Weekly Progress Report

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Date of submission:13/07/2024

Weekly Report - Week 3

1. Overview

This week, I focused on deepening my knowledge of the MERN stack, specifically exploring frameworks and concepts crucial for my Health Care Management System project. Additionally, I studied authentication and authorization mechanisms, and client-server architecture. I successfully coded the functional backend for my project and uploaded the work to GitHub.

2. Achievements

- **MERN Frameworks Study**: Completed a detailed study of the MERN stack (MongoDB, Express.js, React.js, Node.js), focusing on how each component integrates and functions within the stack.
- **Authentication & Authorization**: Gained a solid understanding of authentication and authorization methods, essential for securing user data and managing access control.
- **Client-Server Architecture**: Studied the principles of client-server architecture to better understand the interaction between the frontend and backend of my application.
- **Backend Development**: Coded a functional backend for the Health Care Management System project, incorporating user authentication and authorization features.
- **GitHub Repository**: Uploaded my project work to GitHub for version control and collaboration. The repository can be accessed at [GitHub - Project WeCare](#).

3. Challenges

- **Complex Authentication**: Implementing secure authentication and authorization mechanisms was challenging, requiring careful consideration of security best practices.
- **Backend Integration**: Integrating various components of the backend and ensuring smooth communication between them posed some initial difficulties.

4. Learning Resources

- **LMS Platform Documents and Videos**: Continued to provide valuable insights into the MERN stack, authentication, and client-server architecture.
- **YouTube Tutorials**: Supplemented my learning with practical examples and detailed explanations of complex concepts.

- **Online Documentation**: Utilized official documentation for MongoDB, Express.js, React.js, and Node.js to understand specific functionalities and best practices.

5. Next Week's Goal

- **Frontend Development**: Begin developing the frontend of the Health Care Management System using React.js, ensuring it interacts seamlessly with the backend.
- **Azure Deployment**: Start deploying the backend services to Azure, setting up the necessary infrastructure and services.
- **User Interface Design**: Focus on designing a user-friendly and intuitive interface for the application.
- **Testing and Debugging**: Conduct thorough testing and debugging of the backend functionalities to ensure they work as expected and are secure.

By achieving these goals, I aim to progress significantly in developing the Health Care Management System, ensuring that both the backend and frontend are robust and well-integrated.