

# Blockchain Based Secure File Transfer System with Password Protection

Avinash R. Avhad<sup>1</sup>, Pushpak S. Gangad<sup>2</sup>, Shubham M. Kharote<sup>3</sup>,  
Shreyas S. Muntode<sup>4</sup>, Prof. M. D. Sanap<sup>5</sup>

Department of AIML (Artificial Intelligence & Machine Learning)<sup>1,2,3,4,5</sup>

Loknete Gopinathji Munde Institute of Engineering Education & Research (LOGMIEER)s, Nashik, India

**Abstract:** *The need of secure file transfer systems is higher nowadays. In order to enhance the security and privacy of private information transferred over the internet, our paper presents a blockchain-based secure file transfer system (BSFSTS) with password protection. This system takes advantage of the decentralized and immutable properties of blockchain technology to ensure that every file transfer is Safe and Secure, offering verifiable audit trails that can minimize the threats associated with data tampering and unauthorized access.*

*Through forcing people to use strong, unique passwords for decryption as well as encryption, the combination of password protection further secures files by ensuring that only specified people may access the information. In addition to enhancing data confidentiality, this dual-layer strategy increases defences against possible cyberthreats, including phishing and brute force attacks.*

*Research shows that the blockchain-based secure file transfer system with password protection far exceeds standard file transfer techniques in terms of security and user experience. The results illustrate that password protection and blockchain technology work together to build a robust framework for secure file sharing. For companies trying to enhance their data protection plans in the face of changing security threats in the world of technology, this study provides helpful data.*

**Keywords:** Blockchain, Cloud Computing, Data Encryption and Decryption, Tokenisation, Data Security, Password Protection