Special Issue

Development and Application of Data Privacy Protection in Healthcare

Message from the Guest Editors

Implementing advanced data security measures is indispensable in various industries, among which healthcare occupies a major position because it utilizes highly sensitive patient information. With the popularization of smart medical devices, such data is being collected in an exponentially accelerated manner. Protecting this kind of data is important in treatment as well as research contexts. In the former case, trust is secured, allowing an increase in the range of data types patients are willing to provide for efficient treatment. In the latter case, secondary data analysis is facilitated. which allows the furthering of knowledge. There have been significant developments in data privacy protection in healthcare in recent years. 1) Encryption and secure storage. 2) Access control and user authentication. 3) Audit trails and monitoring. 4) Anonymization. Despite these measures, the healthcare system remains an important target for cyber attackers. Faced with such risks, data privacy and security protection have to be adapted to match the improved attacker resources. We welcome high-quality submissions that demonstrate insights on healthcare data protection in this Special Issue.

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As the world of science becomes ever more specialized, researchers may lose themselves in the deep forest of the ever increasing number of subfields being created. This open access journal Applied Sciences has been started to link these subfields, so researchers can cut through the forest and see the surrounding, or quite distant fields and subfields to help develop his/her own research even further with the aid of this multi-dimensional network.

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