Operate and govern blockchain networks in decentralized way

Title	Operate and govern blockchain networks in decentralized way
Status	COMPLETED
Difficulty	MEDIUM

Description

Blockchain is helpful for collaborative applications, however, it is difficult to manage because of the decentralized features. Another challenge is how to efficiently govern a blockchain network among various organizations.

Hyperledger Cello is aiming to resolve the following challenges, 1) Facilitate creation of blockchain network, can help user without blockchain background to setup their network quickly. 2) Security, need to implement mechanism to protect key pairs. 3) Cross organization communication, can connect blockchain networks among multiple organizations. This project targets to design and implement a practical operational system equipping with decentralized functionalities to solve above challenges, based on Hyperledger Cello code base.

Additional Information

Project repo: https://github.com/hyperledger/cello

New governing model:

📃 Unknown macro: 'Iref-gdrive-file'

Learning Objectives

- · Work closely with community experts and developers to learn the open-source culture and skills
- Learn the advanced knowledge inside the blockchain and distributed ledgers
- Practice hand-on experience with system application design and implement

Expected Outcome

Implement the new governing module with Cello.

Relation to Hyperledger

Related to the Hyperledger Cello project.

Education Level

Graduated student preferred.

Skills

- Interested with blockchain (Hyperledger Fabric) and distributed system
- Back end development skills including Python, Node.Js. Experience with Django is a bonus
- Familiar with Cloud, Docker or Kubernetes is a bonus
- Front end skills including javascripts/css/html is a bonus

Future plans

Contribution from this project will be merged to Cello's master branch, the intern student can keep contributing to the Hyperledger community.

Preferred Hours and Length of Internship

Part-time (20 hours a week for 24 weeks starting in summer and ending in winter)

Mentor(s) Names and Contact Info

Baohua Yang, Haitao Yue, Tong Li, Jiahao chen

Mentee

Dixing Xu

Lightening Talk Recording

