

NeuraViz: A Web Application For Visualizing Artificial Neural Network Structures

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We recommend acceptance of this manuscript in partial fulfillment of this candidate's requirements for the degree of Master of Software Engineering in Computer Science. The candidate has completed the oral examination requirement of the capstone project for the degree.

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Abstract

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This manuscript describes the software engineering processes and principles adhered to during the development of Neuraviz, a web application for visualizing artificial neural network structures. Users upload pre-trained machine learning models from popular frameworks including Pytorch and Keras, and Neuraviz generates a visual representation of the model’s architecture. The following manuscript focuses on the design, implementation, testing, and deployment of NeuraViz in an effort to comprehensively encapsulate the entire development process.

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Table of Contents

Abstract	i
Acknowledgments	ii
List of Tables	iv
List of Figures	v
Glossary	vi
1. Introduction	1
1.1. Overview	1
1.2. Background	1
1.3. Goals	1
2. Software Development Process	2
2.1. Overview	2
2.2. Life Cycle Model	2
2.3. Requirements	2
3. Design	3
3.1. Overview	3
3.2. UML Class Diagram	3
3.3. Database	3
3.4. User Interface	3
4. Implementation	4
4.1. Overview	4
4.2. Technologies Used	4
4.2.1. Client	4
4.2.2. Server	4
4.2.3. Data Layer	4
4.3. Development	4
4.4. Deployment	4
5. Testing	5
5.1. Overview	5
5.2. Verification	5
5.3. Validation	5
6. Security	6
6.1. Overview	6
6.2. Threat Model	6
6.3. Session Management	6
6.4. Web Application Security	6
7. Conclusion	7
7.1. Overview	7
7.2. Challenges	7
7.3. Future Work	7
8. Bibliography	8
9. Appendices	9

List of Tables

List of Figures

Glossary

1. Introduction

1.1. Overview

1.2. Background

1.3. Goals

2. Software Development Process

2.1. Overview

2.2. Life Cycle Model

2.3. Requirements

3. Design

3.1. Overview

3.2. UML Class Diagram

3.3. Database

3.4. User Interface

4. Implementation

4.1. Overview

4.2. Technologies Used

4.2.1. Client

4.2.2. Server

4.2.3. Data Layer

4.3. Development

4.4. Deployment

5. Testing

5.1. Overview

5.2. Verification

5.3. Validation

6. Security

6.1. Overview

6.2. Threat Model

6.3. Session Management

6.4. Web Application Security

7. Conclusion

7.1. Overview

7.2. Challenges

7.3. Future Work

8. Bibliography

9. Appendices