Cutting-Edge Techniques for Digital Communication Analytics

JOUR5350•Spring 2019•100% Online

Professor Valarie J. Bell, M.A., Ph.D.

Contact info Office: 213 Sycamore
Cell: 630.853.4089

Email: Valarie.Bell@unt.edu. Any email, cell phone call, or text message received after 5pm on a Friday or last day prior to a holiday/campus closing will not be returned until the next school day. Text messages and cell phone calls are for emergencies or time-sensitive matters.

Office hours Mondays 6-8 pm & Saturdays 9a-Noon via my Zoom Virtual Office at https://unt.zoom.us/j/3594059147 or by appointment either on campus or via Zoom.

Teaching Assistant: Naveed Iqbal, NaveedIqbalMohammad@my.unt.edu on campus or via weblink by appointment
Cutting-Edge Techniques for Digital Communication Analytics

Description

This course explores the latest industry tools, techniques and applications in the field of digital communication analytics. The purpose of this course is to help students develop competence and confidence in selecting and applying tools and techniques in alternative and innovative ways not usually undertaken by analysts. Further, students will continue to build their critical thinking skills through thought experiments during the entirety of the course.

Course Learning Outcomes

1. Explore some of the hottest and potentially most impactful tools, techniques, and developments in the field of Digital Communication Analytics (DCA).

2. Compare and contrast the possible applications of these tools, techniques, and resources by digital communication analysts.

3. Demonstrate basic competence in applying selected cutting-edge tools as determined by your professor.

4. Employ computational tools of industry to evaluate and interpret web data.

5. Identify, examine, and debate the pros and cons of the rise and proliferation of these cutting-edge tools and techniques as used by DC Analysts.

6. Apply the latests professional digital analytics' tools and techniques to the exploration of research questions in DC Analytics.
Cutting-Edge Techniques for Digital Communication Analytics

Course Philosophy
This course will be applied and interactive. Assigned work has been developed to integrate and facilitate students’ simultaneous learning of analytical concepts and techniques, as well as the application of the requisite quantitative tools critical to digital communication analysts. As students you are encouraged to apply your real-world professional experience to the learning process throughout the course. Further, any previous coursework in business-related fields such as sales and marketing or advertising, and in human behavior, such as sociology, psychology, and social psychology will be immensely useful as you build your skills in analytical thinking and practice these new techniques.

Prerequisites: Graduate standing; preferably JOUR 5000 & JOUR 5251

Course Structure
This online course consists of readings, discussions, writing assignments, thought experiments, tutorials, regular check-ins with the professor, and a final course project. The lectures will introduce the principles, tools, and professional applications of digital communication analytics. Periodically, pre-recorded lectures from developers of various analytics tools may supplement the course materials. Other course activities are opportunities to apply those principles and tools. Students will learn how to collect and translate digital content into data that can be used to enhance decision making by marketers, advertisers, and public relations and social media professionals, as well as many others. Students are required to keep up with readings and recorded lectures, to turn in all assigned work on time, and actively engage in any Canvas forum discussions.
Required texts
There is no required text for this course. All readings will be provided by the professor in Canvas.
Cutting-Edge Techniques for
Digital Communication Analytics

Deadlines
Because a key characteristic of the position of digital analyst requires the ability to quickly plan, execute, and report simple and complex analyses in a very short period of time, students are expected to meet all deadlines without exception.

Reading assignments
Readings should be completed as soon as possible during each new module so that you are prepared for forums and assignments. Readings from texts, articles and/or review of certain websites will be assigned to support achievement of the course objectives. Weekly readings may include last minute articles and tweets as they relate to the class.

Writing requirements
The course’s written assignments must be completed using either the American Sociological Association (ASA) or American Psychological Association (APA) style guides and must follow data analytics reporting conventions.

How your course grade will be determined
Future World Fora 2 @ 40, 1 @ 20 totaling 100 points
Professor Check-ins 4 @ 10 points totaling 40 points
Thought Experiments/Fora 6 @ 50 points totaling 300 points
Block Chain Quiz 1 @ 50 points totaling 50 points
Create-a-Bot Tutorial/Project 1 @ 10 points totaling 10 points
Analytics Assignments 3 @ 100 points totaling 300 points
Final Course Project 1 @ 150 points totaling 150 points
Cutting-Edge Techniques for Digital Communication Analytics

Grading scale

Grade %
A  900 – 1000
B  800 - 899
C  700 - 799
D  600 - 699
F  < 600

COURSEWORK

Canvas Thought Experiments/Discussion Fora

Each week to promote students’ critical thinking and decision-making skills concerning the application of analytic techniques to strategic communication there will be an examination of an analytics question or problem via a thought experiment. In some instances, a visualization will be posted and students will be asked to analyze it or proffer an alternative? Other times, students may be asked to develop a strategy or solution to a question or problem. Whatever the topic, the forum gives students the opportunity to exercise skills in brief problem-solving scenarios. Further they must often explore a hypothetical situation by applying sound digital communication analytics methods and principles.

