

CON-STRUCT

Bring together

THE TEAM

1. **DORINE KHAINZA** - Development, Research and Documentation
2. **MARIE-ELEN ODIMBA KOMBE** - Development, Analysis and Documentation

The above roles have been decided due to student strengths and capabilities in the particular areas of execution.

TECHNOLOGIES

In order to execute this project, we shall implement and use the following;

1. Front-end: HTML, CSS, JavaScript, Bootstrap, jQuery, React
2. Back-end: Node.js, Express.js
3. Database: Firebase

This technology was chosen because it will be quick and easy to develop the app seamlessly and smoothly. It is also;

- Cost effective
- User friendly
- Cross-platform compatible

INSTALLATION AND SETUP

To run this web application on your local machine, follow the steps below:

1. Clone this repository to your local machine.
2. Install Node.js and MongoDB on your machine.
3. Open a terminal and navigate to the project directory.
4. Run npm install to install the required dependencies.
5. Run npm start to start the application.
6. Open your web browser and navigate to <http://localhost:3000>.

THE CHALLENGE

The construction industry is a critical component of the global economy, employing millions of people worldwide. The industry has been known to have unique challenges that require specialized skills, resources, and tools. However, many businesses and workers in the construction industry face difficulties in finding skilled workers, contractors, and business opportunities. To address these challenges, we propose the development of an app called **CON-STRUCT**, a business and employment-focused social media platform that works through websites and mobile apps

Objective:

The primary objective of the CON-STRUCT app is to create a platform where businesses and skilled workers in the construction industry can connect and interact with each other. The app will allow businesses to post job openings, project updates, and search for skilled workers and contractors in various construction fields. On the other hand, skilled workers and contractors can use the platform to find job opportunities, build their professional network, and promote their services to potential clients.

Key Features:

- **User Registration and Login:** Users can create an account on the platform by registering with their email address and password. Once registered, they can log in to the platform to access its features.
- **Profile Creation and Management:** Users can create and manage their profiles on the platform. They can add their personal information, work experience, and skills to their profile.
- **Job Posting and Application:** Employers can post job opportunities on the platform, and job seekers can apply for those jobs through the platform.
- **Professional Networking:** Users can connect with one another on the platform to build their professional networks. They can send and receive messages and connect with other users.
- **Construction News feed:** Users can stay up-to-date with the latest construction news through the platform's newsfeed feature. They can filter the news by category and view the articles that interest them.

EXISTING SOLUTIONS

Procore: Procore is a cloud-based construction management software that offers a range of features, including project management, financial management, and collaboration tools. It also includes a marketplace for third-party apps and integrations.

Similarities:

- Both offer mobile apps for in the construction Industry
- Both offer integrations with other software tools.

Differences:

- CON-STRUCT also offers a job marketplace for skilled workers and businesses to connect, whereas Procore does not have this feature.
- CON-STRUCT provides training and certification courses for skilled workers, whereas Procore does not have this feature.
- Procore is a dedicated project management software, whereas CON-STRUCT is a business and employment-focused social media platform for the construction industry

PlanGrid: PlanGrid offers a feature called Labor Management, which allows contractors to manage their labour resources and track progress on their projects. The platform also integrates with several other construction labour management tools, such as WorkMax and TSheets

Similarities:

- Both provide project management features for the construction industry.
- Both offer mobile apps for on-site management.
- Both offer integrations with other software tools.

Differences:

- CON-STRUCT also offers a job marketplace for skilled workers and businesses to connect, whereas PlanGrid does not have this feature.
- CON-STRUCT provides training and certification courses for skilled workers, whereas PlanGrid does not have this feature.
- PlanGrid offers more specialized construction-related features such as RFIs (Request for Information) and punch lists, whereas CON-STRUCT can offer a wider range of business and employment-focused features, such as skill assessments and job search tools.
- PlanGrid has been acquired by Autodesk, a major player in the construction software industry, whereas CON-STRUCT is a hypothetical platform at this stage.

CONCLUSION:

The CON-STRUCT web app will be a game-changer for businesses and skilled workers in the construction industry. By creating a platform that connects businesses with skilled workers and contractors, the app will facilitate project collaborations and job opportunities. With its unique features and marketing strategy, CON-STRUCT has the potential to become a leading social media platform in the construction industry.

AUTHORS

- **DORINE KHAINZA** - Development, Research and Documentation
- **MARIE-ELEN ODIMBA KOMBE** - Development, Analysis and Documentation