#### Title

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# Summary

1	Introduction
2	What is Sokoban
3	State of the Art
4	My Work 4.1 Encodings
	4.2 Evaluation
5	Discussion of Results

#### Introduction

What do i do? I'm working on the Sokoban problem and trying to do my best to find a fast and easy solution to it. I'm not really working on any Sokobanlevel but just the ones meeting some criteria. I'm picking qualitative and quantitative characteristics and deciding on some values to examine. My encodings are supposed to work better on some of the instances and worse on others. What rules describe those fluctuations? Is there a trend when comparing runtimes to my qualitative and quantitative characteristics? E.g. you would expect the runtime to go up when the instance's size grows or when the amount of boxes in the level grows. In this thesis I will work on optimizing ASP encodings for the game Sokoban towards different instances.

#### What is Sokoban

Sokoban is a logistic game, where the player controls a character in a warehouse. The goal of the game is to move all crates in the warehouse on one of the target fields.

# State of the Art

- mention other works on Sokoban - what tests? - what results? - whats the connection?

## My Work

what did i do? what is my baseline? what changes from encoding to encoding which of the encodings works best in which kind of instance how do i evaluate that show my experiments and their results

- 4.1 Encodings
- 4.2 Evaluation
- 4.3 Experiments and Results

### Discussion of Results

compare chapter State of the Art with chapter My Work