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Ancile:
Privacy-preserving Framework for Access Control and
Interoperability of Electronic Health Records
Using Blockchain Technology

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Abstract

Despite an increased focus on the security of electronic health records and an effort by large cities around the globe to pursue smart city infrastructure, the private information of patients is subject to data breaches on a regular basis. Previous efforts to combat this have resulted in data being mostly inaccessible to patients. Existing record management systems struggle with balancing data privacy and the need for patients and providers to regularly interact with data. Blockchain technology is an emerging technology that enables data sharing in a decentralized and transactional fashion. Blockchain technology can be leveraged in the healthcare domain to achieve the delicate balance between privacy and accessibility of electronic health records.

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