

Course Information

DSC 672: Predictive Analytics Capstone

Winter 2019-2020

Monday 5:45pm – 9:00pm

CDM Room 200

Course Management System: <http://d2l.depaul.edu>

Instructor Information

Instructor: Ilyas Ustun

Office: CDM Center, Room 704

Office Hours: Monday 1pm-2pm, Tuesday 11am-12pm, Wednesday 1pm-2pm

Check on BlueStar and make an appointment. You can also stop by without appointment but availability is not guaranteed. We can meet other times as well, please send an email.

Phone: (312) 362-5178

Email: iustun@depaul.edu

Meetings on Zoom:

Personal Meeting ID: 720-771-7103

<https://depaul.zoom.us/j/7207717103>

Links:

DePaul CDM: <https://www.cdm.depaul.edu/Faculty-and-Staff/Pages/faculty-info.aspx?fid=1462>

DePaul Center for Data Science: <https://cds.cdm.depaul.edu/teachers/ilyas-ustun/>

twitter: @_ilyas_ustun_

Agenda

DSC 672 Predictive Analytics Capstone Schedule of Coursework

Weeks	Dates	Project Due	Surveys Due
1	1/8/2020		Introduce yourself
2	1/15/2020	Group Formation	
3	1/22/2020	Proposal	Survey 1
4	1/29/2020	Weekly Update 1	
5	2/5/2020	Weekly Update 2	
6	2/12/2020	Weekly Update 3	Survey 2
7	2/19/2020	Milestone	
8	2/26/2020	Weekly Update 4	
9	3/4/2020	Weekly Update 5	Survey 3
10	3/11/2020	Presentation, Peer Evals	DePaul Course Evaluation
11	3/18/2020	Report	

Grading

Grading is based on the manner in which you fulfill the objectives of this course. I will grade all your assignments on a percentage basis, which I will then convert to a letter based on the following scale:

Percentage Grade	Letter Grade
>= 96	A
>= 90	A-
>= 87	B+
>= 83	B
>= 80	B-
>= 77	C+
>= 73	C
>= 70	C-
>= 65	D+
>= 60	D
>= 0	F

The weights of each part in the course work for contributing to the final grade are as follows:

Assignment Type	Assignments	Weight
Individual	Paper Presentation	5%
Group	Weekly Updates	15%
Group	Proposal	5%
Group	Milestone	10%
Group	Presentation	30%
Individual	Peer Evaluation	5%
Group	Report	30%

Class Policies

Participation

It is expected that you will attend every class; it is the single most important action you can take in mastering the course objectives. You are responsible for all material covered, assignments delivered or received, and announcements made in class sessions that you miss. For distance learning students, this means viewing the classes in a timely manner, participate in the discussion forum, and being sure to email or call in any questions that you have.

For distance learning (DL) students:

Recordings of each lecture will be available a few hours after the “live” class and can be found at the course website <https://d2l.depaul.edu>. Online students are expected to watch the lectures every week and to keep up with the course information posted on the course website.

Bonus Points

There will be surveys, and the final Online Course Evaluation which all have bonus points. Bonus points are directly added to your final grade. For you to receive bonus points on the surveys, at least 90% of the students should have participated. Since no names or ID is taken in the surveys, I will check the participation level. If it is below 90%, no one will get the bonus, if it is above 90% everyone will get the full points for that survey. Since bonus points mean free points, please make use of this and fill in the surveys in a timely manner.

Due Dates

Work to be submitted for the course is generally due the day of class. Check d2l to get the exact date and time for each work. **Late submissions will be penalized by 20% each day.**

The assignments must be submitted online on the D2L site at <https://D2L.depaul.edu>. Only legible, organized homework which shows your work will be graded. Include your name, section number, date, and homework number on the first page of your assignment. ***It is your responsibility to check that your files are uploaded correctly on D2L; you should always keep a copy of your submission.***

Important: When submitting assignments please name your file(s) in the following manner:
coursecode_HW#_name_lastname

Example:

dsc425_hw1_john_doe.docx

If there are several files, name them in the above format, give them extra identifiers.

