## Effectiveness of Digital-Based Integrated Exercise And Measurement Technology Apparatus by Wawan S. Suherman, Yudik Prasetyo, Okky Indera Pamungkas, Hari Yuliarto

## **ABSTRACT**

Technology makes it easy for mankind to combine various jobs. One field that can take advantage of the ease of technology is sports, especially exercise. With technology, machines for physical exercise can be combined simultaneously with physical measurement instruments as a result of exercise. This development research aims to combine physical exercise equipment with digital-based physical condition test instruments so that it is called digital-based integrated exercise and measurement technology apparatus.

This research and development uses the Borg & Gall model (1983: 775) with the following steps 1) Research and Information Collecting, 2) Planning, 3) Developing preliminary form of product, 4) Final. Data collection using valid and reliable techniques and instruments. Data was analyzed using quantitative and qualitative analysis techniques tailored to the needs of digital-based tool development. The results of this study are in the form of effective use of Digital-Based Integrated Exercise and Measurement Technology Apparatus multifunctional tools. This research is a quantitative descriptive research. This research will apply multidimensional analysis to assess sportsmen in the ability of sports physical condition. The subjects of this study were 30 Archery athletes. Data collection techniques use tests and measurements. Data analysis using multivariate analysis. Anthropometric data and physical conditions were analyzed using clistary analysis.

Kata Kunci: Effectiveness, integrated exercise and measurement technology apparatus, physical conditioning.