

DECENTRALISED TRUST ECOSYSTEMS: ADVANCING SUSTAINABLE AGRICULTURE

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Abstract

This article investigates the potential of Decentralized Trust Ecosystems (DTEs) to transform the agricultural sector by leveraging innovative technologies such as blockchain, smart contracts, and tokenisation. DTEs are digital networks that use blockchain technology, smart contracts, and tokenisation to promote trust, transparency, and cooperation among stakeholders. DTEs can enhance transparency and traceability, streamline supply chain management, facilitate secure and efficient transactions, and empower small-scale farmers. Challenges include technological barriers, regulatory and legal considerations, data privacy and security, stakeholder awareness, and cultural issues. Overcoming these obstacles requires building stakeholder awareness and trust, addressing technological barriers, establishing clear governance structures, and developing dispute-resolution mechanisms. By fostering trust and cooperation among stakeholders, these ecosystems can contribute to a more sustainable and resilient future for agriculture. This paper presents a review of the latest developments in natural language processing, with a focus on deep learning techniques.

Key words: blockchain, tokenisation, DTE, traceability, transparency