Example:

1. dsc425_paper_john_doe_report.docx
2. dsc425_paper_john_doe_code.R

If the work being submitted is a group assignment, put the group number in the above format:

Example: dsc425_project_group1_code.R

NOTE: The first page should always have the name, ID, and email of every member who participated in the assignment. Please do not forget.

Project

Students will work in teams of 3 or 4 students. Final project will start with group formation, followed by a proposal, followed by a milestone update and ends with a presentation and report. As part of your final project, you will also be asked to critique your classmates' projects. Each project will be graded and critiqued by students not in the group. These critiques will be collected by the instructor, collated, and passed on anonymously to the presenter. Together with the instructor's grading this will constitute the **final presentation** grade. There will still be the **project report** which will be graded by the instructor.

Many students have work/internships along with school making time frames very limited to match up with someone else. Some students live far away from the city which would make it hard to meet and work with other students on a regular basis. You can make use of online platforms such as Skype, Zoom and others to make it easier to meet. However, it is encouraged to meet physically as this will be a good experience for you in terms of team work and getting to know each other.

For DL students:

The only difference for the DL students is that they will **record** the project presentation instead of live presentation in class and share the link on the Discussion Board. These links will be shared with the class where each group will be graded and critiqued by students not in the group.

Whenever it is possible, it is recommended that the DL students attend the final presentations to participate in the live discussions of the final projects.

Coursework:

Paper Presentation (5%): Present one paper of your choosing that is relevant to the project you are doing. This will be done individually. These papers will go into your literature survey along with other papers that you have.

Group Formation: Form a group and sign up on d2l to work on your project. Submit an Excel file with your names, IDs, and emails who are in your group. Groups should consist of 3 to 4 students. So, you need to be ready welcoming other people in your group.

Proposal (5%): One-page proposal describing the problem, the dataset to be used, the proposed approach, and at least three references other than text book or class notes.

Weekly Updates (15%): Updates on the project. These will be small presentations. On what you have done and what you will do next. There will also be a code file showing your progress.

Milestone (10%): A major update on the project. Both presentation, report and code file is required.

Presentation (30%): Each project is to be presented using PowerPoint, and the pptx file will have to be submitted to be published on course web site.

Peer Project Presentation Evaluation (5%): As part of your final project, you will also be asked to critique your classmates' projects. Each project will be graded and critiqued by students not in the group. **This is done by everyone individually.**

Report (30%): The report will be written in a format of a paper (abstract, introduction, literature review, methodology, results, discussion, conclusions and future work). The literature review for the final report consists of reading and summarizing at least 10 papers on the review topic. While the internet can serve as a good source of information, the DePaul Library also has extensive holdings, most of them available electronically.

Other materials: Things like the literature survey papers, Data, Code Files etc. will have a separate entry on d2l.

NOTE: Both the report and materials like the code file, data, papers etc should be submitted to receive the full grade for the project report. If "Other materials" are missing, you will NOT get any credit for your report.

More details regarding each deliverable will be given throughout the quarter.

Email

Email is the primary means of communication between faculty and students enrolled in this course outside of class time. Students should be sure their email listed under "demographic information" at <http://campusconnect.depaul.edu> is correct.

Important: When emailing me regarding anything please make sure you write the course code and section name at the begin of the subject line. Make sure to put your name and ID at the end of your email.

Examples:

subject: **dsc425 inclass topic**

subject: **dsc425 online topic**

I receive many emails from different people. By providing me with course code and your name, you will help me a lot. Please adhere to this rule.

Changes to Syllabus

This syllabus is subject to change as necessary to better meet the needs of the students. Significant changes are unlikely, and will be thoroughly addressed in class. Minor changes, especially to the weekly agenda, are possible at any time. If a change occurs, it will be thoroughly addressed during class and posted under Announcements in D2L.

Class Cancellation

Unless DePaul University closes because of weather, we will have class. If I cannot make it due to a conference, meeting and other reasons I will try to hold the class either through Zoom or by recording a video and posting it online. Details will be provided should such circumstances occur.

