RamBluff: Online Poker

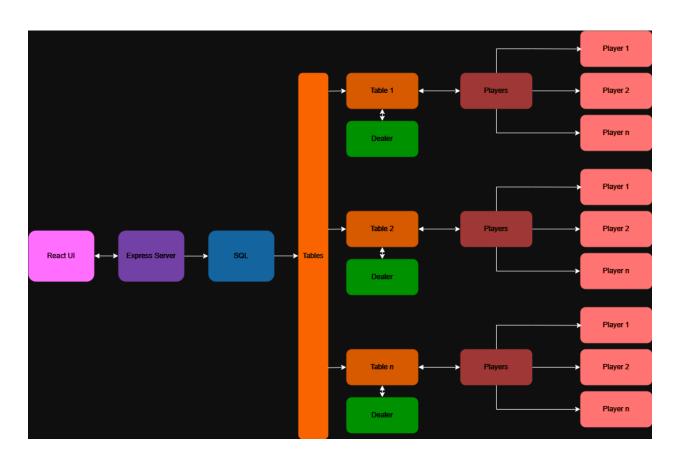
Group 9 Sean Berlin, Kirtan Chavda, Jared Colletti, Zachary Leopold

Chapter 1: Vision

1.0 Introduction

RamBluff is an online poker web application that delivers a seamless and immersive gaming experience to users. Our platform will utilize cutting-edge technologies to create a dynamic environment where players can engage in friendly poker games with ease and convenience. The games played within our application will contain a user-friendly interface while securely managing player and gamestate data, and comply with the Texas Hold'em ruleset.

RamBluff: Online Poker



Chapter 2: Technical Proposal

2.0 Architecture Overview

Our proposed architecture consists of three main components: the frontend UI developed with React, the backend server powered by Node.js, and the database management system using SQL

2.1 Frontend Development (React)

We will adopt a component-based architecture in React to facilitate code reuse, improve maintainability, and enhance development efficiency. With the utilization of CSS frameworks like Bootstrap, we will ensure that the UI is responsive and optimized to provide a consistent user experience. Along with that, we will be employing Redux for state management, data flow, and the synchronization between different components of the application.

2.2 Backend Development (Node.js/Python)

Our team will be designing a RESTful API to handle client-server communication, allowing for seamless interaction between the frontend and backend components. Along with that, we will be utilizing an open-source API made by "goldfire" to handle all winning hands. In order to enable real-time communication between players and the server, we will be using Socket.IO; this will allow live game updates and possible chat functionalities. We plan to use middleware libraries such as Express to define our routes for the necessary HTTP methods (GET,POST,PUT,DELETE,etc.) in order to communicate with our "dealer" and "player" python classes.

2.3 Database Management (MySQL)

We will design a relational database schema using MySQL to store game states and player profiles(along with any other relevant data). To ensure efficient data retrieval and storage, we will be using proper normalization and indexing techniques.

2.4 Conclusion

By implementing these technical strategies, we aim to develop a robust and scalable online poker platform that delivers a superior gaming experience to our users while maintaining the highest standards of security, reliability, and entertainment.

Sean Berlin

SeanBerlin724@gmail.com | Graduating Spring 2024| linkedin.com/in/sean-berlin-571778201/

EDUCATION

West Chester University

Graduating Spring 2024

B.S Computer Science- Certificate in Computer Security (NCAE-C)

GPA 3.5

- Concentrations: Computer Science with Cybersecurity Specialization
- Related Coursework: Computer Security & Ethics, Software Security, Modern Malware Analysis, Data Communications and Networking, Intro to Cloud Computing, Software Engineering, Data Structures & Algorithms, Database Management Systems

SKILLS

Operating Systems: Windows, Linux

Languages: Java, Python, C#, SQL, OCaml, x86 Assembly, Bash Shell Scripting

Microsoft: Access, Excel, Word, PowerPoint

General IT Security: Basic knowledge of cybersecurity principles, user account management, and access control **Communication:** Excellent verbal and written communication skills with ability to convey technical information

COLLEGE INVOLVEMENT

Clubs and Activities from CS Department

- Multiple-time participant in the West Chester University Programming Contest (WCPC) and Computer Science Robotics Camp, showcasing problem-solving skills and algorithm development expertise
- Member of the department's Cyber Security Club, actively participating in hackathons and staying informed about cyber security events

Fraternity

• Member and Community Service Chair for Alpha Chi Rho, organizing and leading community service initiatives to give back within the fraternity and the broader community

JOB EXPERIENCE

Lee's Hoagie House

June 2019 - Current

Assistant Manager with Third-Party Ordering Oversight

- Supervised and trained a team of up to 10 employees, ensuring a high level of customer service and quality food preparation.
- Maintained a clean and organized shop environment, ensuring compliance with health and safety regulations.
- Managed the implementation and operation of third-party delivery services, ensuring seamless integration with the business's ordering system and procedures.

