18.900 FALL 2019: COURSE INFORMATION

Course webpage: For basic information, and links to the piazza forum, as well as to lecture videos (if we end up having them), see the course homepage: http://math.mit.edu/18.900/. For psets, lecture notes, announcements, and grades, we will use the Learning Modules/Stellar page, which is linked to from the homepage.

Homework: There will be weekly homework, to be submitted in-class each Friday. Online or email submission is not allowed. No late submissions are allowed. If you need to be excused from one of the problem sets, explain your situation and ask: you need to do that no later than two weeks after the homework was due.

Exams: There will be two in-class midterm exams, and a one-hour final exam. The final exam is not cumulative: it only covers the material after the last midterm. The classes before each midterm, and the last class, will be review sessions, run recitation-style.

Exam dates: Wednesday October 9; Friday November 15; and TBA (MIT schedules final exams).

You can not take the midterms at any other time (except for official conflict finals). If you need to be excused from one of the midterms, explain your situation and ask: you need to do that no later than two weeks after the midterm date. Missing the final, or taking a conflict final (allowed only if you have another final at the same time), is governed by MIT regulations.

Grading: Homework 60%, Exams 40% (each midterm 1/3, final 1/3). There will be no rounding, dropping worst score, “curving”, or other statistical manipulations.

Material: The course will approximately follow this plan:

- Polygons, polygonal curves (5 lectures)
- Billiards (4 lectures)
- Plane curves (3 lectures) – first midterm – Immersed curves (4 lectures)
- Algebraic curves (4 lectures) – Patchworking (2 lectures) – Projective plane (2 lectures) – second midterm
- Complexes, Betti numbers (4 lectures)
- Hyperbolic geometry (3 lectures) – Curved geometries (3 lectures) – exam

Total: 34 lectures + 3 review sessions + 2 midterms + 1 exam. Of course, adjustments are possible as we proceed.

Date: This version: August 8, 2019.