ISAIAH KING

Las Vegas, NV **|** 702-250-7497 | Isaiahmking04@gmail.com | linkedin.com/in/isaiahking2004

TECHNICAL SKILLS

- **Programming:** C/C++, JavaScript, HTML/CSS, Python, SQL, Linux
- **Software/Tools:** SolidWorks, AutoCAD, Fusion 360, Revit, MATLAB, Microsoft Office Tools
- **Hardware/Lab equipment**: Arduinos, RaspberryPi4/5, Oscilloscope, Function Generator, 3D Printing
- **Knowledgeable:** Simulink, ANSYS, Ansible, Quartus, Eagle, Shell Scripting

PERSONAL PROJECTS

Group Project - Rodent Repellant   **Nov 2024 - Present**

- Designing a rodent repellent device using Raspberry Pi 5 to protect farm crops by detecting and deterring pests in real time
- Implementing YOLOv8 image processing to accurately detect rodents and trigger automated repelling mechanisms
- 3D modelling shell using full deposition modelling and vapor smoothing to increase water resistance

Solo Project - GiG WebApp   **Nov 2024 - Present**

- Developing a web application using JavaScript, Python and HTML/CSS to streamline performer-to-venue coordination, enhancing scheduling and management efficiency
- Implementing backend account management features using Firebase for secure authentication and data storage

Team Project - Stepper Motor Organ   **Sept 2024 - Jan 2025**

- Continuously enhancing an ongoing team project by optimizing JavaScript code for efficiency and refining the design layout for improved user experience
- Introduced organizational changes to ease code readability and flow, error-checking features to ease user experience and altered key features to improve circuit function and musical output

Solo Project - Personal Website   **Sept 2022 - Present**

- Developed and designed a personal portfolio website using HTML/CSS, and JavaScript to showcase project milestones and key achievements with an interactive and user-friendly interface
- Implemented interactive JavaScript-based sub-projects to demonstrate programming expertise, enhancing user engagement through dynamic UI features and responsive design
- Maintaining and updating the portfolio with new projects and achievements, ensuring an up-to-date representation of technical growth and expertise

CURRICULAR PROJECTS

Solo Project - FPGA Reaction Game   **Dec 2024**
ENSC 252 - Digital logic and Design - SFU

- Designed and developed a reaction time game using VHDL in Quartus, optimizing digital logic for real-time responsiveness.
- Implemented multiple player interaction options, diverse game modes, and dynamic display features, enhancing user experience and functionality.

Team Project - Fall Detection Device   **Sept 2023**
ENSC 100w - Engineering, Science and Society - SFU

- Developed a C++-based alerting device to notify healthcare workers of patient falls, enhancing response time and patient safety.
- Designed and 3D-printed a protective shell for the device using Blender and SolidWorks, ensuring durability and ergonomic fit for patients.

Isaiah King

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WORK EXPERIENCE

Lifeguard   **May 2020 - Aug 2022**

MGM Resorts International - Las Vegas NV
- Applied strong water safety knowledge while ensuring guest well-being
- Collaborated effectively with team members in a fast-paced environment, enhancing teamwork and adaptability
- Engaged with guests daily, developing strong communication, customer service, and conflict resolution skills.

Lifeguard   **Mar 2022 - Sept 2023**

The Mirage - MGM | Hard Rock Resorts International - Las Vegas, NV

- Partnered with pool management to streamline operations during the hotel's transition from MGM Resorts International to Hard Rock, demonstrating adaptability, problem-solving, and organizational skills.
- Coordinated teams in handling high-pressure medical emergencies, strengthening crisis management, and teamwork under stress.

VOLUNTEER EXPERIENCE

Lead Volunteer: **Oct 2021 - Dec 2022**

Opportunity Village - Las Vegas, NV

- Volunteered at Opportunity Village during various events, assisting with community engagement and support activities
- Provided care and companionship to children and elderly individuals while collaborating with teams to ensure a safe and inclusive environment

EDUCATION

Simon Fraser University   **Sept 2023 - Present**

Bsc. Systems Engineering
- Pursuing a Minor in Business

West Career and Technical Academy   **Sept 2019 - May 2023**

Specialization in Engineering
- Relevant coursework in Engineering Design and Project Management

EXTRACURRICULAR ACTIVITIES

Varsity Wrestling
- Wrestled at 125 and 133 lbs for two semesters at Simon Fraser University
- Competed in numerous high-level tournaments during high school, earning multiple first-place and finalist finishes

Music
- Founded and led high school jazz band for multiple years; continued jazz experience and joined the SFU Jazz ensemble
- Earned Best Drummer in Battle of The Bands: Henderson competition for Metal Drumming in 2023
- Earned best soloist at the Reno Jazz Fest in 2017, 2018 and 2019

Ansible Open Source Contributor
- Joined the Ansible OS forum to self-teach Ansible applications and system automation implementation.
- Frequently contributing to discussion boards to ask and answer questions
- Assisting in programming and documentation improvements