Blockchain transforms real estate transactions to digital

Transforming real estate with Blockchain

The real estate industry is suffering a myriad of challenges including the establishment of trust, the efficiency of data sharing and adequacy of automation processes. There are multiple organizations, agents, e-commerce websites, and various other channels through which people can search a property for buying, leasing, or putting their own property up for sale. The real estate transactions associated with buy, sell, or lease have been long-established, but the advent of technology in the last decade has brought the buyer and seller much closer. With a few technological advancements, these transactions have been made more secure and transparent thereby making investments safer and faster for the stakeholders.

The real estate industry, by its nature, faces lack of trust and transparency in data and record management. The public records for land titles are maintained locally, and the lenders need to contact the relevant local entities for each title assurance process. Hence, the maintenance cost of assets data from a transactional perspective is high. Additionally, it is required to maintain a title and search for public records that contribute to delays and higher costs.

A solution for recording, monitoring, and transferring properties in a secure way can drastically reduce title search, examination time, and costs. If the platform also provides a secure and transparent mode for handling these processes, it can reduce fraud.

Blockchain, which is a decentralized data management and transaction solution, has the potential to address many of the challenges faced by this industry.

About Blockchain

Blockchain is a distributed and decentralized public ledger database that records all transactions and creates the data for every transaction. Multiple new and unique data elements (such as purchaser, seller, purchase date and time, purchase amount, and more) are created for each transaction. This data is bundled as a block and such blocks are chained sequentially using algorithms generated at each

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transaction. No block can be added to the chain if the hashes are not replicated by all the key users in the network. Thus, the integrity of the transactions is maintained. Data or transactions on the Blockchain cannot be manipulated or tampered with as it is spread across the network of users who store and verify each block of information.

Moreover, each user is working from an identical record, so there is no need for reconciliation, reducing costs and accelerating fulfillment, settlement or any other processes that are being governed within the Blockchain.

Use cases – Blockchain adoption in real estate

A   Due diligence of a property

Once the desired property has been found and inspected, the next step in a real estate transaction is the due diligence and background check regarding the property. The key to the title assurance is ensuring that the buyer does not face any challenges with the property in future. The need is to establish, with evidence, that the current owner is indeed the owner. The records should safeguard the seller's rights, especially during a sale, to ensure that the ownership is correctly transferred to the buyer.

Hence, review of financial and legal documents such as ownership proof, title documents, historical data of tenants, and repair activities carried out in the property becomes paramount. Currently, these documents are mostly stored as physical documents, which are sometimes missing, and the verification process is done manually. As a result, this process is prone to human errors and the involvement of various third-party service providers makes it lengthy and cumbersome.

Involving Blockchain technology in the due diligence process will enable the real estate industry to simplify this tedious process. The data regarding any property can be stored as a digital record in a Blockchain-based platform. This digital record of a property can consolidate all the necessary information about a property such as ownership records, title data, tenant profile, and financial and ledger data, thereby eliminating the necessity of third-party service providers. Whenever the owner needs to be identified, the transaction history can be searched, and the person can be identified easily. These digital identities can greatly reduce the inefficiencies and inaccuracies that are currently hampering the background check process of properties.

B Smart contracts and payments for purchase or lease

Due to the sheer number of people (such as landlords, tenants, brokers, property managers, and various vendors) involved in a single real estate transaction, managing the complexity of lease agreements, property operations, and cash flows is a highly challenging task. A number of payments and service transactions have to be documented on a regular basis from the commencement of a lease agreement.

To manage this complex system, a real estate lease can be executed using 'Smart Contracts' based on Blockchain technology. The traditional lease contract along with all its intricacies can be replaced by a transparent and automated smart tenancy contract. Once the lease terms are fed into the smart contract, it will automatically record the payments and service transactions on a regular basis without the need of any human intervention.

Managing the payments and cash flow in a real estate transaction is a complicated subject. The tenant is not only required to make

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payments to the landlord as specified in the lease contract, but also the cash flow is subjected to rigorous investigation by auditors, banks, and other financial institutions. As a result, the real estate companies invest heavily in accounting, compliance, and cash flow management activities.

Like a real estate lease mentioned above, payments and cash flow can also be automated using Blockchain-based smart contracts. The parties involved in a real estate transaction can digitally sign the smart tenancy contract, which includes details of payment terms and frequency among other information. Based on the information fed into the system, the smart tenancy contract can initiate lease payment to the landlord or other vendors in accordance with the contract. At the end of the term of the lease, the same information can trigger the payment of security deposit back to the tenant after adjusting the charges. In this way, the teams (such as auditors, banks, and financial institutions) investigating the payment and cash flow activities can get all the appropriate information from a single incorruptible source through the smart contract.

Blockchain promises to revolutionize the business processes and transform the current landscape of the real estate industry completely. Blockchain is at a nascent stage in the real estate industry. Therefore many of its use cases will likely be determined through continuous experimentation.

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