## **ABSTRACT**

The theme: Data Mining of Agriculture as of Element of Food Security in Ukraine.

The Master thesis contains 127 p., 20 fig., 7 tabl., 8 appendixes, 35 references.

The problem of food security first appeared at the end of the last century and since then it has not lost its relevance. Agricultural sector is an extremely important component of food security.

The purpose of the work is to conduct a comprehensive analysis of the state and trends of the agricultural sector in terms of food security through the use and combination of different approaches and methodologies for data mining.

The object of the study is structured and unstructured data of agricultural sector. The subject of the study is models and methods of data mining.

To assess the current situation and trends in agriculture modern tools of text analysis was used. To study and build models to describe the economic situation of the agricultural sector a combination of classical results of mathematical modeling and borrowed and modified marketing tool was used. The system for visualization of Ukrainian regions' typology in terms of sensitivity to investments attraction was developed.

The survey results are reflected in the following publications: «Text Mining Analysis of Agriculture Internet Sources Using SAS Software» - ISDMCI-2016 conference abstracts: «Візуалізація типології регіонів України використанням системи SAS Enterprise Guide 7.1» - GISCTEEM-2016 conference abstracts; «Застосування наївного та дереводоповненого байєсівських класифікаторів для прогнозування кредитоспроможності фізичних осіб» - SAIT-2016 conference abstracts; «Моделювання фінансових ризиків з використанням наївного та доповненого деревом класифікаторів у формі байєсівських мереж» - article, "Research Bulletin of the NTUU "KPI"",

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FOOD SECURITY, AGRICULTURAL SECTOR, DATA MINING, TEXT ANALYSIS, MATHEMATICAL MODELING.