Instructor: Dr. Renzhe Yu (renzheyu@tc.columbia.edu)
Course Assistant: Chengyuan Yao (cy2706@tc.columbia.edu)
Class Schedule and Location: Online (Check Canvas for the Zoom links)
Office Hours and Location: By appointment, online
Prerequisite: HUDK4050 and HUDK4051
Credit: 3

Course Description

HUDK5053 Learning Analytics Practicum is a core course of the M.S. in Learning Analytics Program and a gateway for students to transition from their educational to professional experience. The course introduces principles and procedures in real-world educational data science problems, provides support for students’ capstone projects with external organizations, and helps students access resources and develop skills necessary for a career in education and data science.

Course Objectives

By the end of this course, you will be able to:

1. Understand educational data science problems in real-world context.
2. Work on a capstone project that applies what you learn in the M.S. program.
3. Develop workforce readiness and job search skills.

Software

All course material will be managed in the Canvas learning management system.

Assessments

No exams or quizzes will be given, but you will engage in various types of graded activities, listed below. Full descriptions will be posted on Canvas.

Participation: 10%
Participation grade will be based on your attendance and contributions to class discussions. You are expected to attend regularly and participate actively.

Personal portfolio: 20%
You will develop a personal professional portfolio based on your future career plan.

Professional development: 20%
You will complete a collection of professional development activities.

Capstone project: 50%
You need to submit a capstone project plan (10%). By the end of the term, you should also submit a midterm memo of your capstone project (40%). The specific format of the memo should be in consultation with the instructor and your project sponsor.

**Grading Scale**

- A \( \geq 94\% > A- \geq 90\% > B+ \geq 87\% > B \geq 84\% > B- \geq 80\% > C+ \geq 77\% > C \geq 74\% > \\
- C- \geq 70\% > D+ \geq 67\% > D \geq 64\% > D- \geq 60\%

**Topics and Schedule**

This short summer course will broadly cover the following topics:

- Approaching data science problems in practice
- Design and evaluation of data science projects
- Personal learning networks
- Career prospects in learning analytics / educational data science

There will be a series of invited panels/talks throughout the course. The schedule will be posted on Canvas as we confirm guest speakers’ availability.

**Communication**

You are expected to leverage the Canvas LMS for course-related communication. Specifically, questions about course logistics should be posted in the “Course Q&A” thread in the discussion forum so that everyone can benefit from the answers. One-to-one or small group conversations should take place in direct messaging. Compared to emails, using Canvas-embedded tools will create a central venue for both you and the instructor to attend to course-related issues, thereby improving efficiency.

**Netiquette**

Considering this course will take place fully online, it is important to be mindful of the rules of netiquette:

- Be aware of individual differences in cultural and linguistic backgrounds, as well as political and religious beliefs.
- Be respectful of the instructor and fellow students. Disagreements are fine, but please express them in a polite manner.
- Provide constructive feedback, not pure criticism.
- If you use an acronym or jargon in your speech or writing, it is best to explain its meaning first.

Specifically, for Zoom sessions:

- Mute your microphone when you are not speaking.
- Use the “raise hand” function if you have a question or comment.
- The chat window should be used only for class-related discussions.
- Be mindful of background noise and distractions around you.
- You are encouraged to have your camera on during class. Be mindful of how you dress and behave when you have your camera on.

**Syllabus Change Policy**
Except for changes that substantially affect implementation of the evaluation (grading) statement, this syllabus is a guide for the course and is subject to change with advance notice.

**Statement on Academic Integrity**

Students who intentionally submit work either not their own or without clear attribution to the original source, fabricate data or other information, engage in cheating or misrepresentation of academic records may be subject to charges. Sanctions may include dismissal from the college for violation of the TC principles of academic and professional integrity fundamental to the purpose of the College.

**Special Policy on the Use of Generative AI Tools**

Within this class, you are welcome to use generative AI tools (e.g., ChatGPT, Stable Diffusion, GitHub Copilot) in an unrestricted fashion. However, you should note that the underlying models behind these tools do guarantee the quality of the content they produce. You will be responsible for any inaccurate, biased, offensive, or otherwise unethical content you submit regardless of whether it originally comes from you or a generative AI tool. If you use one of such tools, you are required to acknowledge its contribution and submit your original input to the tool (e.g., text prompts) as an attachment to your submitted work. You will be penalized for using a generative AI tool without acknowledgement.

Exception: If you only use generative AI tools to polish your original work (e.g., improve the language flow, correct syntactic errors in your codes) or provide short-form input assistance (e.g., auto-complete a sentence or a few lines of codes), the policy above does not apply.

**TC Syllabus Policy**

1. **Accommodations** – The College will make reasonable accommodations for persons with documented disabilities. Students are encouraged to contact the Office of Access and Services for Individuals with Disabilities (OASID) for information about registration. You can reach OASID by email at oasid@tc.columbia.edu, stop by 301 Zankel Building or call 212-678-3689. Services are available only to students who have registered and submit appropriate documentation. As your instructor, I am happy to discuss specific needs with you as well. Please report any access-related concerns about instructional material to OASID and to me as your instructor.

2. **Incomplete Grades** – For the full text of the Incomplete Grade policy please refer to http://www.tc.columbia.edu/policylibrary/Incomplete Grades

3. **Student Responsibility for Monitoring TC email account** – Students are expected to monitor their TC email accounts. For the full text of the Student Responsibility for Monitoring TC email account please refer to http://www.tc.columbia.edu/policylibrary/Student Responsibility for Monitoring TC Email Account


5. **Sexual Harassment and Violence Reporting** – Teachers College is committed to maintaining a safe environment for students. Because of this commitment and because of federal and state regulations, we must advise you that if you tell any of your instructors about sexual harassment or gender-based misconduct involving a member of the campus community, your instructor is required to report this information to the Title IX Coordinator, Janice
Robinson. She will treat this information as private but will need to follow up with you and possibly look into the matter. The Ombuds Officer is a confidential resource available for students, staff, and faculty, including matters concerning “Gender-based Misconduct”. “Gender-based misconduct” includes sexual assault, stalking, sexual harassment, dating violence, domestic violence, sexual exploitation, and gender-based harassment. For more information, see https://www.tc.columbia.edu/policylibrary/policies/gender-based-misconduct-policy-for-students-1232278/. The TC Ombuds Officer may be reached at ombuds@tc.columbia.edu or 212-678-4169.

6. Emergency Plan – TC is prepared for a wide range of emergencies. After declaring an emergency situation, the President/Provost will provide the community with critical information on procedures and available assistance. If travel to campus is not feasible, instructors will facilitate academic continuity through Canvas and other technologies, if possible.