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Master of Science HES-SO in Engineering

Orientation: Information and Communication Technologies (ICT)

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Under the direction of: Prof. [FirstName][LastName] [ResearchUnit]

External expert: [FirstName][LastName]

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Acknowledgments

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Preface

A preface is not mandatory. It would typically be written by some other person (eg your thesis director).

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Lausanne, 12 Mars 2011

T. D.

Abstract

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Key words: keyword1, keyword2, keyword3

Résumé

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Mots clés: motclé1, motclé2, motclé3

Contents

Αc	know	ledgements	V
Pr	eface		vii
Αŀ	ostrac	t (English/Français)	ix
Ca	onten	ts	xiii
Lis	st of	Figures	χV
Lis	st of	Tables	xvii
Lis	st of	Listings	xix
1	1.1 1.2 1.3	Context	1 1 1 1
2	Ana 2.1 2.2 2.3 2.4 2.5	Tables	3 4 4 5 5 6
3	3.1 3.2 3.3 3.4	gn Short lists Long lists Multi-level lists Conclusion	7 8 9 12 14
4	Imp 4.1 4.2 4.3	Ementation Section 1 Section 2 Conclusion	15 16 16 16
5	Vali 5.1 5.2	dation Section 1	17 18 18

Contents

Gl	ossary	У	27
Re	feren	ces	25
Α	An a	ppendix	23
	6.4	Future perspectives	21
	6.3	Encountered difficulties	21
	6.2	Comparison with the initial objectives	21
	6.1	Project summary	21
6	Con	clusions	21
	5.3	Conclusion	19

List of Figures

2.1	A floating figure	4
2.2	Example subcaption	5

List of Tables

2.1 A floating table	4
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List of Listings

2.1	Example of listin	g using the	e minted packag	ge .													
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1 | Introduction

1.1 Context

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1.2 Objectives

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1.3 Structure of this report

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2 | Analysis

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Contents

2.1	Tables	4
2.2	Figures	4
2.3	Code	5
2.4	Other features	5
2.5	Conclusion	6

Chapter 2. Analysis

This chapter shows example of picture and also serves to populate the different lists: list of figures, list of tables, bibliography, and glossary.

2.1 Tables

This section contains an examples of table: Table 2.1

name	weight	food
mouse	10 g	cheese
cat	1 kg	mice
dog	10 kg	cats
t-rex	10 Mg	dogs

Table 2.1 A floating table.

2.2 Figures

This section contains examples of figures: Figure 2.1, Figure 2.2a, Figure 2.2b, Figure 2.2c, Figure 2.2d

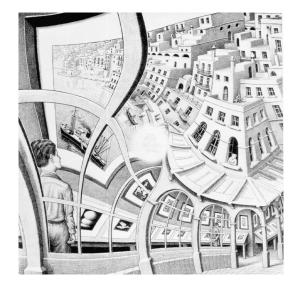


Figure 2.1 A floating figure: the lithograph Galleria di stampe, of M. Escher Source: http://www.mcescher.com/

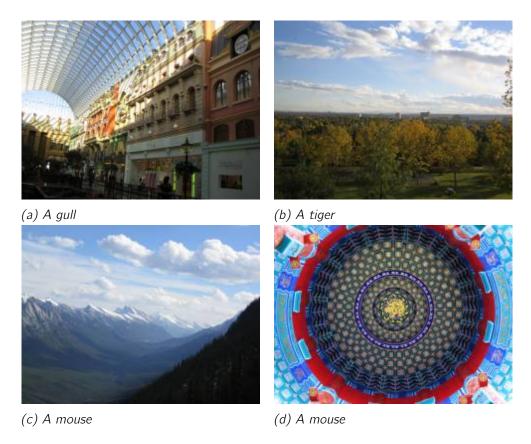


Figure 2.2 Example subcaption

2.3 Code

Listing 2.1 shows an example of Java code rendered with minted.

```
/**
 * The HelloWorldApp class implements an application that
 * simply prints "Hello World!" to standard output.
 */
class HelloWorldApp {
    public static void main(String[] args) {
        System.out.println("Hello World!"); // Display the string.
    }
}
```

Listing 2.1 Example of listing using the minted package

2.4 Other features

Term (glossaries): NoSQL

Acronym (glossaries): Structured Query Language (SQL)

Citation (biblatex): [1]

2.5 Conclusion

3 | Design

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Contents

3.1	Short lists	8
3.2	Long lists	9
3.3	Multi-level lists	12
3.4	Conclusion	14

3.1 Short lists

Hello, here is some text without a meaning. This text should show what a printed text will look like at this place. If you read this text, you will get no information. Really? Is there no information? Is there a difference between this text and some nonsense like "Huardest gefburn"? Kjift – not at all! A blind text like this gives you information about the selected font, how the letters are written and an impression of the look. This text should contain all letters of the alphabet and it should be written in of the original language. There is no need for special content, but the length of words should match the language.

- 1. First item in a list
- 2. Second item in a list.
- 3. Third item in a list
- 4. Fourth item in a list
- 5. Fifth item in a list

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First item in a list

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Third item in a list

Fourth item in a list

Fifth item in a list

3.2 Long lists

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3.3 Multi-level lists

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- First item in a list
 - First item in a list
 - * First item in a list
 - * Second item in a list
 - * Third item in a list
 - * Fourth item in a list
 - * Fifth item in a list
 - Second item in a list
 - Third item in a list
 - Fourth item in a list
 - Fifth item in a list
- Second item in a list
- Third item in a list
- Fourth item in a list
- Fifth item in a list

- 1. First item in a list
 - (a) First item in a list
 - i. First item in a list

Chapter 3. Design

- ii. Second item in a list
- iii. Third item in a list
- iv. Fourth item in a list
- v. Fifth item in a list
- (b) Second item in a list
- (c) Third item in a list
- (d) Fourth item in a list
- (e) Fifth item in a list
- 2. Second item in a list
- 3. Third item in a list
- 4. Fourth item in a list
- 5. Fifth item in a list

3.4 Conclusion

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4 | Implementation

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Contents

4.1	Section 1	16
4.2	Section 2	16
4.3	Conclusion	16

4.1 Section 1

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4.2 Section 2

4.3 Conclusion

5 Validation

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Contents

5.1	Section 1	18
5.2	Section 2	18
5.3	Conclusion	19

5.1 Section 1

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5.3 Conclusion

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6 | Conclusions

- 6.1 Project summary
- 6.2 Comparison with the initial objectives
- **6.3** Encountered difficulties
- 6.4 Future perspectives

A | An appendix

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[1] Tyler Akidau et al. "MillWheel: Fault-Tolerant Stream Processing at Internet Scale". In: *Very Large Data Bases*. 2013, pp. 734–746.

Glossary

 $\textbf{NoSQL}\,$ Database not using the relational model and the SQL language. 5

SQL Structured Query Language. 5, 27