# FRANK DORNBERGER WEMBER

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# **SUMMARY**

Junior Computer Science student with a strong foundation in quantitative analysis, algorithm development, and large-scale data processing. Seeking an internship to apply my technical expertise, problem-solving abilities, and innovative mindset to create high-performance financial technology solutions and contribute to the firm's success.

## **EDUCATION**

#### Southern Illinois University Edwardsville (SIUE),

Expected December 2026

Bachelor of Science; Major: Honors Computer Science; Minor: Mathematics, and Business

GPA Overall: 3.92; Intellectual Area: 4.0

**Relevant Coursework:** Data Structures & Algorithms, Intro to Operating Systems, Machine Learning, Advanced Calculus, Financial Modeling, Probability and Statistics, Discrete Math, Marketing, Project Management

#### SKILLS & RELEVANT PROJECTS

- Programming Languages: Python (proficient), C++ (proficient), React (intermediate), JavaScript (intermediate), R (proficient)
- **Technologies:** Data Analysis (pandas, NumPy), Financial Modeling, Continuous Integration and Continuous Delivery (CI/CD), Amazon Web Services (AWS), PostgreSQL
- Business: Quantitative Analysis, Financial Operations, Data Visualization, Client Relations, Presentation/Reporting, Teamwork
- Languages: English (fluent), French (native)

### **EXPERIENCE**

#### RELEVANT EXPERIENCE

Meta Software Engineering Intern, META, Menlo Park, CA

June 2023 - August 2023

- Collaborated with **Ads and Machine Learning** team to implement new features and resolve technical issues on Meta's products.
- Integrated data from multiple APIs to build a recommendation system, performing comprehensive database manipulations.

# RESEARCH ASSISTANT, AI Interaction Research, SIUE School of Business:

November. 2023 – Present

- Conduct research to assess AI's influence on corporate decision-making and consumer behavior, providing actionable insights that informed strategic AI integration.
- Deliver valuable insights for companies navigating the dynamic AI landscape, enhancing their decision-making processes.

### CALCULUS ENRICHMENT SESSION LEADER, SIUE mathematics department, IL

April. 2023 - Present

- Enhance students' problem-solving skills through personalized recitation activities and strategic mentorship techniques.
- Cultivate a dynamic learning environment to drive students' excellence in mastering advanced Calculus skills.

### LIBRARY SUPERVISOR, Lovejoy Library, Edwardsville, IL

March 2023 - Present

• Play a pivotal role in training and mentoring staff, ensuring efficient daily operations and adherence to library policies, which led to improved service delivery and higher patron satisfaction.

# LEADERSHIP & EXTRACURRICULAR

# TWICE WINNER OF "MOST AMBITIOUS PROJECT" AT eHacks, St Louis, MO

March 2023/March 2024

- Led my team to win the "Most Ambitious Project" award two years in a row.
- Created Mood Tune using metrics like heart rate, Facial recognition and location to provide the ideal user's audio experience
- Applied mathematical techniques like Fourier Transform for real-time phoneme detection and audio analysis and breakdown.

#### MERIDIAN SCHOLAR, Southern Illinois University Edwardsville, IL

February 2022

• Full-ride scholarship for exceptional academic achievement, leadership potential, and commitment to making a positive impact.

BALANCE MAN SCHOLARSHIP - Southern Illinois University Edwardsville, IL

October 2022

Awarded for holistic development encompassing intellectual, physical, and emotional growth, and community contribution.

# SIUE BOXING CLUB:

November 2022 - Present

• Lead a team of 25 students in boxing training sessions and managed club operations

#### **SIUE ROBOTICS:**

February 2023 - Present

• Collaborate with fellow team members to fine-tune software solutions, algorithmic strategies, and data analysis techniques to optimize the robot's performance and responsiveness during competition

# PROJECT:

# **Spotify Music Recommendation App:**

Developed a full stack responsive React app integrated with trained ML models for facial recognition, recommending Spotify music based on users' mood, facial expressions, and location. https://github.com/FrankWember/Capstone

#### **University Student Platform:**

I developed a TypeScript app for my university that lets students access campus activities, join study groups, and buy or sell products and services. It's user-friendly, secure, and is responsive on all platforms. https://github.com/FrankWember/UniHive-v1