

## Housing markets and parameterized complexity

### Abstract

In a housing market, a set of agents are each endowed with a single indivisible good and a preference relation over the set of goods. The goal is to reallocate the goods subject to some constraints. This is related to stable matching, and other social choice problems. Since social choice mechanisms may be manipulated, we study the complexity of doing so. This talk will introduce parameterized complexity and include new results on the complexity of manipulating the Top Trading Cycles mechanism.