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# Assessment Of Athletic Potential Test Through Fitness Testing: A Review

**Prasenjit Digpati** Research Scholar, Department of Physical Education, Sri Satya Sai University of Technology & Medical Sciences, Sehore, M.P.

**Dr. Minakshi Pathak** Research Guide, Department of Physical Education, Sri Satya Sai University of Technology & Medical Sciences, Sehore, M.P.

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## ABSTRACT:

Athletes must have a solid foundation in a variety of athletic attributes in order to tolerate the gradually increasing training loads and competitive demands of their chosen activity. While physical fitness testing can cause embarrassment and anxiety, strategies can be developed to encourage students to put forth their best effort, provide positive feedback on skill development, and encourage students to set fitness goals that can be met through developmentally appropriate physical activities. The main goal of the study was to find proof that fitness tests can be used to measure athletic potential.

**Keywords:** Assessment, Athletic, Potential, Testing

## INTRODUCTION:

One of the primary recommendations of long-term athlete development models is to strengthen the foundation movements that underpin these athletic qualities early in the athlete's growth trajectory. [1,2] Squatting, lunging, jumping, pushing, pulling, and bracing are all examples of foundation movements. [3-6] Typically, these movements are objectively analysed using some sort of functional movement assessment criteria in order to screen athletes for dysfunctional movement patterns in the hopes of reducing injury risk by correcting bad habits. [7]. Cook's Functional Movement Screen (FMSTM) is by far the most prominent screening technique for providing an objective assessment of movement in sports performance research, and the phrase "functional movement" is often used interchangeably. [8-10] The FMSTM, on the other hand, was created as a screening tool for detecting whether or not someone is fit to exercise. [11] A level of assessment that accounts for sporting demands and movement under load is still needed. To emphasise the importance of an athletic evaluation, a recent survey of high-performance sports performance practitioners indicated that the majority of these professionals chose to use their own version of movement assessment rather than the FMSTM. [12] This shows that the FMSTM technique may not match the perceived needs of high-performance sports practitioners. McKeown claims that there are motions that underpin athletic performance and should be used in evaluating athletes' movement

abilities. [12] Movement evaluation must not only assess dysfunction across a defined set of movements but also identify disparities in performers' ability to execute these movements in order to be effective. The FMSTM's capacity to identify meaningful changes in movement quality over numerous testing sessions, as well as the association between FMSTM scores and sports performance improvement, has been questioned. [9,13,14] The FMSTM was created to evaluate the function of fundamental movement skills in daily life. [7] Sports performance necessitates higher levels of fundamental movement skills in areas like entire body control under increasing load, single leg jumping and landing abilities, and other complicated movement problems. As a result, practitioners employ strategies that they believe are more appropriate for the sports populations they serve. [12] Practitioners may also believe that the FMSTM motions do not fully correspond with their coaching style and hence would not be beneficial in influencing coaching decisions.

### **STRATEGIES FOR SOUND FITNESS TESTING:**

Physical fitness examinations, unlike standardised testing in the classroom (such as arithmetic or reading), can be physically and emotionally taxing. Generally, fatigue tests (such as running to exhaustion [i.e., the PACER (Progressive Aerobic Cardiovascular Endurance Run)] or the flexed-arm hang) and maximum strength tests (such as push-ups or curl-ups) cause some discomfort. These feelings may be particularly unsettling (and perhaps alien) to children who are not routinely active and have not been exposed to physical exertion. Furthermore, when students are assessed in front of others or when they perform alongside their classmates, they are more likely to evoke peer comparison and feel ashamed if they do not appear to perform well. Students' emotions may be affected by results that provide potentially humiliating feedback on variables such as skinfold measurements or height and weight measurements. While this may be true in some cases with classroom-based achievement tests, we believe it is more common in physical education settings. Teachers must therefore administer the test with care and sensitivity and be aware of the potential negative consequences of fitness testing.

The primary goal of this part is to look at how physical fitness testing is described, created, and assessed in schools, as well as its possible impact on pupils, from a psychological standpoint. In the absence of a well-designed and developmentally appropriate PE program, fitness testing should be avoided. Furthermore, fitness testing should not be used unless adequate attention is paid to developing and communicating: (a) clear and measurable objectives that are consistent with national and/or state physical education standards; (b) educational content that establishes the need for fitness testing and its protocol; and (c) essential steps in an educationally and psychologically sound testing protocol. As others have stated, children must fully comprehend and achieve the outcome if they are to fully comprehend and achieve the process (i.e., developmentally appropriate PE). [15-17]

## **STANDARDS:**

Fitness testing that is not integrated into the larger curriculum, as described throughout this article, might result in unmotivated students and negative testing reactions. Children were asked what they "think, feel, and know" about school-based fitness testing (particularly the mile run) more than a decade ago, and the results were "not altogether flattering." The majority of participants couldn't articulate why they were being assessed, came up with smart ways to get out of it, and thought the test was uncomfortable and meaningless. In essence, these findings back up previous (and current) claims that fitness testing fails to accomplish educational goals.

