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Spoiler Detection Using Machine Learning

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Abstract: Over the course of the lockdown, television shows, web series, and movies have been viewed more than ever before. In order to pick a show or movie to start, we always need to browse through several reviews as it feels like a significant investment of our time, and we want to be sure that they will be genuinely entertaining and gauging. However, these reviews often contain information that reveal things about the plot that a viewer should not know prior to watch the respective show or movie. These bits of information are popularly known as spoilers and they possess the potential of greatly impacting a viewer's experience. These viewers may lose interest and in turn the production companies will to suffer from a loss of revenue. The issue at hand is that we want to read reviews before starting a movie or show, but we do not want to read a spoiler. How can we be sure that a review does not contain a spoiler? We need some warning, and that is why we are attempting to build a machine learning model that uses Natural Language Processing (NLP) to predict whether or not a particular review contains a spoiler, hence, serves as a warning. We will be using an IMDB review dataset to train and test our model.

Keywords: Machine Learning, Neural Network, Deep Learning, LSTM, Natural Language Processing, etc.

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