Smart Robotic Rover Enhancement in Safety Monitoring

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Abstract:
Today in Malaysia, there is no available, affordable and portable liberating unmanned ground vehicle used in rescuing mission. Thus, this study focuses on enhancing a smart unmanned ground vehicle known as robotic rover, to assist the human authorities during the hazardous condition. The present smart robotic rover has three main functions which are proposed to move robotic rover through obstacles surface, detect the leakage of dangerous gases and monitoring for collect information in a hazardous condition. The laboratory tests on this rover was successfully conducted and the results proved the ability of the rover. The rover will secure and safe the rescuer life rather than putting at the hazardous condition. Also, the rover gives a benefit to the endangered location to be secured faster and better. The advantage of this prototype rover is affordable and portable. This rover is simple and easy to handle. Hence, adequate to improve the rescuer skills in handling robotic rover in Malaysia.

Keywords: Robotic; Unmanned Ground Vehicle; Safety & Health; Rover

ACKNOWLEDGEMENT

This project was funded by the Automotive Engineering Centre (AEC), University Malaysia Pahang under grant RDU1903103 and supported by the Medical Engineering & Health Intervention Team (MedEHiT), Faculty of Mechanical & Automotive Engineering Technology, Universiti Malaysia Pahang. The authors of this paper also would like to express their gratitude to Ahmad Ikhwan Hakim Ahmad Rufli, Khairul Rizal Bakri, Yong Pong Yew and Nasruddin Amir for supporting these research activities.