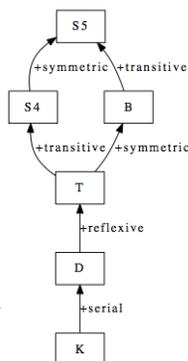


Modality in Logic and Language

Spring 2019, Universität Wien



Course No.	180163-1 SE
Time	Thursday, 11:30am–1:00pm
Place	Hörsaal 3F, NIG Universitätsstraße 7, 3rd floor
Website	https://moodle.univie.ac.at/
Instructor	Dr. Dirk Kindermann
Email	dirk.kindermann@univie.ac.at
Phone	01 4277-46472
Office	NIG, Universitätsstraße 7, 2.OG, Raum C0220
Office Hours	Thursdays 3–4pm and by appointment

Course Description

In this course, we will investigate the category of modality as it occurs in formal logic and in natural languages.

In the first part of the course, we will study modality in logic, where it is first and foremost understood through possibility and necessity. Hence modal logic is the logic of possibility and necessity.

Modality in natural language is a much wider phenomenon—it is understood to account for “displacement”, a design feature of human languages that allows for discourse that goes beyond the actual here and now. In the second part of the course, we will investigate two primary types of modal expressions in natural language: modal auxiliaries (*may, might, could, should, must*) and conditional constructions (*if...then*). We will study their semantics and learn about the formal system called “intensional semantics”.

In the third part of the course, we take a look at the context-sensitivity of epistemic modals (expressing what may or must be the case, given one’s information or knowledge).

This is primarily a course in formal logic and formal semantics. We will acquire tools that will be widely useful to your studies beyond logic and semantics: modal notions play a central role occur in philosophy of language, metaphysics, metaethics, epistemology, (meta)aesthetics, and others.

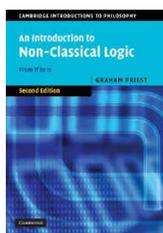
Course Goals

Students should master the basic tools of modal logic and intensional semantics and be able to apply them to a variety of topics in different areas of philosophy of language, metaphysics and linguistic semantics. They should also come to understand some of the basic views in modal propositional logic and in the intensional semantics of modal expressions, as well as grasp the significance of views for the philosophical investigation of modality. Finally, they should gain knowledge of main positions in the recent debate on epistemic modality and context-dependence.

Readings

Handouts and readings are available for download on the [Moodle course website](#). The main readings are also available as a **Reader** in the Facultas Copyshop on the ground floor of NIG. (Optional texts and handouts are only on Moodle.)

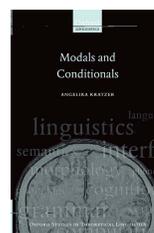
1. The textbook for the modal logic component of this class is [Graham Priest \(2008\)](#). *An Introduction to Non-Classical Logic. From If to Is*. 2nd., substantially expanded edition. Cambridge: Cambridge University Press. (There is a German translation of the first edition, which you can use. But note that you need to know the technical terms in English.)
2. The script for the semantics component will be [von Fintel & Heim \(2011\)](#). *Intensional Semantics*. Unpublished Manuscript, MIT.
3. In the Context & Epistemic Modality component, we will read recent papers by Andy Egan, Angelika Kratzer and others.



INTENSIONAL SEMANTICS

Kat von Steudt, Hans Heim

Open Access
Public Domain in the USA
https://doi.org/10.1017/9781107305438



Prerequisites

You must have successfully completed an introduction to formal logic course. Knowledge of propositional and predicate logic will be presupposed. If you have no background in logic whatsoever, you will find this course very challenging. If in doubt, come talk to me on the first day after class. You do not need prior knowledge of formal semantics, though it will be an advantage.

Attendance

Attendance is obligatory. You may miss up to two (2) sessions without sanctions. I strongly advise you not to miss sessions. Our material is challenging, we are proceeding fast, each session builds on the previous ones, and it's easy to lose track if you skip material.

Assignments & Assessment

1. Exercise sets (30%)

There will be 3 exercise sets in parts 1 and 2 of the course, which you will have to complete by the following week and submit to me in person before class. Late submissions will be downgraded (unless you have a *very* good reason). The exercise sets will be available on the [Moodle course website](#) and will have exercises in formal logic and intensional semantics, as well as informal questions.

