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Crowd-Funding Using Blockchain Technology

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ABSTRACT

Crowd funding is an online money-raising strategy that began as a way for the public to donate small amounts of money to help creative people finance their projects. Through crowdfunding, individuals are able to invest in entrepreneurial start-ups through an intermediary, such as a broker-dealer. The problem with the current sites is they don't provide the Donor Guarantee Policy and they don't have control over the money they donated. This paper is to propose crowdfunding using blockchain technology. Through this, we can provide a safe, secure and transparent way for crowdfunding. This work of this paper is to provide interactive forms for campaign creation, donation and request approval through which both campaign creators and donors can easily create and fund the campaigns. The Donor can able to track the money that they were sent. The Blockchain will record all the transaction and store as a block. Crowd funding is not a charity, fees charged, risk of failure etc. Here comes the role of blockchain to nullify the potential risks of the conventional method of fundraising. A decentralized approach to crowd funding allows us to eliminate all the potential risks faced by the conventional approach of crowdfunding

Keywords: Crowdfunding, Blockchain, Campaign, Smart Contracts, Request-Approval, Consensus Segmentation, Digital Wallet.

I. Introduction

The blockchain is an incorruptible digital ledger that records every transaction. It is a distributed system thus all the records are. Stored in every node in the decentralized network. Ethereum allows running applications in the blockchain called Smart Contracts. All the Smart contracts are run on the Ethereum Virtual Machine. Crowdfunding provides an easy way to find cash for innovative Project ideas. The problem with the current crowdfunding companies charging high fees and sometimes there were scams Happened. Implementing a crowdfunding strategy in blockchain will help to avoid these types of problems. By incorporating Peer. To Peer smart contract for crowdfunding remove the traditional transaction fees and platforms fees normally associated with other Crowdfunding platforms, such as Kickstarter.

The objective of our project is to create a reliable application so that every new idea. In the process of raising funds, of course it is not easy, because it requires trust between many parties, both the funders, intermediaries or organizations as a place to store temporary funds to the recipient of funds. That trust is the main capital for fundraising organizations to attract funders to donate their funds to recipients of funds.

II. Related Work

In the field of technology, increasing day by day new information get developed. During few year we heard about blockchain technology.In resent year this technology is in boom. In [1] Blockchain is an emerging technology framework for creating and storing transaction in distributed ledgers with a high degree of security and reliability. In this paper, we present a blockchain-based platform to create and store contracts in between students and their higher education sponsors facilitated by intermediary brokers denoted as fundraisers. The sponsorship might be in any form, such as scholarship, donation, or loan. The fund will be arranged and managed by a group of competitive fundraisers who will hold the distributed ledgers and act as the miners in the blockchain network

They introduced [2] , Crowd funding is an online cash raising technique that started as a path for the people to contribute limited quantity of money to enable innovative individuals to fund the venture. Using crowdfunding, people can put resources into pioneering businesses through a middle medium or platform. The issue with the current crowd funding technique is that, third party medium don't give the assurance of the money investor contributed for the project and 6 The smart contract runs the Auctioning Algorithms and Searches for the The block is added in the blockchain and linked withthe previously existing blocks The block is then verified and approved Wi n Sm Time Pre vi Investor wants to add a new Project in the decentral ized Crowdfu The block is delivered to all the nodes in the developer's network, and they start bidding their values for time, cost, support period and votes to win A block containing the timestamp, Project details, Expected cost, investor don't have control over the cash they contributed. This paper proposes the blockchain based crowd funding by using which the platform can give a private, secure and decentralized path for crowdfunding. The main objective of this paper is to let investors contribute to any project effectively by creating smart contracts through which the contributors can have a control over the invested money and also both the project creators and investors can effectively make and reserve funding for the project. Many development happened in this field of technology.

III. Methodology

The basic architecture of the crowdfunding dapp is depicted in the Figure [1] a basic crowdfunding dapp architecture diagram, concentrating on high-level components. All interactions between a campaign creator (a person arriving in the platform to raise funds) and a campaign investor (a person arriving in the platform to invest) are mediated by the smart contracts written for crowdfunding dapp deployed in blockchain platform. For example if an investor, wantsto invest certain amount of money in a particular campaign that interests him, a transaction is initiated and sent to Blockchain network with additional transaction fees..

