# UNIVERSITI TEKNOLOGI MARA

# SMART CARD FOR CAFÉ PAYMENT USING RFID TECHNOLOGY

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FYP RESEARCH PROPOSAL SUBMITTED IN FULFILMENT OF THE REQUIREMENT FOR BACHELOR OF INFORMATION TECHNOLOGY (HONS.) FACULTY OF COMPUTER AND MATHEMATICAL SCIENCE

**JULY 2020** 

## STUDENT DECLARATION

I certify that this thesis and the project to which it refers is the product of my own work and that any idea or quotation from the work of other people, published or otherwise are fully acknowledged in accordance with the standard referring practices of the discipline.

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JULY 17, 2020

### **ABSTRACT**

RFID is a widespread innovation that provides decisive tangible benefits through both the inherent advantages that support new advancements in ideas and applications of unit verification, wireless connectivity and inexpensive tags. Hence, this technology was implemented for the payment transaction, especially in café or food services-oriented. However, the Smart Card for Café Payment using RFID has never been evaluated formally to identify any usability problems. The objectives of this project are to design and develop the IoT-based 'Smart Card for Café Payment' that can speed up the process of payment in UiTM Café and to test the project using functionality test and user acceptance test that meets the user satisfaction. The project was developed by using Software Development Life Cycle (SDLC) waterfall model. Then, the testing was performed to make sure it can handle required tasks in real-world scenarios, according to specifications for the Smart Card for Café Payment using RFID and involves with 30 participants. The User Acceptance Test (UAT) has been conducted by evaluating the online questionnaire via Google Form which was categorized into four (4) parts includes intention to use, perceived usefulness, perceived ease of use and attitude towards the system. Before the evaluation, the participant will be given a brief explanation about the project by viewing a demo video on YouTube. The result has shown that overall were satisfied with all categories respectively. Therefore, the system using RFID for smart café payment is positively accepted by the users, convenient, economic and reliable method of payment for the café or food services-oriented.

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