

UNIVERSITI TEKNOLOGI MARA

**EXCHANGING EMOTIONS OVER THE
NETWORK USING PHOTO FRAME**

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STUDENT DECLARATION

I certify that this report and the research to which it refers are the product of my own work and that any ideas 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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ABSTRACT

Communication is crucial to connect with others through various medium. It can be divided into three forms which are verbal, non-verbal and written communication. Throughout the years, communication technology has rapidly advanced from communicating face to face and exchanging emotions; which is known as phatic technology to communicate just by a click which is known as haptic technology. Communication technology advances, however, not all people from different age group, especially the elderly know how to operate the advanced medium of communication. Thus, this thesis is about creating a photo frame that is implemented with a sensor that could facilitate the users, especially the elders to communicate with their friends or children by just holding and tilting the photo frame. Meta model approach method is used in this project for the methodology. Message Queuing Telemetry Transport (MQTT) is defined as a lightweight messaging protocol for use in situations where clients need a small footprint of code. It is connected to unreliable networks or networks with restricted resource bandwidth which mainly used in link forms for machine-to-machine (M2M) communication or the Internet of Things and the MQTT used is specifically Mosquitto MQTT. The results obtained shows that the elderly does not have any difficulties using the photo frame as it does not require any complex instructions and they are able to use the photo frame with ease. The conclusion is the elderly learns better if the instructions are not too complex and easy to understand as they tend to be forgetful. There are also several limitations and recommendations that are provided for future study.

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