# Contrastive Transfer with Propagation Structure for Robust Rumor Detection in Adversarial Settings

Assignee Research

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**Abstract**

This report synthesises findings from 9 peer-reviewed papers addressing the following research question: How does the contrastive transfer framework with propagation structure enhance the robustness of CodeT5 against adversarial examples in rumor detection, evaluated using the ROUGE and BLEU scores on. 18 claims were extracted from source literature; 6 were independently verified against retrieved documents. An automated multi-reviewer quality assessment produced a score of 5.2/10. This report is a machine-generated literature synthesis and does not constitute original research.

## 1 Introduction

This paper examines: Towards Real-World Rumor Detection: Anomaly Detection Framework with Graph Supervised Contrastive Learning. Research question: How does the contrastive transfer framework with propagation structure enhance the robustness of CodeT5 against adversarial examples in rumor detection, evaluated using the ROUGE and BLEU scores on synthetic and real-world adversarial datasets?.

## 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 5.2/10.

## 3 Results

9 papers retrieved. 18 claims extracted; 6 independently verified. Quality review score: 5.2/10.

## 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 |
|---|---|---|
| The study constructed two large-scale unlabeled conversation datasets from Weibo and Twitter using a web crawler. | × | 0.10 |
| The study found significant discrepancies between rumor and non-rumor class data on social media platforms. | × | 0.12 |
| AD-GSCL treats large-scale unlabeled data as non-rumor and upgrades existing graph contrastive learning methods to adapt | ✓ | 0.25 |
| AD-GSCL employs supervised contrastive learning to enhance the inter-class representation dissimilarity and intra-class | × | 0.09 |
| AD-GSCL demonstrates superior performance in multiple scenarios, including class-balanced, imbalanced, and few-shot cond | ✓ | 0.16 |
| The study built two large-scale unlabeled conversation datasets to mitigate labeled data scarcity. | × | 0.12 |
| The study analyzed social media's data domain distribution, highlighting significant discrepancies between rumor and non | × | 0.13 |
| AD-GSCL proposes an anomaly detection framework to align with real-world scenarios. | ✓ | 0.22 |
| Experiments demonstrate AD-GSCL's superior performance in multiple scenarios. | × | 0.10 |
| The study constructed two large-scale unlabeled conversation datasets from Weibo and Twitter using a web crawler. | × | 0.10 |
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| AD-GSCL proposes an anomaly detection framework to align with real-world scenarios. | ✓ | 0.22 |
| Experiments demonstrate AD-GSCL's superior | × | 0.10 |

## References


- http://arxiv.org/abs/2204.08143v2
- http://arxiv.org/abs/2508.07205v1
- http://arxiv.org/abs/2304.01492v5