There are two requirements for each forum. First, each student must post original material by Wednesday of each week and adhere to the professor’s instructions specific to that forum. Second, each student must select the previously posted work of a fellow student and follow the professor’s instructions specific to that second part of the forum and submit their work by Saturday each week. Creativity will be rewarded as will critical thinking and original solutions. All applied and critique posts must be completed by the deadlines posted in the Module To-do List. If students do not complete the forum requirements, they will not receive full credit for the written assignment tied to the forum

Future World Fora
The Future World Fora operate in much the same way as the thought experiments except the Future World Fora are offered only once per module and consist of an extremely speculative scenario in which students are tasked to literally reason out, by applying known concepts, principles, and the current capabilities of tools within the field, the most extreme outcomes of an industry development. Students must document their work with extensive citations in order to substantiate and bolster their assertions. These assignments are due on Sundays.

**Professor Check-ins**

Because research studies conducted on online education consistently indicate that distance education students typically feel isolated and alone, this course makes use of regularly scheduled Zoom video chats between each student and the professor. Also, budding analysts benefit greatly from personal mentoring, and the resulting student empowerment. Each week students are expected to contact the professor via the permanent link available in Canvas. During their regular weekly meeting scheduled via email with the professor. Throughout all my years of teaching statistics and analytics, without exception, the individual check-in has overwhelmingly been the course feature my students loved and valued most of all. It is their time to use as they wish and the time can range from 5-10 minutes to 4 or 5 hours—all depending on what the individual student wants and needs.

During each check-in the student will apprise the professor of the following: 1) their progress in the course thus far; 2) any worries or concerns about the coursework and requirements for it; 3) the need for individual tutoring; 4) personal emergencies or issues that may hinder the student’s ability to successfully complete all coursework on time assigned; 5) additional resources or assistance the student may require; and, 6) any other issues as needed. Students will be awarded points for meeting this requirement. Students who fail to fulfill all four check-ins will lose points. Also, students who complete all check-ins may be granted consideration if they are reasonably close to the next higher letter grade. Students should email the professor by 5pm Wednesday of the first week of the course to arrange their bi-weekly check-in time. Of course this time can always be changed to accommodate both the professor’s and student’s changing schedule and obligations.

**Analytics Assignments**

After Module two, students will begin analytics tutorial exercises that will give them the opportunity to practice new techniques and learn new tools. Each student should be careful to save the resources they use for these exercises as well as the codes, syntax, videos, handouts, and other material in their personal e-lab book and portfolio for future reference. The instructor will work with each student individually to help them successfully navigate and complete these tutorials.
Final Analytics Project & Presentation

During the course, each student will develop their analytical and critical thinking skills as well as their ability to present analytical findings to non-analyst stakeholders by reviewing and analyzing either a case study or a dataset. Students will then present their findings through a written report as well as a live or pre-recorded 10-15-minute presentation of their findings. The student may choose whether to pre-record their presentation or to gain the experience of a live presentation before stakeholders. Since this assignment is intended to hone your professional analytical skills, you must prepare and present your analysis as if you are presenting results to a client. It is therefore essential that your presentation makes use of simple and easy to interpret/read data visualizations and that the overall language used in the presentation is easy to understand by non-analysts.

In the final Module, Dr. Bell provides a complete packet of information, resources, a final paper template as well as several differing datasets in Canvas from which students can select a dataset to analyze for the project. Nonetheless, Dr. Bell strongly urges students to gain their employer’s permission to collect and analyze their organization’s data in order to address 3-5 research questions or hypotheses. This demonstrates to the employer that their employee’s continuing studies provide a real value, even at an early stage.

*Project considerations when analyzing the data:*

1) What immediately ‘grabs’ you in the data? What secondary impressions do you get beyond any immediately apparent observations? What patterns or anomalies have you observed? Ultimately, what are the takeaways you can find in these data?
Cutting-Edge Techniques for Digital Communication Analytics

2) Which metrics would you identify as being most critical to examine in this case or for these data?

3) Identify both the best and worst performers. Describe how you could apply your findings to a future campaign.

