Enhancing BLEU with Semantic Word Vectors

John Joseph Morgan
University of Maryland
jjm@cs.umd.edu

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Abstract

A machine translation metric is proposed that attacks the pocity of references problem. Semantic word vectors are incorporated into the matching algorithm for the BLEU machine translation evaluation metric. Similarity measures are computed for candidate $n$grams that do not match exactly the $n$grams in the reference. This method enables a candidate $j$gram to receive credit for matching reference $k$grams, where j and k can be different.