Team 9

Kai Widman, 2953974
Jonathan Downs, 2927444
Tristan Gant, 2846312
Lucas Brakenridge, 2988068
Javier Barea, 3001667

Project Name: BlockPoll

Project Synopsis: A real-time, public-facing, block-chain solution for casual polling scenarios.

Project Description

Countries and entities nowadays have a lot of corruption and fraud when it comes to polls and elections, mainly because of interests being at conflict and because people want to manipulate their data and keep in power. There's a very new experimental technology called Blockchain, its main use as of now are cryptocurrencies, especifically Bitcoin and Ethereum. The good thing about blockchain technology is that it works a distributed, decentralized ledger system consisting of records being secured by strong cryptography. Because it is decentralized, there is no single point of failure, and because it is distributed, no single entity controls the entire records or the blockchain itself. This makes it ultra secure, as there is a very little and slim chance of records being manipulated or modified. If we translate this to a poll system, it could work very well. We imagine it as some sort of integration of a poll system where people can cast their vote and each person has a unique ID and a single vote.

Given how the blockchain works and its features, this system will be very secure and would be fraud-proof. The main issue with voting is how easy votes can be manipulated and recreated, with a voting system based on the blockchain, votes are easily verifiable as each vote is relatively public (public records) with each ID and vote. This could be a huge opportunity when it comes to countries using these kinds of poll systems.

Project Milestones:

9/27 - Initial project description.

October 2021 - Reach out to Ripple/KU Blockchain Institute/Perry Alexander about funding/support/learning options available through KU donation.

November 2021 - Mock up designs for the products UI.

11/1 - Project proposal

December 2021 - Final implementation plan of the blockchain and the voting system.

February 2022 - Split up work to begin on implementation of blockchain and frontend.

April 2022 - Finish up frontend.

May 2022 - Finish and present project with prototype.

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May
Tristan	Start mockups for UI.	Finish Mockups for proposal.	Finish implementation plan of project.		Implement frontend.	Finish frontend. Start helping on backend.	Finish backend. Start working on final prototype.	Finish and Present
Jonathan	Research opportunities to learn about blockchain.	Add research to proposal.	Finish implementation plan of project.		Implement frontend.	Finish frontend. Start on backend/ middleware.	Finish backend. Start working on final prototype.	Finish and Present
Javier	Reach out to ripple.	Get funding.	Finish implementation plan of project.		Create blockchain.	Create blockchain.	Finish blockchain. Start working on final prototype.	Finish and Present.
Lucas	Reach out to ripple.	Get funding.	Finish implementation plan of project.		Create blockchain.	Create blockchain	Finish blockchain. Start working on final prototype.	Finish and Present
Kai	Research opportunities to learn about blockchain.	Add research options to proposal.	Finish implementation plan of project.		Implement frontend.	Finish frontend. Start on backend/ middleware.	Finish backend. Start working on final prototype.	Finish and Present

Project Budget:
- **No** hardware requirements. We will be using XRPL as a blockchain framework, and this is open source (and thus free). No computing resources will be needed.
- Estimated Cost: $0
- Vendor: None
- Special Training: None
- When they will be required: N/A