Industry Projects in Analytics
Spring 2017

Instructor Section 001: Hardeep Johar (hj2203@columbia.edu)
Class hours: F 10:10 am - 12:40 pm

Course Description
In this course, groups of students will work on real world projects in analytics. Students will focus on three aspects of analytics: identifying client analytical requirements; assembling, cleaning and organizing data; identifying and implementing analytical techniques (statistics, OR, machine learning); and delivering results in a client friendly format. Each project will have a well defined goal and will come with the sources of data pre-identified and have been structured so that they can be completed in one semester. The current roster of companies offering projects includes Planned Parenthood, IRI, Weight Watchers, and Biz2Credit though this may change before the start of the semester.

Please note that this is a client facing class and you should only enroll in this class if you believe you have the skills, time, and energy required to satisfy the requirements of the project. You may need to visit client sites and, consequently, please keep your Fridays clear.

Prerequisites
IEOR 4572 Python-Based Data Analytics or equivalent and concurrent registration in either Data Mining or Machine Learning.

Evaluation and learning components
Class presentations: Over the course of the semester, each group will be required to make a short in-class presentation three times. The goal of the presentation is
to demonstrate progress on the project and to get feedback and ideas from other students/visitors in the class.

**Participation**: Active participation through comments, questions, and attendance.

**Project**: The majority of the grade will depend on the work you put into the project. Your project grade will depend on the following factors:

- Quality of project work
- Quality of final report/product
- A final presentation to the client
- Readiness during client meetings (the degree to which there will be client meetings will vary from project to project and I’ll factor that into your score!)
- Ratings of results by other students
- Intra-project group performance and contribution ratings