Paper Title: Bangla Handwritten Character Recognition using Convolutional Neural Network with Data Augmentation

Paper Link: https://ieeexplore.ieee.org/document/8858545

Summary

1.1 Motivation

The researchers aimed to develop a Bangla handwritten character recognition model.

1.2 Contribution

After building the language model the researchers observed the effect of using Data Augmentation on the dataset. They also compared the model to other Machine Learning methods (such as Linear Support Vector Machine, Long Short Term Memory on the same dataset.

1.3 Methodology

The proposed method was performed using Convolutional Neural Network (CNN). The model that has been used to classify the Bangla handwritten characters was implemented using Keras with Tensorflow as backend.

1.4 Conclusion

The research proves that the CNN method is more efficient compared to other machine learning approaches. The proposed model also performs well on other datasets, which indicates the versatility of the system.

2 Limitations

The proposed method has no scope to detect a sequence of characters. Recognizing a sequence of alphabets or words as a whole, can be considered as future scope, as it requires more complex methods to implement,