



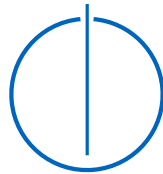
SCHOOL OF COMPUTATION,
INFORMATION AND TECHNOLOGY —
INFORMATICS

TECHNISCHE UNIVERSITÄT MÜNCHEN

Master's Thesis in Informatics

**Influence of Noise in Quantum Machine
Learning**

Erick Ruben Quintanar Salas





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**Einfluss von Rauschen in
Quantenmaschinen Lernen**

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Submission Date:	Submission date

I confirm that this master's thesis is my own work and I have documented all sources and material used.

Munich, Submission date

Erick Ruben Quintanar Salas

Acknowledgments

Abstract

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1 Introduction

1.1 Section

a. Introduce the reason quantum algorithms can't be run in current quantum devices and the need for NISQ appropriate algorithms. b. Describe the potential uses of noise in QML as a potential increase in robustness.

2 Style

2.1 Section

Citation test [1]. Acronyms must be added in `main.tex` and are referenced using macros. The first occurrence is automatically replaced with the long version of the acronym, while all subsequent usages use the abbreviation.

E.g. `\ac{TUM}`, `\ac{TUM}` \Rightarrow Technical University of Munich (TUM), TUM

For more details, see the documentation of the `acronym` package¹.

2.1.1 Subsection

See Table 2.1, Figure 2.1, Figure 2.2, Figure 2.3.

Table 2.1: An example for a simple table.

A	B	C	D
1	2	1	2
2	3	2	3

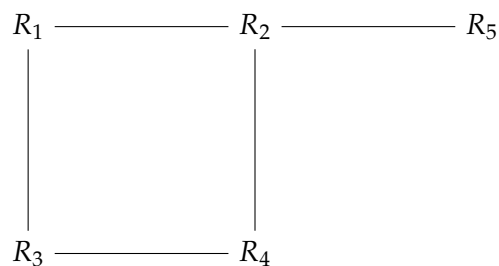


Figure 2.1: An example for a simple drawing.

¹<https://ctan.org/pkg/acronym>

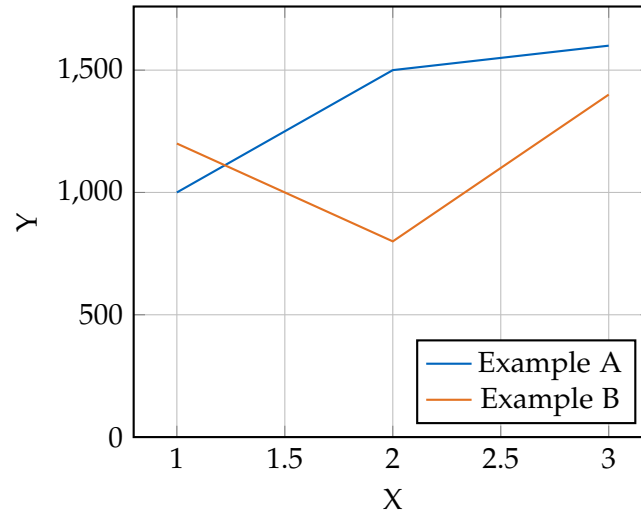


Figure 2.2: An example for a simple plot.

```
SELECT * FROM tbl WHERE tbl.str = "str"
```

Figure 2.3: An example for a source code listing.

Abbreviations

TUM Technical University of Munich

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Bibliography

- [1] L. Lamport. *LaTeX : A Documentation Preparation System User's Guide and Reference Manual*. Addison-Wesley Professional, 1994.