



## MOOH LUDIVINE ESTHER

 Busan, Republic of Korea

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## EDUCATION

Master of Science in Information Security (*Expected August 2025*)

### Pukyong National University, South Korea

- **GPA: 4.42/4.5 | Global Korea Scholarship Recipient**
- **Research Focus:** Post-quantum cryptography, optimizing ML-KEM for constrained environments.
- **Relevant Courses:** Cryptographic Chip Applications, Ubiquitous Computing Security, Advanced System Programming, Data and Algorithms, PKI, Finite Field Theory

Graduate Certificate in Cyber Security (*2020 - 2021*)

### La Trobe University, Australia

- **Specialization:** Network Security, Risk Management, Digital Forensics, Introduction to Cryptography

Bachelor of Science in Political Science (*2015 - 2017*)

### University of Nebraska, Omaha, USA

- **Graduated Cum Laude**
  - Minor : Criminal Justice and Criminology

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## RESEARCH EXPERIENCE

Student Researcher, System Security Lab (*Sep 2023 - Present*)

### Pukyong National University, South Korea

- **Optimized ML-KEM (Kyber) for IoT devices**
  - **Implemented cryptographic optimizations** in C using on Linux systems.
  - **Analyzed security properties** (IND-CCA2 proofs, collision resistance) and performance metrics.
  - **Presented research** at cybersecurity conference.
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## WORK EXPERIENCE

Project Manager (*Jan 2020 - Jan 2022*)

### Sauce Site

- **Led a team** of developers and designers to manage software projects.
- **Improved processes** for efficiency and streamlined documentation.
- **Handled client communications** and technical requirements.

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## TECHNICAL SKILLS

- **Programming Languages:** C, C++
- **Security & Optimization:** Post-quantum cryptography, memory & performance analysis, IND-CCA2 proofs.
- **Development Tools:** Linux, WSL, Valgrind Docker (basic familiarity).
- **Cryptographic Libraries:** PQM4

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## PUBLICATIONS & PRESENTATIONS

- **“ECC Accelerator using Faster Montgomery Ladder on FPGA Devices”** (*Busan Cyber Security Conference, 2024*)
- **“Enhancing ML-KEM Performance using Modular Reduction as Macro”** (*MITA 2024*)

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## LANGUAGES

- **French & Ewe:** Native
- **English:** Fluent (TOEFL Certified)
- **Korean:** Intermediate (TOPIK Level 3)
- **Spanish:** Intermediate (B1 Level)

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## ADDITIONAL INFORMATION

- **Visa Status:** D-2 (Student Visa)