

Logic & Cognition

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The course is aimed at deepening participants' insights into contemporary logical theory and practice of reasoning and inference.

On the theoretical side, we shall discuss the very notions of reasoning and inference from the point of view of cognitive science, considering the impact of the new influential psychologistic paradigm in logical research.

On the practical side, we shall examine basic models of logical analyses of reasoning processes and their applications to the analysis of human cognition.

Everything: mu.edu.pl \Rightarrow [Teaching](#) \Rightarrow [Logic and Cognition](#)

Logic & Cognition – the agenda

- Pre-start: what is university (for)?
- Psychologistic paradigm in logical research.
- Logical analysis of reasoning: mental logics.
- Logical analysis of reasoning: mental models.
- Syllogistic reasoning.
- Quantifiers.
- Moral reasoning and problem solving.
- Rationality.

Readings:

- Adler, J. E., Rips, L. J. (eds.) 2008. Reasoning. Studies of Human Inference and Its Foundations. Cambridge University Press.
- Stenning, K., van Lambalgen, M. 2008. Human Reasoning and Cognitive Science. MIT Press, Cambridge, MA.

- Lectures: 10. & 17.10.18, 7., 14. & 21.11.18.
- Tutorials:
 - five in-class (as above) with assigned readings – mostly chapters from from Adler and Rips' "Reasoning. Studies in Human Inference and Its Foundations"
 - individual appointments:
 - first round: 27.–28.11.18; discussions of topics and abstracts of term papers;
 - second round: 18.–19.12.18; checking on the progress;
 - third round (optional): 9.01.19; extinguishing the fires ('gosh, I'm lost');
 - fourth round: 22.–23.01.19; term papers vivas.

110 pts possible:

- Tutorials (80 pts):
 - 5 tasks (6 pts each), at the end of each in-class tutorial, concerning topics just covered;
 - term paper (50 pts); topic of your choice, but approved.
- Final exam (30 pts): open-book.

The scale:

Pts (tutorials)	Grade	Pts (total)	Grade
more than 65 – 80	5	more than 100 – 110	5
more than 55 – 65	4,5	more than 90 – 100	4,5
more than 50 – 55	4	more than 80 – 90	4
more than 45 – 50	3,5	more than 70 – 80	3,5
more than 35 – 45	3	more than 55 – 70	3
0 – 35	2	0 – 55	2

- Your individual work.
- 10–12 pages of text (including references), and a separate title page.
- Strong preference towards English.
- Topic of your choice, related to the course themes.
- Topic and abstract (ca. 250 words) need to be approved by 7.12.18; use the first round of individual appointments for discussion. At least one such appointment is compulsory for a paper to count towards the final grade. At the second round (again, compulsory) you are expected to provide a detailed outline of the paper. The third one is optional.
- Deadline for submitting the paper is one week before the fourth appointment (15.–16.01.19), at which we shall discuss the paper itself. This one is compulsory for a paper to count towards the final grade.

- Standard \LaTeX article class.
- 11 pt font.
- Author-year citations (apacite will do).
- Title page: author's first and last name, e-mail address, student index number, title of the paper, abstract, 3 to 5 keywords.

- Form (10 pts):
 - Does the content of the paper correspond to the topic specified in the title? (2)
 - Is the content well-structured? (3)
 - Is the paper well-written? (3)
 - Are the references adequate? (2)
- Content (40 pts):
 - Is the thesis and argumentation clear? (15)
 - Are there any author's own arguments? Are they sufficiently justified? (15)
 - Is there any novel perspective involved? (10)

10.10.18–21.11.18 in-class lectures and tutorials (with readings assigned)

27.11.18–28.11.18 Individual appointments, first round: discussions on topics and abstracts of term papers.

7.12.18 Final versions of abstracts due.

18.–19.12.18. Individual appointments, second round: checking on the progress.

9.01.19. Individual appointments, third round (optional): extinguishing the fires.

15.–16.01.19 Term papers due, depending on the date of second appointment.

22.01.19–23.01.19 Individual appointments, fourth round: term papers vivas.

01.–14.02.18 Exams, sometime.