DEVELOPMENT OF SILAT SCOREBOARD USING LABVIEW

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ABSTRACT

This paper presents the development of Silat Scoreboard for scoring system improvement in Silat Olahraga match. The development is comprises of three stages: parameter setting and profile, signal acquisition and score point indicator. The design includes all the appropriate components and facilities that necessary to function properly. The program is written using G-programming language potentialities of LabVIEW^{TM} version 2011. It is proved that this type of scoring system gives great improvement in terms of flexibility and accuracy.

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CHAPTER 1

INTRODUCTION

1.0   Introduction

The Silat Olahraga is recognized as one of the martial arts that could be contested in Sukan Malaysia (SUKMA). In general, the evaluation for the Silat Olahraga would be knockout. There are three rounds for one match and the winner is the contestants that have win two out of the three rounds [1]. For each round, the contestant will try to gather as much points as possible within the duration of two minutes. Normally, the points are given by four judges based on the contestant's performance. This was done manually in which the scoring is based on the judges' observation at close range.

Other than Silat Olahraga, there exists another type of martial arts tournament that also uses body protector within its match. This martial arts is known as taekwondo. Unlike Silat Olahraga, taekwondo has another head protector in their tournament. Points are given for kicks at both head protector and body protector. The judging system for taekwondo is similar to Silat Olahraga, which is through observation. Points given for permitted, accurate and powerful techniques to the legal scoring areas. However, only three judges and one referee is used within taekwondo. The similarity of these two martial sports is that the scoring system accomplished conventionally by observation.

The problem within the current judging system within Silat Olahraga is mostly due to human error. Even though the human that was chose as the judges are Silat expertise, however, each individual has different perception on how are given to the

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