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Ontology-Based Systemizing of the Science Information Devoted to Waste Utilizing by Methanogenesis

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Abstract: Over the past decades, amount of scientific information has been growing exponentially. It became more complicated to process and systemize this amount of data. The approach to systematization of scientific information on the production of biogas based on the ontological IT platform " T.O.D.O.S." has been developed. It has been proposed to select semantic characteristics of each work for their further introduction into the IT platform " T.O.D.O.S.". An ontological graph with a ranking function for previous scientific research and for a system of selection of microorganisms has been worked out. These systems provide high performance of information management of scientific information.

Keywords: ontology-based analysis, analysis of scientific data, methanogenesis, microorganism hierarchy, 'T.O.D.O.S.'

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