An application on medical tele- Diagnosis robot (MTR) for real-time motion detection

Abstract

The use of medical robots in healthcare industry especially in rural areas are hitting limelight these days. Development of Medical Tele-diagnosis Robot (MTR) has gain importance to unravel the need of medical emergencies. Nevertheless, challenges for a better visual communication still arises. Thus, a face identification and tracking system for MTR is designed to allow an automated visual which will ease the medical specialist to identify and keep the patient in the best view for visual communication. This paper emphasis on the motion detection module which is the first module of the system. An improved motion detection technique is proposed which suits a real-time application for a dynamic background. Frame differencing method was used to detect the motion of the target. The developed motion detection module succeeded an accuracy of 96% resulting an average of 97% of the whole MTR.