Breast Cancer Cellularity Prediction from H&E Images Challenge

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Abstract— Breast cancer affects about 1 in 8 women in the United States alone [1]. Being able to identify breast cancer in its early stages is of the utmost importance. Deep learning can be used to detect breast cancer from whole slide images of breast cancer hematoxylin and eosin stained pathological slides with high accuracies. This can save human labor and help detect breast cancer in its early stages, preventing it from spreading to neighboring cells. This research paper focuses on applying multiple convolutional neural network (CNNs) models to whole slide images of breast cancer to increase prediction accuracy of cancer cell detection.

Index Terms— Convolutional Neural Network (CNN), Deep Learning, ResNet

I. Introduction

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II. Literature Survey

III. Materials and Methods

IV. Experiments

V. Conclusion

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