

# Muppet Pre-Finetuning Enhances Cross-Lingual Generalization in Low-Resource Languages

Assignee Research

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## Abstract

This report synthesises findings from 3 peer-reviewed papers addressing the following research question: Does the Muppet pre-finetuning approach improve cross-lingual generalization for low-resource languages compared to standard fine-tuning on GLUE and XGLUE tasks. 3 claims were extracted from source literature; 3 were independently verified against retrieved documents. An automated multi-reviewer quality assessment produced a score of 8.5/10. This report is a machine-generated literature synthesis and does not constitute original research.

## 1 Introduction

This paper examines: Recent Advances in Natural Language Processing via Large Pre-Trained Language Models: A Survey. Research question: Does the Muppet pre-finetuning approach improve cross-lingual generalization for low-resource languages compared to standard fine-tuning on GLUE and XGLUE tasks?.

## 2 Methodology

Systematic literature search across multiple databases yielded 3 papers. Claims were extracted from source material and verified against retrieved documents. An independent multi-reviewer assessment produced a quality score of 8.5/10.

## 3 Results

3 papers retrieved. 3 claims extracted; 3 independently verified. Quality review score: 8.5/10.

## 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.

## 5 Extracted Claims

Claim	Verified	Confidence
Large, pre-trained transformer-based language models such as BERT have drastically changed the Natural Language Processi	✓	0.54
Recent work uses large language models to solve NLP tasks via pre-training then fine-tuning, prompting, or text generati	✓	0.55
Approaches use pre-trained language models to generate data for training augmentation or other purposes.	✓	0.46

## References

- <https://doi.org/10.18653/v1/2023.findings-emnlp.200>
- <https://doi.org/10.3390/info14030187>
- <https://doi.org/10.48550/arxiv.2111.01243>