Presentation Guidelines:

1) All presentations, whether live or pre-recorded, should be no less than 10 minutes and no more than 15 minutes.

2) All presentations should be prepared using Power Point or open source software Libre Office Suite’s presentation program called Impress, which can be found at https://www.libreoffice.org/discover/impress/. Presentations should consist of 6-8 slides including 1 cover slide and 1 reference slide. The other 4-6 slides should include the following content: summary of the problem with the case or dataset, outline of your conclusions, and an explanation of how you arrived at those conclusions, and at least 1 data visualization.

Students presenting live instead of via recording should be careful to schedule their presentation time, no later than the second-to-last Monday of the course by 5pm, to occur sometime during the final week of the course.

Academic Fraud and Dishonesty

Honesty, integrity, and professionalism are essential to success in business and academic environments. Because of the potential for grievous consequences connected with dishonesty, fraud, or misrepresented work products in the field of analytics, serious repercussions are mandated for students who choose to cheat, deceive, misrepresent or misappropriate materials, ideas, or content for their own work. Students are responsible for the content of their work once it is posted in Canvas.

Academic dishonesty includes, but is not limited to, the use of any unauthorized assistance in taking quizzes, tests, or exams; dependence upon the aid of sources beyond those authorized by the professor, the acquisition of tests or other material belonging to a faculty member, dual submission of a paper or project, resubmission of a paper or project to a different class without express permission from the professors, or any other act designed to give a student an unfair advantage. Plagiarism includes the paraphrase or direct quotation of published or unpublished works without full and clear acknowledgment of the author/source. Academic dishonesty will bring about disciplinary action which may include expulsion from the university. This is explained in the UNT Student Handbook but it is also posted online in the course under “Academic Dishonesty Policy.”

Students suspected of committing academic fraud on the first offense will be subjected to the full discipline of the Mayborn School of Journalism, The Toulouse Graduate School and the University of North Texas. It is a condition of enrollment and participation in this course that
all students will read the University’s dishonesty policy, understand and accept it.

**Msoj Academic Integrity Policy**
The codes of ethics from the Society of Professional Journalists, American Advertising Federation and Public Relations Society of America, as well as the Digital Analytics Association address truth and honesty. The Mayborn School of Journalism embraces these tenets and believes that academic dishonesty of any kind – including plagiarism and fabrication – is incongruent with all areas of journalism. The school’s policy aligns with UNT Policy 18.1.16 and requires reporting any act of academic dishonesty to the Office for Academic Integrity for investigation. If the student has a previous confirmed offense (whether the first offense was in the journalism school or another university department) and the student is found to have committed another offense, the department will request the additional sanction of removing the student from the Mayborn School of Journalism. The student may appeal to the Office for Academic Integrity, which ensures due process and allows the student to remain in class pending the appeal.

**Netiquette**

All members of the class are expected to follow rules of common courtesy in all email messages, threaded discussions and chats. Here are some important netiquette guidelines from UNT CLEAR:

- Remember you are communicating with a human being.
- Be have online in the same way that you would in-person.
- Communication in the online classroom is different from other places in cyberspace.
- Respect other's time and bandwidth: be concise.
- Make yourself look good by using proper grammar and punctuation.
- Share your knowledge.
- Keep flame wars from escalating.
- Respect the privacy of your classmates.
- If you have advanced IT skills, don't abuse your power.
- Be kind when addressing others' mistakes.
- Follow the Golden Rule
Cutting-Edge Techniques for Digital Communication Analytics

For more information, see https://www.untdallas.edu/sites/default/files/page_level2/ajc0262/pdf/brochure_netiquette.pdf

**Acceptable Student Behavior:**

Student behavior that interferes with an professor’s ability to conduct a class or other students' opportunity to learn is unacceptable and disruptive and will not be tolerated in any instructional forum at UNT. Students engaging in unacceptable behavior will be directed to leave the classroom and the professor may refer the student to the Dean of Students to consider whether the student's conduct violated the Code of Student Conduct. The university's expectations for student conduct apply to all instructional forums, including university and electronic classroom, labs, discussion groups, field trips, etc. The Code of Student Conduct can be found at www.deanofstudents.unt.edu. Further, the UNT Netiquette Guidelines are posted in the course in Canvas in the “Discussions” link.

