UNIVERSITI TEKNOLOGI MARA
Cawangan Melaka

i-JaMCSIIX 2022

International Jasin Multimedia & Computer Science Invention and Innovation Exhibition

ABSTRACT BOOK

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Zakat Distribution System for Asnaf Selection using Artificial Neural Network Algorithm in UiTM Cawangan Melaka

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***Abstract*—Wakaq, Zakat and Infaq (EL- WAZIF) Unit in Universiti Teknologi MARA Cawangan Melaka practice zakat among the students and staff, where staff face difficulties when distributing zakat aid to students via online. In current processes, the interview and analysis are done manually. Zakat distribution issues remain a debated issue particularly the complex process and slow in making decision of determining entitle Asnaf based on applicants and zakat amount to Asnaf, eventually reflecting high time, cost and staff. A framework named Decision Support System for Zakat Asnaf Selection (DSSZAS) is proposed to discuss the methodology of DSSZAS development. The project used Waterfall Methodology that consists of Requirements Specification, Design and Implementation. Data gathering requires understanding processes of identifying asnaf criteria, applying zakat, interviewing and making decisions and it was documented in Software Requirement Specification. Design of the system involved Artificial Neural Network (ANN) that required knowledge abstracted from the rubric of the interview session and analysing the asnaf criteria selection. Design structures were made in UML modeling technique saved in Software Design Document. Decision Support System is coded with Neural Network trained using supervised learning procedures. Therefore, ANN will be applied in DSSZAS by applying the criteria of Had Kifayah Information and interview Rubric for asnaf criteria selection are also reported. The result obtained is 1.0% accuracy using 200 data. The project can be improved with integrating the university student affair system and student academic system, involving third party transactions and assigning money to students.**

Keywords—Zakat, Artificial Neural Network, Classification