Submission deadlines

- 1. Exercise set on Modal Logic I New: 4/4/2019
- 2. Exercise set on Modal Logic II New: 2/5/2019
- 3. Exercise set on Intensional Semantics New: 16/5/2019

2. Presentation (20%)

You will be assigned one of two options.

- Option 1: In groups of 2–3 people, you will give a 10-15 minutes presentation of (only) the main reading in one session of part 3. As presenters, however, you are obliged to have read and prepared the readings marked as “optional” in the schedule for your session.
- Option 3: In groups of 3–4 people, you will give a presentation at the workshop day. Your presentation should be a response to one or more of Andy Egan’s papers, which we will read in part 3 of the course.

3. Paper (50%)

If your presentation option is 1, you will write a paper of 3000 words on any of the course’s topics (though not a mere summary of your presentation). Your paper needs to have a clearly stated **research question** as well as a clearly stated **thesis**. See my “Essay Writing in Philosophy” on [Moodle](#). You should not stray more than 300 words (10%) from the 3000 words-limit. Moreover, you need to discuss your research question and thesis with me, and present a rough outline, before the end of June in my office hours.

If your presentation option is 2, you will write a **joint paper** with your presentation group. The paper should be based on your presentation as well as the the feedback you receive on your presentation. The paper should be 4500 words (+/- 450 words) and clearly state your thesis. See my “Essay Writing in Philosophy” on [Moodle](#).

The **deadline** for submission of your paper is **14 July 2019**.

Course Schedule

We may choose to make revisions to the schedule as the semester is progressing. Check the [Moodle course website](#) regularly for up-to-date versions of the syllabus.

Part 1: Modal Logic		
1	14/3/2019	Introduction & Review of Propositional logic
		Handout, Priest (2008, ch. 1 & pp. xxvii–xxxii) [†] & Handout “The use-mention distinction”
2	21/3/2019	Propositional Modal Logic I
		Handout, Priest (2008, ch. 2) & Handout “Set Theory: A Primer” Optional: Sider (2010, §1.8, pp. 15–21)
3	28/3/2019	Propositional Modal Logic II
		Handout & Priest (2008, ch. 3) Optional: Sider (2010, §§6.1-6.3)

4 4/4/2019	Propositional Modal Logic III	No new readings ☞ Exercise set 1 due
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Part 2: Intensional Semantics

5 11/4/2019	Introduction to Intensional Semantics. Propositional Attitudes	Heim & Kratzer (1998, pp. 10–11, 34–39) & von Fintel & Heim (2011, chs. 1 & 2)
6 2/5/2019	Modality in Natural Language	von Fintel & Heim (2011, ch. 3) Optional: Kratzer (2012, ch. 1) ☞ Exercise set 2 due
7 9/5/2019	Conditionals in Logic and Language	Handout, Priest (2008, §§1.6–1.10, 4.5–4.8) & von Fintel & Heim (2011, ch. 4 & §§5.1–5.2) Optional: Kratzer (2012, ch. 2), von Fintel (2011)

Part 3: Epistemic Modality & Context-Dependence

8 16/5/2019	“Epistemic Modals, Relativism, and Assertion”	Egan (2007), Egan & Kindermann (forthcoming) Optional: Egan (2011)
23/5/2019	Hand in exercise set 3 in my office from 3-4pm	☞ Exercise set 3 due
9 13/6/2019	“Might Do Better. Flexible Relativism and the QUD”	Egan & Beddor (2019). Optional: Knobe & Yalcin (2014)
10 20/6/2019	“What I Probably Should Have Said About Epistemic Modals” & “CIA Leaks”	Egan (2019), von Fintel & Gillies (2008a)
11–13 28/6/2019	Workshop with Andy Egan 9:45am–5pm, Hs 2G	Student Presentations & Talk by Andy Egan

† Note: In reading assignments from Priest (2008), you do not have to read the sections ‘Proofs of theorems’ that are marked with an asterisk (*) in the book.