Cell Phones/On Call

If you bring a cell phone to class (and we all do ☺), it must be off or set to a silent mode. Should you need to answer a call during the class, you must leave the room in an undistruptive manner. Out of respect to fellow students and the professor, texting is never allowable in class. If you are required to be on call as part of your job, please advise me at the start of the course.

School policies

Online Course Evaluations

Instructor and course evaluations provide valuable feedback that can improve teaching and learning. The greater the level of participation, the more useful the results. As students, you are in the unique position to view the instructor over time. Your comments about what works and what doesn't can help faculty build on the elements of the course that are strong and improve those that are weak. Isolated comments from students and instructors' peers may also be helpful, but evaluation results based on high response rates may be statistically reliable (believable). As you experience this course and material, think about how your learning is impacted. Your honest opinions about your experience in and commitment to the course and your learning may help improve some components of the course for the next group of students. Positive comments also show the department chairs and college deans the commitment of instructors to the university and teaching evaluation results are one component used in annual performance reviews (including salary raises and promotion/tenure). The evaluation of the instructor and course provides you an opportunity to make your voice heard on an important issue – the quality of teaching at DePaul. Don't miss this opportunity to provide feedback!

Academic Integrity and Plagiarism

This course will be subject to the academic integrity policy passed by faculty. More information can be found at <http://academicintegrity.depaul.edu/>.

The university and school policy on plagiarism can be summarized as follows: Students in this course should be aware of the strong sanctions that can be imposed against someone guilty of plagiarism. If proven, a charge of plagiarism could result in an automatic F in the course and possible expulsion. The strongest of sanctions will be imposed on anyone who submits as his/her own work any assignment

which has been prepared by someone else. If you have any questions or doubts about what plagiarism entails or how to properly acknowledge source materials be sure to consult the instructor.

Withdrawal

Students who withdraw from the course do so by using the Campus Connection system (<http://campusconnect.depaul.edu>). Withdrawals processed via this system are effective the day on which they are made. Simply ceasing to attend, or notifying the instructor, or nonpayment of tuition, does not constitute an official withdrawal from class and will result in academic as well as financial penalty.

Retroactive Withdrawal

This policy exists to assist students for whom extenuating circumstances prevented them from meeting the withdrawal deadline. During their college career students may be allowed one medical/personal administrative withdrawal and one college office administrative withdrawal, each for one or more courses in a single term. Repeated requests will not be considered. Submitting an appeal for retroactive withdrawal does not guarantee approval.

College office appeals for CDM students must be submitted online via MyCDM.

The deadlines for submitting appeals are as follows:

- Autumn Quarter: Last day of the last final exam of the subsequent winter quarter
- Winter Quarter: Last day of the last final exam of the subsequent spring quarter
- Spring Quarter: Last day of the last final exam of the subsequent autumn quarter
- Summer Terms: Last day of the last final exam of the subsequent autumn quarter

Excused Absence

In order to petition for an excused absence, students who miss class due to illness or significant personal circumstances should complete the Absence Notification process through the Dean of Students office. The form can be accessed at <http://studentaffairs.depaul.edu/dos/forms.html>. Students must submit supporting documentation alongside the form. The professor reserves the sole right whether to offer an excused absence and/or academic accommodations for an excused absence.

Incomplete

An incomplete grade is a special, temporary grade that may be assigned by an instructor when unforeseeable circumstances prevent a student from completing course requirements by the end of the term and when otherwise the student had a record of satisfactory progress in the course. CDM policy requires the student to initiate the request for incomplete grade before the end of the term in which the

course is taken. Prior to submitting the incomplete request, the student must discuss the circumstances with the instructor. Students may initiate the incomplete request process in MyCDM.

- All incomplete requests must be approved by the instructor of the course and a CDM Associate Dean. Only exceptions cases will receive such approval.
- If approved, students are required to complete all remaining course requirement independently in consultation with the instructor by the deadline indicated on the incomplete request form.
- By default, an incomplete grade will automatically change to a grade of F after two quarters have elapsed (excluding summer) unless another grade is recorded by the instructor.
- An incomplete grade does NOT grant the student permission to attend the same course in a future quarter.

