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A Hybrid deep learning model for effective segmentation and classification of lung nodules from CT images

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Abstract

Deep learning algorithms will be used to detect lung nodule anomalies at an earlier stage. The primary goal of this effort is to properly identify lung cancer, which is critical in preserving a person's life. Lung cancer has been a source of concern for people all around the world for decades. Several researchers presented numerous issues and solutions for various stages of a computer-aided system for diagnosing lung cancer in its early stages, as well as information about lung cancer. Computer vision is one of the field of artificial intelligence this is a better way to detect and prevent the lung cancer. This study focuses on the stages involved in detecting lung tumor regions, namely pre-processing, segmentation, and classification models. An adaptive median filter is used in pre-processing to identify the noise. The work's originality seeks to create a simple yet effective model for the rapid identification and U-net architecture based segmentation of lung nodules. This approach focuses on the identification and segmentation of lung cancer by detecting picture normalcy and abnormalities.

References

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