

## Univerzita Komenského v Bratislave Fakulta matematiky, fyziky a informatiky

## PRIHLÁŠKA NA ZÁVEREČNÚ PRÁCU

Meno a priezvisko študenta: Bc. František Hajnovič

**Študijný program:** informatika (Jednoodborové štúdium, magisterský II. st.,

denná forma)

**Študijný odbor:** 9.2.1. informatika

**Typ záverečnej práce:** diplomová **Jazyk záverečnej práce:** anglický

**Názov:** Distance oracles for timetable graphs

Ciel': The aim of the thesis is to explore the applicability of results about distance

oracles to timetable graphs. It is known that for general graphs no efficient distance oracles exist, however, they can be constructed for many classes of graphs. Graphs defined by timetables of regular transport carriers form a specific class which it is not known to admit efficient distance oracles. The thesis should investigate to which extent the known desirable properties (e.g. small highway dimension) are present int these graphs, and/or identify new ones. Analytical study of graph operations and/or experimental verification on

real data form two possible approaches to the topic.

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\_\_\_\_\_podpis študenta