14/7/2019 Submission deadline for term papers

How to prepare for this course

- **Exercise sets:** The only way to ‘understand’ formal logic and semantics is to master it. To master it, you have to **do** it. That’s why there are exercise sets.
- **Reading:** The readings in this course will be articles with a substantial amount of logical and semantic notation. The readings will be far from easy. Expect to read them **two to three times**. For the articles: “**read aggressively**” (see [Perry et al. \(2012, pp. 2–4\)](#)): Read closely, analyse, question, reconstruct, take notes, continue ...Always have a **pencil** ready to work through some formal point if you don’t understand it right from the text. For the logic textbook and semantics script: Read them as a **guide to doing logic**: As you read, have pencil and paper ready. At the end of a section, check if you can do a proof you read by yourself without looking into the book/script. Can you write down the definitions you encountered? Do the exercises in the book/script as you see fit. If you find the presentation of some point difficult to understand, consult another textbook (see readings below for suggestions). **Take notes of your questions, and bring them to class**. Finally, if you have trouble understanding the readings, or have any question concerning the course, you can always **consult me for advice**.
- Don’t miss any readings, don’t miss any exercise sets — it will be very hard to catch up.
- **Ask questions** in class: If a point is unclear to you, chances are your classmates will appreciate additional clarification, too. Don’t be shy to ask questions in class!
- **Team work:** You will find it helpful to **team up** with fellow students to **explain concepts, arguments, and technical material to each other** and to **critically discuss** them. What you invest in helping others will come back doubly when you solve the exercises and when you find yourself in the exam: You haven’t understood a concept or argument unless you can express it clearly and precisely. Note the limits to team work under **Academic Integrity**.

Academic Integrity & Plagiarism

Don’t plagiarise. It’s that simple. Plagiarism is an infringement of intellectual copyright and a serious offence, and is not taken lightly by the university. It is easy to avoid it: whenever you help yourself to the ideas of others, make their authorship explicit by **referencing** them. In addition, use **quotation marks** when you cite them word for word. When in doubt, always reference the source you’re using: better a reference too much than too little.

On **team work**: I strongly encourage you to work together on questions and exercises in formal logic and semantics, and to discuss topics from the course with fellow students. It is a good idea to work with others on the exercise sets, but if you do, make sure that you write up your answers on your own, in your own words. What you submit – what will be graded – must be your own work. Copying someone else’s homework is plagiarism.

Supplementary Reading Material

Logic Textbooks

- [Theodore Sider \(2010\)](#): *Logic for Philosophy*. Oxford: OUP
- [L.T.F. Gamut \(1991\)](#). *Logic, Language, and Meaning*, volumes I & II. London & Chicago: University of Chicago Press
- [Colin Howson \(1997\)](#). *Logic With Trees: An Introduction to Symbolic Logic*. London & New York: Routledge
- There are myriads of elementary logic textbooks. If you find one you like, and it allows you to follow the notation(s) we’re using in class, feel free to use it. Or consult me for advice.

Modal Logic

- G.E. Hughes & M.J. Cresswell (1996). *A New Introduction to Modal Logic*. London & New York: Routledge
- James Garson (2006). *Modal Logic for Philosophers*. Cambridge: Cambridge University Press
- Advanced modal logic textbooks: van Benthem (2010), Blackburn et al. (2001), Chellas (1980), Fitting & Mendelsohn (1998)

Conditionals

- Dorothy Edgington (2006). ‘Conditionals’. *Stanford Encyclopedia of Philosophy* <http://plato.stanford.edu/entries/conditionals/>
- Jonathan Bennett (2003). *A Philosophical Guide to Conditionals*. New York and Oxford: OUP

Linguistic Semantics

- Paul Portner (2009). *Modality*. Oxford: OUP
- Kai von Stechow (2006). ‘Modality and Language.’ In D. Borchert (ed.). *Encyclopedia of Philosophy*. Detroit: Macmillan Reference
- Eric Swanson (2008). ‘Modality in Language.’ *Philosophy Compass* 3(6), 1193–1207

Epistemic Modals

- Yalcin (2007, 2009, 2010, 2011, 2015)
- von Stechow & Gillies (2007, 2008b, 2011)
- Egan et al. (2005) & Stephenson (2007)
- Dowell (2011)
- Huvenes (2015)
- MacFarlane (2011, 2014)
- Moss (2015, 2018)
- Lassiter (2017)
- Swanson (2010)
- Veltman (1996) & Willer (2013)

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