The promotion of enjoyable and regular physical activity participation should be the foundation for fitness assessment, leading to the eventual establishment of life-long physical activity behaviours. This underlying idea should be applied to physical activity and fitness tracking and assessment. The need for increasing student understanding of the role and application of fitness assessment, as well as the appropriate focus on psychological principles that apply to participation in and receiving benefits from physical activity, has been articulated by national and state education bodies (e.g., US Department of Education, National Association for Sport and Physical Education [NASPE], and state Departments of Education). Standards 4 ("Achieves and maintains a health-enhancing level of physical fitness") and Standard 6 ("Values physical exercise for health, enjoyment, challenge, self-expression, and social interaction"), for example, are national physical education standards (NASPE, 2004a). Assessing and maintaining physical fitness, exhibiting understanding of physical fitness, and employing knowledge of psychological ideas, principles, and techniques that apply to learning and performing physical activity are three California physical education standards (CDE, 2006). These guidelines provide credence to the responsible use of fitness testing in public schools [18, 19].

## **NEEDS AND PROTOCOL FOR FITNESS TESTING:**

The place and importance of physical education in schools has been ambiguous for decades, from international comparisons and presidential propaganda in the 1950s and 1960s to the years leading up to the academic and assessment emphases of the No Child Left Behind era (Public Law 107-110, 2002), to the current concern about childhood inactivity. Even now, in an era when the rising prevalence of obesity is well known, school administrators struggle to embrace, fund, and support regularly scheduled and developmentally appropriate physical education in the classroom. We believe that physical activity participation and the physical and psychological benefits of becoming physically fit should be taught to children and adolescents, and that physical fitness testing can be used to help children and adolescents understand where they stand in terms of receiving the most benefits from being fit.

Students' current fitness level (how active you are, how much you move and exercise), genetics (from your parents, whether you are short or tall, or your body type),

maturation (stage of body development as you get older), motivation (do you really want to do this test? ), and effort (how hard do you try?) should all be stressed by teachers. In effect, teachers can advise pupils, "You may be really driven to take the test (motivated), but your body is not as ready (developed) as some of your classmates' bodies." Teachers should stress that while comparing scores to classmates is not always reasonable ("Hey, this apple doesn't taste like an orange"), students SHOULD compare their test results to (a) previous test results and (b) a health standard, such as the Healthy Fitness Zone. "Many researchers believe your body is protected from many of the problems that can develop from being unfit," children can be told if they score in the Healthy Fitness Zone.

The amount of moderate to vigorous physical activity (MVPA) that students engage in on a regular basis is one key aspect that they may influence. Although the quantity of regular MVPA is the subject of another article in this issue (Welk, this issue), it is worth discussing now because of the link between regular MVPA participation and the psychological antecedents and consequences of an educationally sound physical education programme that includes fitness education as one of several important cornerstones.

Physical activity antecedents are crucial to research and apply in terms of adoption, adherence, and noncompliance. Most physical activity promotion models (e.g., Social-Cognitive Theory, Youth Physical Activity Promotion Model, Value-Expectancy Theory) include physical activity correlates or precursors, which include those that can be altered by physical fitness tests. Welk's (1999) Youth Physical Activity Promotion model, in particular, identifies enabling (physical fitness and skills), predisposing (perceptions of competence, enjoyment, attitudes), and reinforcing (parents, teachers, peers) factors that influence whether youth voluntarily engage in physical activities. When teachers use fitness testing correctly, make it fun and enjoyable for students, and give them opportunities to improve, they model behaviour that encourages young people to try new physical activities (e.g., riding bikes, playing tag games, joining a soccer team, shooting baskets) and do them on a regular basis. Many of these teaching behaviours are consistent with a mastery motivational climate, in which children are given ample opportunities to practise a wide range of physical activities (e.g., running, dodging, galloping, dribbling, throwing/catching, kicking, striking) in a safe and controlled environment (e.g., one ball for every child maximises the opportunities to play). As a result, games and activities should reduce wait time (inactivity) and spotlighting (a few students participating while others observe), allowing children to play, progress, and concentrate on their own skill development. Importantly, this is how most students define "fun": participating, playing, and learning and improving. Students who engage in developmentally appropriate physical activity on a daily basis are more likely to do well on physical fitness assessments.

The reduction of negative or the promotion of pleasant, acute or chronic psychological states are examples of desirable psychological outcomes of physical activity. Teachers,

coaches, and parents who are aware of some of these consequences are in a good position to educate students about the psychological benefits of regular MVPA and encourage them to become more aware of these benefits, which include improved mood, self-concept, and self-esteem, as well as stress, anxiety, and depression reduction. Fitness testing outside of the context of regular and developmentally appropriate physical education can lead to negative psychological states, which can lead to disengagement from, nonparticipation in, and/or dislike of regular physical activity [20, 21].

## **CONCLUSION:**

Internal validity refers to the degree to which test results represent the participant's real performance rather than any other external reason or influence. Internal validity in fitness testing may be threatened by a variety of factors, including psychological or motivational elements that influence children's performance, the two most important of which are motivation and effort. Simply put, why would a student desire to do well in standardised fitness tests? What intrinsic or extrinsic benefits are typically provided to motivate students to put forth their best effort? Is it likely that children's ratings represent actual fitness levels in the absence of positive motivation and intentional effort? Increasing the internal validity of fitness testing in children by increasing motivation and effort will improve internal validity and, more crucially, may contribute to students' perceptions of efficacy, enjoyment, and interest in physical activity.

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