Universidad Politécnica de Madrid

Escuela Técnica Superior de Ingenieros Informáticos

Grado Matemáticas e Informática

Fuzzy Countries

In this project a socioeconomical model of a variety of countries is developed. The model is based on the fuzzy logic theory and it is implemented in Ciao Prolog using the RFuzzy library and Python using Sklearn to compare the results with a real dataset in order to find the credibility of the model. For the visualization of the results, Uflese is used.

Authors: Javier Comyn, Diego Fogued, Francisco J. González
Professor: Susana Muñoz Hernández

Madrid, 2023/2024

Contents

1 Introduction

1.1 Background and motivation for the study

1.2 Research objectives

2 Theorical Framework

2.1 Fuzzy Logic

Fuzzy logic is a form of many-valued logic in which the truth values of variables may be any real number between 0 and 1 both inclusive. It is employed to handle the concept of partial truth, where the truth value may range between completely true and completely false. By contrast, in Boolean logic, the truth values of variables may only be the integer values 0 or 1.

Fuzzy logic has been extended to handle the concept of partial truth, where the truth value may range between completely true and completely false. Furthermore, when linguistic variables are used, these degrees may be managed by specific functions.

3   Methodology

4   Database Design and Development

4.1   Data Collection

4.2   Data Description

4.3   Data Analysis

4.4   Data Preprocessing

5   Implementation of the Fuzzy System

6   Results and Discussion

6.1   Querys

7   Challenges and Solutions

7.1   Identified Difficulties

7.2   Overcoming Difficulties

8   Conclusions and Future Work

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