Task 4: Dockerfile + Docker Compose Deployment

# Overview

Task 4 aimed to set up Infrastructure as Code using Dockerfile and Docker Compose for the three applications. The team optimized existing Dockerfiles and created a modular code structure to facilitate continuous collaboration.

## Project Structure

* Repository: [dockerdemons2](https://github.com/your-username/dockerdemons2)
* Branch: main

## Approach

* Dockerfile and Docker Compose were chosen for Infrastructure as Code.
* Existing Dockerfiles were optimized for compatibility, or new ones were created as needed.
* A modular code structure was maintained to enable continuous collaboration.

## Challenges Faced

1. **Networking Conflicts:** Docker Compose services faced conflicts on the same network.
2. **Dockerfile Debugging:** Debugging Dockerfile for application3 due to unexpected errors.

## Learning Notes

1. **Docker Networking:** Gaining insights into Docker networking and service isolation.
2. **Dockerfile Optimization:** Fine-tuning Dockerfiles for efficient container builds.
3. **Collaborative Development:** Enhancing collaboration through Docker Compose.

# Task 4 Conclusion

Task 4 highlighted the successful deployment of applications using Dockerfile and Docker Compose. Challenges related to networking conflicts and Dockerfile debugging were overcome through collaborative efforts. The modular code structure and optimized Dockerfiles contribute to a scalable and maintainable project, laying the groundwork for future containerized deployments.