



IS480 PROJECT PROPOSAL

BLOCKCHAIN TALENT SOURCING & RECRUITING MARKETPLACE

Proud Miner

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Sponsor: Candid-intel

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PROJECT OVERVIEW

1.1 PROJECT DESCRIPTION

Our project goal is to build a talent recruitment job board underpinned by a blockchain network of peer to peer actors including employers, recruiters and job seekers delivered via a web application. The application is built on a private blockchain to power a decentralized recruitment job platform to enable employers to post jobs and view job auction, which is a platform to list all the CVs based on recruiter's rating. Job seekers could apply for jobs using his own CV / refer other talents and recruiters could join job auction by posting CV.

Currently, the main problems encountered in the job market by actors are - distrust of data, distrust of vendors, data ownership and inefficient HR systems leading to a loss of data and potential revenue streams. However, with all transactions being conducted via smart contracts and all the data being stored on the blockchain, actors can have security and transparency of the exchange of valued information. Overall, blockchain technology will assist in the following: Decentralized contract execution, Automated settlement & reduced transaction fees, Proof of ownership, Immutable data.

1.2 MOTIVATION

Recruitment today is highly inefficient, over 68% of companies who utilize job boards complained that they received too many unqualified applicants, a poor candidate pipeline and a high cost per hire.

1. Create a pool history ledger avoiding issues of fraud: Our job history function enables clients to review all jobs and candidates associated with them, creating an immutable employment record because within blockchain each transaction will be verified by each node.
2. Reduce both monetary and time cost of talent acquisition: Posting jobs does not require payment from employers. Scheduling interview and offering job will both take place within the application without going through external websites or phone calls.
3. High quality talent recommendation: Use a rating and review system of recruiters for talent selection. All the posted CVs will be sorted based on recruiters' review and rating result.

1.3 STAKEHOLDERS

Sponsor

KR Partners

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- User**
1. Employers: to set an auction for their job openings: allowing recruiters & referrers to bid with their best talent recommendations – receiving a reward upon successful hiring.
 2. Recruiters: can access an unlimited number of job openings through the job auction, monetizing their candidate networks in a secure and transparent way creating a more efficient market.
 3. Job seekers: can secure their personal data and develop digital employment identities enabling the secure exchange of personal information throughout the network.

1.4 DELIVERABLES

Outcomes: Production-ready recruiting platform utilising blockchain to create trust and remove market friction between the recruiter and employer.

Value Statement: Our project aims to seamlessly connect the key actors within the talent sourcing & recruiting industry via blockchain technology and provide an efficient and collaborative talent marketplace.

1.5 SCOPE

Core functions

- Blockchain Module**
 - Ethereum network deployment
 - Configuring blockchain node
- Smart Contract Module**
 - Smart contract generation
 - Smart contract attributes and entities
- Account management module**
 - Login for all the users
 - Profile management
- Job Board Module**
 - Employers post/delete jobs
 - Recruiters/job seekers post CV

