

## **ABSTRACT**

*Each individual has a unique running pattern within normal limits. Unique running pattern can also be turned into an abnormal running pattern because it is affected by injury or caused by certain diseases. Where are forced to run with the abnormal running pattern, it can cause frequent occurrence of injury or even worsen the disease. For that we need a system that can facilitate in researching the running pattern.*

*This running pattern analysis is conducted using a graph generated from the implementation of Kinect that is skeleton tracking, and Visual Basic to design interfaces that make it easier to analyze. The object will be run on the treadmill then obtained parameters such as position changes.*

*The correct pattern is the position of the knee and ankle while swinging in a position perpendicular to the hips. To analyze the phase of gait can be done by analyzing the parameters of the y axis. And to minimize the error rate in the generating system running pattern, Kinect should be perpendicular to the treadmill.*

***Keyword: Kinect, Skeleton Tracking, Pattern Running, Gait, Treadmill***