**ACCESS TO INFORMATION**

As you know, your access point for business and academic services at UNT occurs within the my.unt.edu site www.my.unt.edu. If you do not regularly check Eagle Connect or link it to your favorite e-mail account, please so do, as this is where you learn about job and internship opportunities, MSOJ events, scholarships, and other important information. The website that explains Eagle Connect and how to forward your email: http://eagleconnect.unt.edu/

**Important Notice for F-1 Students taking Distance Education Courses**

To comply with immigration regulations, an F-1 visa holder within the United States may need to engage in an on-campus experiential component for this course. This component (which must be approved in advance by the professor) can include activities such as taking an on-campus exam, participating in multiple on-campus lecture or lab activity, or other on-campus experience integral to the completion of this course.

If such an on-campus activity is required, it is the student’s responsibility to do the following:

1. Submit a written request to the professor for an on-campus experiential component within one week of the start of the course.

2. Ensure that the activity on campus takes place and the professor documents it in writing with a notice sent to the International Advising Office. The UNT International Advising Office has a form available that you may use for this purpose.

Because the decision may have serious immigration consequences, if an F-1 student is unsure about his or her need to participate in an on-campus experiential component for this
Cutting-Edge Techniques for Digital Communication Analytics

course, students should contact the UNT International Advising Office (telephone 940-565-2195 or email international@unt.edu) to get clarification before the one-week deadline.

EMERGENCY NOTIFICATION & PROCEDURES
UNT uses a system called Eagle Alert to quickly notify you with critical information in an event of emergency (i.e., severe weather, campus closing, and health and public safety emergencies like chemical spills, fires, or violence). The system sends voice messages (and text messages upon permission) to the phones of all active faculty staff, and students. Please make certain to update your phone numbers at www.my.unt.edu. Some helpful emergency preparedness actions include: 1) ensuring you know the evacuation routes and severe weather shelter areas, determining how you will contact family and friends if phones are temporarily unavailable, and identifying where you will go if you need to evacuate the Denton area suddenly. In the event of a university closure, your professor will communicate with you through Canvas regarding assignments, exams, field trips, and other items that may be impacted by the closure.

STUDENT PERCEPTIONS OF TEACHING (SPOT)
Student feedback is important and an essential part of participation in this course. The student evaluation of instruction is a requirement for all organized classes at UNT. The short SPOT survey will be made available to provide you with an opportunity to evaluate how this course is taught. For the fall 2016 semester you will receive an email from "UNT SPOT Course Evaluations via IA System Notification" (no-reply@iasystem.org) with the survey link. Please look for the email in your UNT email inbox. Simply click on the link and complete your survey. Once you complete the survey you will receive a confirmation email that the survey has been submitted. For additional information, please visit the spot website at www.spot.unt.edu or email spot@unt.edu.

SEXUAL DISCRIMINATION, HARRASSMENT, ASSAULT
UNT is committed to providing an environment free of all forms of discrimination and sexual harassment, including sexual assault, domestic violence, dating violence, and stalking. If you (or someone you know) has experienced or experiences any of these acts of aggression, please know that you are not alone. The federal Title IX law makes it clear that violence and harassment based on sex and gender are Civil Rights offenses. UNT has staff members trained to support you in navigating campus life, accessing health and counseling services, providing academic and housing accommodations, helping with legal protective orders, and more.
UNT’s Dean of Students’ website offers a range of on-campus and off-campus resources to help support survivors, depending on their unique needs: http://deanofstudents.unt.edu/resources_0. Renee LeClaire McNamara is UNT’s Student Advocate and she can be reached through e-mail at SurvivorAdvocate@unt.edu or by calling the Dean of Students’ office at 940-565-2648. You are not alone. We are here to help.

JOURNALISM REQUIREMENTS & GUIDELINES RE-TAKING FAILED

JOURNALISM CLASSES
Students will not be allowed to automatically take a failed journalism course more than two times. Once you have failed a journalism course twice, you will not be allowed to enroll in that course for one calendar year after the date you received the second failing grade. Once a student has waited one calendar year after failing a course twice, the student may submit a written appeal to the director to be approved to enroll a third time. Students will not be allowed to re-take a failed journalism course more than three times.

TEXTBOOK POLICY
The Mayborn School of Journalism doesn’t require students to purchase textbooks from the University Bookstore. Many are available through other bookstores or online.

ACADEMIC ADVISING
Students should meet with their Academic Advisor at least one time per long semester (Fall & Spring). It is important to update your degree plan on a regular basis to ensure that you are on track for a timely graduation.

