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Transitive and Intransitive Verb Analysis for Idiomatic Expression Understanding: An NLP-based Framework

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Abstract: Idiomatic expressions pose challenges for language learners and require knowledge of their underlying structure, including transitive and intransitive verbs. This paper presents a framework for understanding idiomatic expressions through transitive and intransitive verb analysis using natural language pro- cessing (NLP) techniques. The framework involves identifying the idiom, its transitive and intransitive verbs, analyzing their dependencies, and deter- mining the meaning of the idiom. The proposed framework is designed to be applicable to idiomatic expressions in various languages and genres of text. A case study involving a selection of English idiomatic expressions demonstrated the effectiveness of the framework in accurately identifying the verbs and providing insights into their meaning. The proposed framework has the potential to contribute to language learning, computational linguistics, and natural language processing research.

Keywords: Transitive verbs, Intransitive verbs, Idiom identification, NLP techniques, Dependency parsing

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