# Periodic Evaluation for FIL2405/4405 -- Philosophical logic and the philosophy of mathematics, Autumn 2016

Peter Fritz 20 January 2017

### Emnebeskrivelsen for emnet.

The aim of this course is to give a philosophical introduction to axiomatic set theory. This includes a rigorous introduction to the most common axiomatic set theory, Zermelo-Fraenkel set theory with the axiom of choice (ZFC), based on the textbook *Elements of Set Theory* by Herbert Enderton, from which students will be required to submit weekly exercises. We will also read several articles on philosophical aspects of set theory, such as the conceptual motivations for the axioms of ZFC. Students will write a final essay on a philosophical topic from these and additional readings, and present their essay topic during one of the last two seminars.

## Statistikk over karakterer, frafall, klager (for eksempel FS-rapport 754.001).

The class was normally attended by about 20 students. 21 students satisfied the requirements to be able to submit a final essay (see below). The distribution of grades was as follows:

- A: 4 students
- B: 6 students
- C: 5 students
- D: 2 students
- E: 1 student

### Studenttilbakemeldinger/underveisevaluering av emnet.

En expanded version of the standard questionnaire was handed out in the last seminar; 13 evaluations were received. The expanded questionnaire asked more specific questions, but overall, most students expressed agreement or strong agreement with the claim that they were satisfied with the course. Several students expressed the view that there was too much material, given the number of teaching hours.

## Evaluation

Much of the course content was based on chapters 1-4, 6 & 7 of Enderton's book. Students were asked to read the relevant section before class, and a significant portion of each class was devoted to teaching the relevant set-theoretic material. The syllabus also included eight articles on the philosophy of set theory, and the philosophy of mathematics more generally. These were also discussed in class.

The course consisted of 14 2-hour classes. Students were required to submit 9 out of 11 sets of exercises from Enderton's book and to give a presentation of their essay topic in one of the

last two seminars in order to be able to submit a final essay. The grade of the course was the grade of the final essay.

The texts on which the course was based and the format of the course both worked well. However, the course ended up covering too much material, especially for BA students. The best way to address this is probably to cover less set theory, e.g., by treating only cursorily the development of infinite cardinals and ordinals.