# **Special Issue**

# Deep Learning Methods for Healthcare

# Message from the Guest Editor

Different biosignals, namely electrocardiogram (ECG), heart rate variability (HRV), electroencephalogram (EEG), electromyogram (EMG), phonocardiogram (PCG), blood pressure, and speech and photoplethysmogram (PPG), indicate the functioning of particular organs. Various medical images are used to decipher the health of the organ. Many machine learning algorithms have been developed to automatically detect diseases using various feature extraction methods from 1D and 2D signals. Deep learning techniques like convolution neural networks (CNN), long short-term memory (LSTM), autoencoder, deep generative models, and deep belief networks have been applied for big data efficiently. The application of such novel methods to the medical data can aid clinicians in making an accurate and fast diagnosis. Thus, this Special Issue, entitled "Deep Learning Methods for Healthcare", focuses on the application of new deep learning techniques that can be used to improve healthcare using big data.

## **Guest Editor**

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Addressing the environmental and public health challenges requires engagement and collaboration among clinicians and public health researchers.

Scientific discoveries and advances in this research field play a critical role in providing a rational basis for informed decision-making toward control and prevention of human diseases, especially the illnesses that are induced from environmental exposure to health hazards.

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