Many studies have reported that excessive work stress causes negative impact to individuals’ mental and physical health. A numbers of researchers have identified that mental immersion therapy help individuals regulate their emotional state, which subsequently remedy their mental and physical health problem. This concept is widely applied in one of the technique known as imaginary therapy. It works by virtually transporting someone to a desired or preferable environment Based on the concept as stated above, we propose to develop an alternative stress treatment by using relaxing, interactive, and immersive 3D environment through virtual reality technology. The proposed technique would complement the imaginary process which is often practiced in a current method of stress treatment. In addition to that, the proposed technique also enables users to be treated in a “real” conscious mode. To improve its effectiveness, multisensory devices such as HMD, tracker, 3D audio system, and joystick are used and these integration allow users to perform their tasks more naturally as in a real world. The outcomes of this project can be summarized into two folds; practical alternative treatment modules and an immersive 3D therapy system. In general, the objective of this research is aimed to help Malaysian workers to remedy their job stress at workplace by using self-controlled and self-monitoring modules in a VR environment.
Improving the Interpretation of Clinical Data in CICU Artificial Intelligence (AI) certainly make a big impact to our lives such in movies, therapist, health care, factory etc. However, AI is still in the very early stages of development in health care in so many ways. It can’t match human intelligence and definitely it can’t replace doctors at the bedside. AI involves complex algorithms that analyse the data. It can be a tools to transform the data from just a raw medical data into a meaning full data that able to aid the doctor with clinically relevant and high quality data in real time. In this presentation, I would like to share about the implementation of an intelligent system that has been designed to improve interpretation of clinical data which will then increase the quality and efficiency of the working environment in CICU. The system has been developed which provides an option to the users to deal with hemodynamic data by just inserting data, and the system will process all the functions including the suggestion on the medicine to be given. This intelligent system has the potential to improve the efficiency, accuracy and timeliness of clinical decision-making in CICU. Many research have been done in this field, where research from Indiana University found that using AI in patient care can improve nearly 50% patient outcomes for the physicians to make decisions. Also, for health care costs decreased from $497 to $187 which more than 50% percent.
The amount of data being collected and stored is vast and growing rapidly. Within the healthcare industries data are being generated through medical devices. The Big Data revolution has taken most industries by storm, and the science of data management and analytics, triggered the need for organizations to convert the resources into information and knowledge that helps them to achieve their objectives. Executives from healthcare agencies believe Big Data will transform health management and patient care. However, many challenges need to be overcome especially in the Malaysia healthcare scenario. talk shall highlight the Big Data challenges in the Malaysian Healthcare Industry and potential solutions for leveraging Big Data for the Healthcare industry.