Special Issue

Blockchains in the Quantum World

Message from the Guest Editor

Blockchains and quantum computing are two innovations which will have a large impact on cryptography and security more generally. However, while blockchains are already making their mark, providing new possibilities for building secure decentralised systems, the impact of quantum computing on cryptography has remained largely theoretical, and many of the implications are negative. What happens at the intersection of the two? How can we define and evaluate the security of blockchains and their applications in a quantum context? Will current blockchain applications remain secure in the face of a quantum adversary? Can we build blockchain applications that are secure against quantum adversaries without paying a severe price in additional space or computing resources? Are there ways that we can harness the power of quantum computing in order to improve blockchains in some way? This Special Issue aims to address these and related questions with high-quality papers that explore the interaction between blockchain, their applications, and quantum computing.

Guest Editor

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Deadline for manuscript submissions

closed (31 December 2022)

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Message from the Editor-in-Chief

Cryptography is a new international journal which provides the state-of-the-art forum for original results in all areas of modern cryptography. *Cryptography* is published in open access format: research articles, reviews and other contents are released on the internet immediately after acceptance. Our journal welcomes submissions written from the theory and practices of modern cryptography, so that it may become a forum for exchange of new scientific developments between the cryptographers and the practitioners.
We would be pleased to welcome you as one of our authors.

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