

Scaling Laws of Model Size and Pass@1 Accuracy on MBPP Pro for Code Models

Assignee Research

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Abstract

This report synthesises findings from 4 peer-reviewed papers addressing the following research question: What is the correlation between model size (parameters) and pass@1 accuracy on MBPP Pro for JaCoText, CodeGen, and CodeT5 when trained on equal Java-Python proportions. 0 claims were extracted from source literature; 0 were independently verified against retrieved documents. An automated multi-reviewer quality assessment produced a score of 5.0/10. This report is a machine-generated literature synthesis and does not constitute original research.

1 Introduction

This paper examines: JaCoText: A Pretrained Model for Java Code-Text Generation. Research question: What is the correlation between model size (parameters) and pass@1 accuracy on MBPP Pro for JaCoText, CodeGen, and CodeT5 when trained on equal Java-Python proportions?.

2 Methodology

Systematic literature search across multiple databases yielded 4 papers. Claims were extracted from source material and verified against retrieved documents. An independent multi-reviewer assessment produced a quality score of 5.0/10.

3 Results

4 papers retrieved. 0 claims extracted; 0 independently verified. Quality review score: 5.0/10.

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/2203.13474v5>
- <http://arxiv.org/abs/2303.12869v1>
- <http://arxiv.org/abs/2202.07612v1>