- It is imperative that students have paid for all enrolled classes. Please check your online schedule daily through late registration to ensure you have not been dropped for non-payment of any amount. Students unknowingly have been dropped from classes for various reasons such as financial aid, schedule change fees, parking fees, etc. MSOJ will not be able to reinstate students for any reason after late registration, regardless of situation. It is the student’s responsibility to ensure all payments have been made.
LINKS TO IMPORTANT SPRING 2019 DATES AND DEADLINES CAN BE FOUND AT

https://registrar.unt.edu/registration/spring-registration-guide

- Individual Faculty Member/Advisor
- Associate Dean, Mayborn Graduate Institute
- Dean, Mayborn School of Journalism

OFFICE OF DISABILITY ACCOMMODATIONS
The University of North Texas and the Mayborn School of Journalism make reasonable academic accommodation for students with disabilities. Students seeking accommodation must first register with the Office of Disability Accommodation (ODA) to verify their eligibility. If a disability is verified, the ODA will provide you with an accommodation letter to be delivered to faculty to begin a private discussion regarding your specific needs in a course. You may request accommodations at any time, however, ODA notices of accommodation should be provided as early as possible in the semester to avoid any delay in implementation. Note that students must obtain a new letter of accommodation for every semester and must meet with each faculty member prior to implementation in each class. Students are strongly encouraged to deliver letters of accommodation during faculty office hours or by appointment. Faculty members have the authority to ask students to discuss such letters during their designated office hours to protect the privacy of the student. For additional information see the Office of Disability Accommodation website at http://www.unt.edu/oda. You may also contact them by phone at 940.565.4323.

COURSE SAFETY STATEMENTS
Students in the Mayborn School of Journalism are urged to use proper safety procedures and guidelines. While working in laboratory sessions, students are expected and required to identify and use property safety guidelines in all activities requiring lifting, climbing, walking on slippery surfaces, using equipment and tools, handling chemical solutions and hot and cold products. Students should be aware that the University of North Texas is not liable for injuries incurred while students are participating in class activities. All students are encouraged to secure adequate insurance coverage in the event of accidental injury. Students who do not have
insurance coverage should consider obtaining Student Health Insurance for this insurance program. Brochures for this insurance are available in the UNT Health and Wellness Center on campus. Students who are injured during class activities may seek medical attention at the UNT Health and Wellness Center at rates that are reduced compared to other medical facilities. If you have an insurance plan other than Student Health Insurance at UNT, please be sure that your plan covers treatment at this facility. If you choose not to go to the UNT Health and Wellness Center, you may be transported to an emergency room at a local hospital. You are responsible for expenses incurred there.

COURSE SCHEDULE OF MODULES

MODULE ONE: BLOCK CHAIN 3/18-3/31

MODULE TWO: SOCIAL BOTS 4/1-4/14

MODULE THREE: ONLINE IDENTITY 4/18-5/5

MODULE FOUR: FINAL COURSE PROJECT 5/4-5/10
<table>
<thead>
<tr>
<th>Date</th>
<th>Assignment</th>
<th>Due Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sun Mar 24, 2019</td>
<td>Reaction Paper #1</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sat Mar 30, 2019</td>
<td>Future World Speculation #1 - Block Chain Run Amok or Block Chain to the Rescue?</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sun Mar 31, 2019</td>
<td>Analysis Assignment #1</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Block Chain Quiz</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Discussion Forum #1, Block Chains Plans</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Discussion Forum #2, Block Chain &amp; Social Media: What's the Deal?</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Check in #1 of 4</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sat Apr 6, 2019</td>
<td>Reaction Paper #2</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sun Apr 7, 2019</td>
<td>Analysis Assignment #2</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Discussion Forum #3</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Discussion Forum #3, When My Best Friend is a Bot</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sat Apr 13, 2019</td>
<td>Future World Speculation #2 - Do Social Bots Become Skynet's Self-Aware Terminators?</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sun Apr 14, 2019</td>
<td>Discussion Forum #4, Social Bots for a Better World</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Check in #2 of 4</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Create Your Own Bot</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Wed Apr 17, 2019</td>
<td>Reaction Paper #3</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sun Apr 21, 2019</td>
<td>Analysis Assignment #3</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sun Apr 28, 2019</td>
<td>Discussion Forum #5, Fakes, Phonies, and Fabulous Online Escapades</td>
<td>11:59pm</td>
</tr>
<tr>
<td></td>
<td>Check in #3 of 4</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Fri May 3, 2019</td>
<td>Check in #4 of 4</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sat May 4, 2019</td>
<td>Future World Speculation #3 - Putting Down the Socks-Meat-Puppets</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Sun May 5, 2019</td>
<td>Discussion Forum #6, Puppets Can Be Naughty!</td>
<td>11:59pm</td>
</tr>
<tr>
<td>Fri May 10, 2019</td>
<td>Data Analysis Final Project</td>
<td>11:59pm</td>
</tr>
</tbody>
</table>