
Methods of eliminating homonymy within different, grammatically similar word groups



Sh.S.Sirojiddinov, B.B.Elov, X.I.Axmedova

Issue	E3S Web Conf. Volume 413, 2023 XVI International Scientific and Practical Conference “State and Prospects for the Development of Agribusiness - INTERAGROMASH 2023”
Article Number	03007
Number of page(s)	6
Section	Social and Human Ecology
DOI	https://doi.org/10.1051/e3sconf/202341303007
Published online	11 August 2023

Abstract

The problem of automatic processing of natural language remains relevant for more than half a century. One of the important problems in the field of NLP is the creation of a semantic analyzer, which in turn goes through a number of steps. Determining homonymy is important in the semantic analysis of sentences. A method based on rules, a method based on statistical data, and methods based on machine learning are also used to determine homonymy. Statistical methods are mainly used to determine homonymy between grammatically similar word groups. In this article discusses the use of homonymy between two grammatically similar nouns and adjectives using statistical methods, namely Frequency and Bayesian methods. If bigrams and trigrams are used in the Bayesian method, the characteristics of word groups are classified in the frequentist method, and the parameters that can distinguish them are determined. The identified parameters are converted into numbers as a result of observations and probabilistic decisions are made.

<https://doi.org/10.1051/e3sconf/202341303007>