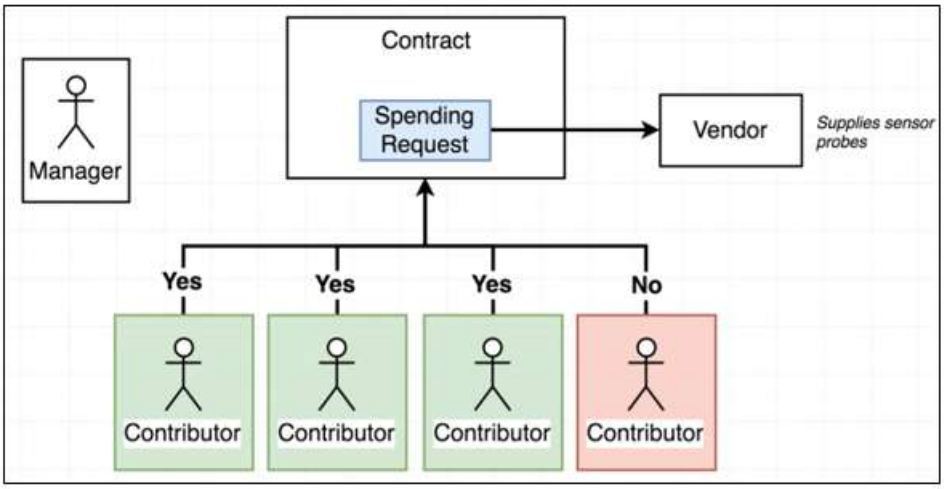

Figure. 2

Fig. 1: A basic crowdfunding dapp architecture.

The user interface is designed in keeping mind the ease for a campaign creator to create a new campaign and an investor to invest in that campaign. The landing page of the application is the root of the user interface as seen in the Figure 2 crowdfunding app user interface design. It is made up of campaign tiles briefing about each campaign that is listedon the platform. User can sort the campaigns based on category each campaign belongs to projects.

IV. Literature survey

In paper [1] This paper contributes to the emerging literature on financial technology by presenting the case of crowdfunding in financial inclusion. The rationale behind this inquiry is to demonstrate the relevance of crowdfunding to financial inclusion, and how might blockchain technology fuel the development of crowdfunding. This paper also constitutes one of the first attempts to analyse crowdfunding in.Thus we believed that this result could apply in periodontology dentistry field in the near future.

In paper [2], to regulators and market participants to understand how the existing regulatory framework applies to blockchain-based crowdfunding. Due to specific characteristics of blockchain-based crowdfunding, regulatory frameworks may require potential re-interpretation of requirements to allow an effective application of regulations. To fill this knowledge gaps, we have reviewed a set of relevant literature on success factors for conventional and blockchain-based crowdfunding. The result of this literature review sheds light on the directions for future research and development. The contribution of our work is a better understanding of the distinctions and similarities of blockchain-based crowdfunding compared to traditional crowdfunding.

In paper [3] work aims at creating an economical, multimodal, personal oral crowdfunding dapp to help new dwveloper in industry or newe startup to over come there problem of funds.Our purpose is to make digital world more advance for every single person using Blockchain technology. Due to our dapp new startup or new project will join, from that our community get bigger and bigger , and we can help each other.

V. Future Scope

The impact of blockchain technology on the crowdfunding landscape is vast, and its potential is truly endless. So, let’s look at the benefits that blockchain implementation could bring to crowdfunding app development. In the future, most technologies around the world are expected to use blockchain as an efficient way to make online transactions. One of the areas that blockchain technologies can be applied is crowdfunding platforms.

The most common problem with current crowdfunding scene in around the world including is that the campaigns are not regulated and some of the crowd-funding campaign turned out to be fraud. Besides, the completion of some projects also was significantly delayed. This project aims to solve these problems by applying Ethereum smart contracts to the crowdfunding site to that the contracts will be fully automatically executed, thus preventing frauds and ensuring that the projects can be delivered within duration given.

VI. Conclusion

Finally, it is concluded that the crowdfunding using blockchain is a relatively new concept to the ICT community. Till now, the solidity code are successfully written for the campaign contract and compiled by using solidity compiler. The output of solidity compiler was bytecode and the interface is deployed into blockchain.

After deploying the project, a decentralized web app is created with a frontend for creating a new project, contributing to a project, creating a new request, approving a request and finalizing a request. At present, the blockchain application in crowdfunding is still in the exploratory stage, where numerous lawful and specialized issues need to be settled.

With the evolution of blockchain, our proposed work have a bright future and a large scope for improvement and evolution. In the future, the proposed research work can progress further in an easier and safer way for all ideas that are achieved through the proposed crowdfunding application.

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