Students with Disabilities

Students who feel they may need an accommodation based on the impact of a disability should contact the instructor privately to discuss their specific needs. All discussions will remain confidential.

To ensure that you receive the most appropriate accommodation based on your needs, contact the instructor as early as possible in the quarter (preferably within the first week of class), and make sure that you have contacted the Center for Students with Disabilities (CSD) at:

Student Center, LPC, Suite #370

Phone number: (773) 325-1677

Fax: (773) 325-3720

TTY: (773) 325-7296

Emergency Information Reminder

CLASS CANCELLATION or CAMPUS CLOSURE

In the event of a large-scale class cancellation or closure due to inclement weather or any other reason, a university- wide email will be issued. Additionally, the DPU Alert emergency notification system may be utilized. Be sure to verify your contact information for DPU Alert in Campus Connect. More information on DPU Alert can be found at <https://offices.depaul.edu/public-safety/safety/Pages/dpu-alert.aspx>

ACT OF VIOLENCE

Public Safety encourages you to contemplate a number of options for how to respond to an act of violence in various locations both on and off-campus. If you hear gunfire, shouting, screams, or commotion, react immediately. Please visit <https://offices.depaul.edu/public-safety/emergency->

[preparedness/respond-to-violence-on-campus/Pages/default.aspx](#) to view "Shots Fired On Campus" and a short video demonstrating how door barricades are used in classrooms.

The following actions are also recommended:

Run from the threat if you have a clear path of escape (When in doubt, barricade/secure your area)

- Know all emergency exits wherever you are
- Prevent others from entering the area where shooter may be
- Call 911 when you are safe

Hide: Barricade or secure your area to delay the attacker if you do not have a clear path of escape

- When in doubt, seek a secure location
- Lock room/office, stay quiet, turn lights off, hide under desk, in closet, cell phone on silent (not just vibrate)
- If room does not lock: barricade door with whatever is available-chairs, tables, desk, etc. Use door barricade device in classrooms.
- Fight: as a last resort, attempt to incapacitate the shooter, improvise weapons or throw items
- Attack as a team if possible, from multiple angles
- Use items such as chairs, fire extinguishers, coffee mugs, etc.

Please note we recommend you first call **9-1-1** in an active shooter situation. Then call **Public Safety** at the **Loop Campus (312-362-8400)** or the **Lincoln Park Campus (773-325-7777)**.

FIRE ALARM

Evacuate immediately upon hearing a fire alarm. Use interior stairwells if safe to do so (no smoke or fire) and exterior fire escapes as a last resort. Persons with disabilities may need assistance leaving the building during an evacuation. Visit <https://offices.depaul.edu/public-safety/emergency-preparedness/Pages/procedures-for-the-disabled.aspx> for more information.

While these types of events are infrequent, knowing what to do ahead of time is very important. Please develop your own plan for how you would respond if the situation warranted it.

All students are expected

To read this document in full!

To attend all classes (online students are expected to watch each lecture). If you miss a class, it is your responsibility to watch the lecture recording and to get copies of the notes or documents handed out in class. All lecture recordings are linked to the course website at <http://d2l.depaul.edu>

To participate actively to class discussions and activities and to work on the in-class problems and exercises that are designed to improve students' understanding of the class topics.

To be familiar with all the course documents and notes posted at the course website.

To strictly adhere to the University Academic Integrity Policy, that is published in the Student Handbook or at the Academic Integrity site at DePaul University (<http://academicintegrity.depaul.edu>).

Violations of the University Academic Integrity Policy include (but are not limited to): (a) using or providing unauthorized assistance or materials on course assignments; (b) possessing unauthorized materials during an examination; (c) submitting as one's own any material that is copied from published or unpublished sources such as the Internet, print, computer files without proper acknowledgement that it is someone else's; (d) submitting as one's own work a report, examination, paper, computer file, lab report or other assignment which has been prepared by someone else. If you are unsure about what constitutes unauthorized help on an exam or assignment, or what information requires citation and/or attribution, please ask your instructor. If proven, violations may result in the failure of the assignment, failure of the course, and/or additional disciplinary actions.