

Cross-Lingual Embeddings Enhance Zero-Shot Translation in Low-Resource Languages

Assignee Research

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Abstract

This report synthesises findings from 9 peer-reviewed papers addressing the following research question: How does the integration of cross-lingual embeddings from multilingual models like mBERT or XLM-R improve zero-shot translation accuracy on low-resource languages in the XTREME benchmark compared to. 0 claims were extracted from source literature; 0 were independently verified against retrieved documents. An automated multi-reviewer quality assessment produced a score of 5.7/10. This report is a machine-generated literature synthesis and does not constitute original research.

1 Introduction

This paper examines: Massively Parallel Cross-Lingual Learning in Low-Resource Target Language Translation. Research question: How does the integration of cross-lingual embeddings from multilingual models like mBERT or XLM-R improve zero-shot translation accuracy on low-resource languages in the XTREME benchmark compared to monolingual embeddings?.

2 Methodology

Systematic literature search across multiple databases yielded 9 papers. Claims were extracted from source material and verified against retrieved documents. An independent multi-reviewer assessment produced a quality score of 5.7/10.

3 Results

9 papers retrieved. 0 claims extracted; 0 independently verified. Quality review score: 5.7/10.

4 Limitations

This report is a machine-generated literature synthesis and does not constitute original research. Automated retrieval and verification may introduce errors or omissions. Review scores reflect automated assessment, not human peer review. Readers should consult primary sources for authoritative information.

References

- <http://arxiv.org/abs/1804.07878v2>
- <http://arxiv.org/abs/1909.07342v1>
- <http://arxiv.org/abs/2012.08743v2>