out opinions from all group members and ensuring that everyone has the opportunity to contribute.



Notetaker

Responsible for recording the key points of your group's discussion in the shared <u>Word document</u> (link also under class resources for this week).



Reporter

Responsible for reporting back to the class on behalf of the group. Seek consensus from the group about your most important aspects of your discussion to share.



Timekeeper

Responsible for managing time for the group, making sure you stay on track and spend equal time on each question. If there are only three members of the group, the time keeping should be done by the person in the **Reporter** role.



BREAKOUT ROOM DISCUSSION: ONLINE DISCUSSION HITS AND MISSES

Q0: Determine who is filling what role by order of next birthdays – the person with the next birthday will be **notetaker**, the next birthday after that will be **reporter**, the third birthday will be **timekeeper**, and if your group has four members, the fourth member will be the **facilitator**. We will swap roles next class.

Q1: Introduce yourselves to your group members – preferred name (that is, what should they call you and how do you pronounce it) and one boring fact about yourself.

QI:What are things you like about in-person group discussion? How can this be replicated (as much as possible) in an online discussions?

Q2: Do you have experience with group discussions (online or in person) that have NOT worked well? What made them unsuccessful?

Bonus question: Do you know what the statistician associated with your room is known for? If not, google it and summarize it in one sentence!

I will now send you to your breakout rooms.

Open the Editable Word document from the weekly materials page

Determine and record your group members' roles, discuss the questions, and keep notes.

Facilitator: Make sure everyone has a turn to speak on each question

Notetaker: Record team member roles and take notes.

Reporter: Prepare to feedback to the class.

Timekeeper: You will have 15 minutes. Try to divide your time equally on for each of Q1-3:2

2 > Physically see each other > less ambiguity. => comera/micon.
La hand gestures help clanify context

That Jest of the second of the

10 > Tech trouble/lag/background > stable internet

1 -> Tone: speaking over typing

7 -> Writing down throughts -> share screen /mindinaps

4 - 7 Easier to be passive online...

REPORT BACK: WHAT SHOULD PARTICIPATION LOOK LIKE IN STA490?

Room I: Florence Nightingale

Room 2: David Blackwell

Room 3: Hadley Wickham

Room 4: Xihong Lin

Room 5: Gertrude Cox

Room 6: John Tukey

Room 7: Ross Ihaka

Room 8: Robert Tibshirani

Room 9: Andrew Gelman

Room 10: Daniela Witten

MORE THINGS TO THINK ABOUT...

Components of participation/engagement

- Preparation
 - Check-in quizzes on readings/materials
 - Discussion of readings/materials in meetings
- Contribution to small group work (project and class)
 - Group discussions and fulfilling assigned role each week
 - Constructive feedback on peers' work (peerScholar)
- Contribution to whole class/project discussions
- Deep listening
 - Reflecting back to the speaker and the class

- - Separate breakout rooms for students who are in the classroom vs tuning in from elsewhere?

For small group discussions, would you prefer:

Some logistics questions

- Everyone is randomly assigned (this would mean groups would be mixed online/in person)
- Same groups each week all term, and then mix it up for the Winter term

Writing tasks

NEXT STEP: PERSONAL REFLECTION

Based on today's conversation about participation in STA490, I want you to take some time to reflect on the following:

How would you prefer to demonstrate your participation, learning, and engagement in this course?

You will be writing a response to this prompt, which is due on Wednesday September 21st

While it is unlikely that I can meet everyone's preferences, I will do my best to adapt the course format to make it work for you. We will also revisit this conversation throughout our time together this year, as I expect that some of your situations and preferences may change over the course of the year.

Note: This reflection will itself count towards your participation grade in the course, but later in the course you'll have two other written reflections that will be graded based on a more detailed rubric. A similar rubric is provided on Quercus for your reference in this writing task.

TO DO BEFORE NEXT WEEK

Tip: Your to dos for the upcoming week will be listed in the last column of the "Schedule" page on Quercus (https://q.utoronto.ca/courses/280072/pages/schedule-fall)

Schedule (Fall)

Tasks: ☐ Reading | ● Discussion | ☐ Quiz/Survey | ▲ Writing | ● Other Due Dates: Project Related | Other Coursework

	Thursday Class Meeting (10:10am - noon)	Tasks to do & due dates before next class
Week 1 (Thurs Sept 8 - Fri Sept 9)	● Setting up U of T Zoom Notices Slides Collaboration document for the breakout discussion	□ "The joys of consulting" by Chris Chatfield, Significance, March 2007, pp. 33-36. □ Download, read, and save the course syllabus. □ Due Tues Sept 13 (to give me time to read before class!): Help me set to know you (and help me schedule office bears!) □ Due Wed Sept 14: Reading check-in W1 Syllabus and the joys of consulting □ Due Wed Sept 21: Participation, learning, and engagement writing prompt □ R Markdown Cheatsheet. After next week's class and office hours, I will assume that you are proficient in R and RMarkdown. If you would like to ask me questions about these, be sure to do so during class/office hours this week or next week. After this, I'll assume that you are able to knit a document that combines R code chunks and paragraphs of text. You will be required to use RMarkdown for your analyses in STA490 course projects.