Secondary functions

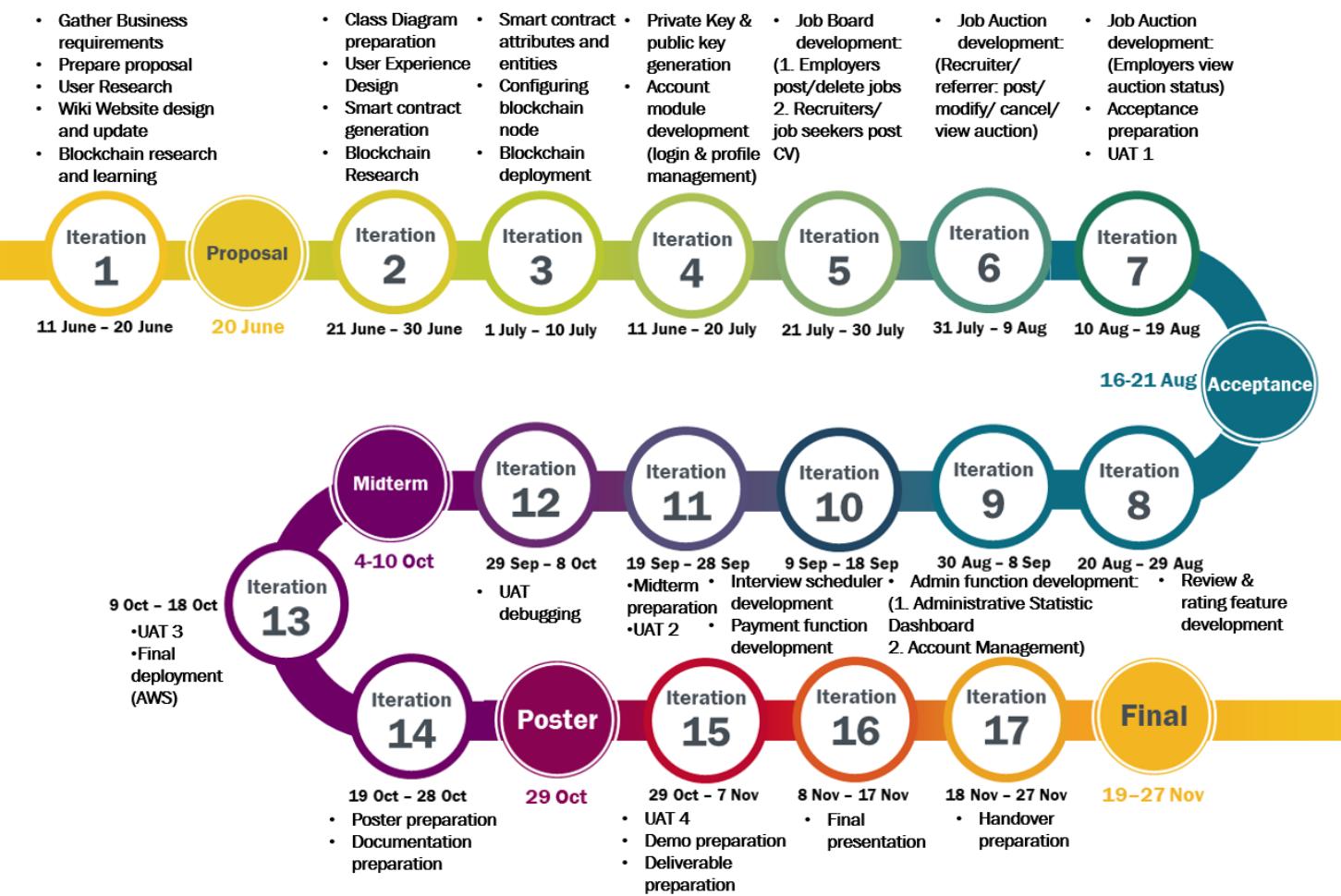
- Job Auction Module**
 - Employers view/update auction status
 - Recruiters post/cancel/view auction
 - Referrers post/cancel/view auction
- Admin Module**
 - Administrative Statistic Dashboard
 - Account Management
- Review & rating system Module**
 - Employers review & rate the recruiter

Tertiary functions

- Payment Module**
 - Payment function for employers/ recruiters/ job seekers
- Interview Scheduler Module**
 - Employers and job seekers make an appointment for interview

PROJECT PLAN

2.1 PROJECT MILESTONE



2.2 RISKS

Category of Risks	Likelihood			
	High	Low	Medium	
Impact	High	B	A	A
	Medium	C	B	A
	Low	C	C	B

Risk Type	Risk Event	Likelihood	Impact	Category	Mitigation
Technical	Blockchain and smart contract are challenging for us as we are not familiar with NodeJS, IPFS, Solidity and ethereum platform.	Medium	Medium	B	Team members will conduct research and share the knowledge learned.
Project Management	Team members have different priorities and schedules in work. Time constraint requires more effort during each coding session.	Low	High	B	Team members will meet with business stakeholders and receive updates and feedbacks.
Client Management	It could be difficult to find interviewees for user experience design and usability testing	Medium	High	A	Team members will constantly review project schedule and the time needed to complete tasks.

2.3 RESOURCE AND REFERENCE

Language/framework: Node.js, java, Solidity, HTML, CSS, Ethereum, Truffle

Database:MySQL

Version control: Github