1st Homework sheet Model Theory

- Deadline: 13 February, 13:00 sharp.

- Submit your solutions by handing them to the lecturer or the teaching assistant at the *beginning of the lecture*.

- Good luck!

Exercise 1 *(100 points)* Let L be signature and M and N be two L-structures. Show that if M is finite and M and N are elementarily equivalent, then M and N are isomorphic.

Hint: You may find it helpful to first think about the special case where the language L is finite.