Abstract

Fuzzy logic plays an important role in the field of medicine. Many diseases are diagnosed using fuzzy logic. Heart disease is the number one killer to the human community throughout the world. This study was conducted to diagnosis the heart disease among the patients. The components of this study are Fuzzification, Generating rules for Advanced Fuzzy Resolution Mechanism and defuzzification. Crisp values are transformed into fuzzy values through the fuzzification. Generating rules for Advanced Fuzzy Resolution Mechanism has five layers, each layer has its own nodes. In layer 1 rule are generated with the data to frame the new rules and output parameter are predicted. The proposed algorithm is tested with Cleveland heart disease dataset. Generating rules for Advanced Fuzzy Resolution Mechanism was developed using MATLAB Fuzzy Logic Tool Box. Transformation of fuzzy set into crisp values is called Defuzzification. The proposed algorithm can work more efficiently to diagnosis heart disease and also compared with earlier method using accuracy as metrics.

References

- Mehdi Fasanghari, Gholam Ali Montazer, "Design and implementation of fuzzy

**Index Terms**

Computer Science

Fuzzy Systems

**Keywords**

Generating rules for Advanced Fuzzy Resolution Mechanism  Rules  fuzzy predicted value

Heart disease