

Special Issue

Deep Learning in Medical and Biomedical Image Processing

Message from the Guest Editor

Deep learning (DL) has been widely applied to various fields, such as computer vision, natural language processing, speech recognition, and bioinformatics. In particular, DL has shown its great potential and success in medical and biomedical image processing, which aims to analyze and interpret images acquired from different modalities. DL can provide accurate and efficient solutions for various clinical applications. Some common tasks in medical and biomedical image processing are image classification, segmentation, registration, reconstruction, enhancement, and synthesis. DL can handle these tasks using different architectures and techniques. However, challenges and open issues in applying DL to medical and biomedical image processing exist, such as data availability, quality, diversity, model interpretability and explainability, model robustness and generalization, model validation and evaluation, model bias, and ethical aspects. Therefore, more research and collaborations are needed to address these challenges and further advance the DL field in medical and biomedical image processing.

Guest Editor

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