Camp Invention (STEM) Leadership Intern

Instructor

- Led and supervised groups of up to 30 elementary school students during STEM-focused summer camps, ensuring safety and engagement at all times.
- Developed and facilitated hands-on activities and experiments that fostered creativity, problem-solving, and critical thinking skills among campers.
- Mentored and trained junior counselors to promote leadership development and effective teamwork.

Kirtan Chavda

kirtanchavda2003@gmail.com

EDUCATION

West Chester University of Pennsylvania Bachelor of Science in Computer Science

Aug. 2021 – May 2025

West Chester, PA

EXPERIENCE

Jul 2021 – Present Manager Best Eye Vision

Malvern, PA

• Managing the buissness, the staff and the function of the clinic

- Heading the marketing and insurance department
- Explored ways to visualize the growth of the clinic

TECHNICAL SKILLS

Languages: Java, C/C++

Public Speaking **Budget Management**

Jared Colletti

jaredcolletti123@gmail.com • https://www.linkedin.com/in/jared-colletti-975316215/ • github.com/JaredC71

EDUCATION

West Chester University | West Chester, PA

B.S. in Computer Science | GPA: 3.3/4.0

May 2024

Relevant Courses: Operating Systems, Data Structures, Foundations of Programming, Algorithms & Analysis

Certificate: University of Pennsylvannia's LPS Coding Bootcamp

TECHNICAL SKILLS

Programming Languages: Java, Python, JavaScript, C, Haskell **Operating Systems:** Windows XP/Vista/7/8/10/11, Linux

PROJECTS

Online Poker Game | University Project

May 2024

Collaborated with a team of 3 and developed a fully functional web application with a dynamic Javascript-based
front-end, a RESTful server-side API, a relational database that stores back-end application state, and an ORM layer
to access data in the database

Unix Shell | University Project

Dec 2023

- C implementation of terminal-based Unix Shell
- Features supported: redirection, parallel processing, built-in commands

PROFESSIONAL EXPERIENCE

Programming Instructor | CodeWizardsHQ | Remote

Nov 2021 - May 2022

- Create lessons plans
- Teach curriculum to 6 14 student classes
- Grade assignments, projects, submit feedback, and attend virtual training sessions

Zachary Leopold

zacleopold1@gmail.com • linkedin.com/in/zacharyleopold • github.com/zleopold

CAREER OBJECTIVE

As a dedicated soon-to-be graduate with a Bachelor's degree in Computer Science, I am eager to leverage my academic knowledge and skills in software development/engineering to contribute effectively to a dynamic team. Passionate about solving complex problems and staying up to date with emerging technologies. Seeking an entry-level position where I can grow professionally, learn from experienced colleagues, and make meaningful contributions to innovative projects.

EDUCATION

West Chester University of Pennsylvania | West Chester, PA

B.S. in Computer Science | GPA: 3.76

Exp. Grad. Spring 2024

Member of Upsilon Pi Epsilon, International Computer Science Honor Society

- Relevant Courses: Cloud Computing, Data Structures & Algorithms, Software Engineering, Computer Security
- Dean's List: Fall 2022, Spring 2023, Fall 2023
- Clubs: Competitive Programming, Computer Science, Cyber Security, WCU Esports

Millersville University of Pennsylvania | Millersville, PA

B.S. in Computer Science | Major GPA: 3.9

Aug 2019 - May 2021

Invited to Honor Society sophomore year

TECHNICAL SKILLS

Programming Languages: Java (Advanced), Python (Intermediate), C (Intermediate), GO (Beginner), JavaScript (Beginner)

Operating Systems: Windows, Linux

Software/Tools: Visual Studio, Eclipse, Git/Github, MongoDB

PROJECTS

GalaxyMentor | Independent Study Project

September 2023 - Present

- Web application, created by Dr. Si Chen, that utilizes artificial intelligence to teach students across varying topics with a focus on Computer Science
- Studied and assisted with the implementation of features such as storing and accessing information within a database
- Use of GO, JavaScript, CSS, MongoDB

EXPERIENCE

Semi-Pro Counter-Strike Player

May 2016 - Present

- Facilitated structured practice, analyzed gameplay and developed strategies with team members within team-set deadlines in order to perform to our highest abilities
- Collaborated with the team to consistently push the current ideologies and playstyles for upwards of seven (7) different maps
- Promoted and enforced the improvement of mechanical, conceptual, and communication skills

Hardscaper | EPLandscaping | Garnet Valley, PA

(Summers) June 2016 - August 2019

- Completed projects that complied with given specifications, standards, and contractual obligations
- Consulted with customers to explain the methodology and decisions made throughout the project to ensure satisfaction