

## 62 - AGILITY EVALUATION WITH ADOLESCENTS FROM 13 TO 16 YEARS PRACTICAL IN SPORTS MODALITIES

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### Introduction

According to Castro (2008), fundamental motor skills are constituted and identified based on basic movements and actions, among which we can highlight: walking; jump; run; kick; to receive; rebate; to roll; Fling and bounce. For Neto and Marques (2005), these activities are decisive in the whole process of development and learning of motor skills and physical abilities, on the part of the child, following a progressive quantitative and qualitative improvement.

In order for Physical Education to contribute to the teaching-learning process, one must know the characteristics of the students in their potentialities, limitations and needs in their development. "Providing opportunities for learning and developing fundamental motor skills is of utmost importance for child development." (PAYNE, 2007); (SOUZA, BERLEZE and VALENTINI, 2008).

Opportunity and structured practice are crucial aspects for the acquisition and, mainly, for the refinement of the fundamental motor skills with the objective to reach higher levels of performance of the fundamental motor skills. In addition, Physical Education classes in Elementary School I are unique possibilities for achieving such goals, provided they are organized and taught by professionals in the area.

The child / adolescent upon reaching mature stage within a fundamental motor pattern, few changes occur in the form of that specialized motor skill, refinement of the pattern, and variations of style in form occurs as greater skill (accuracy, precision, and control), But the basic pattern remains unchanged (GALLAHUE; OSMUN, 2005).

The great improvement in performance is based on increasing physical abilities, being observed from year to year, the more the adolescent improves strength, stamina, reaction time, movement speed, coordination and so on, we can expect to observe performance levels every time Best (POWERS; HOWLEY, 2005).

For Dumith; Azevedo Junior; Rombaldi (2008), the teacher has a fundamental role to contribute to the development of the physical aptitude and to create strategies to reach them. Pelegrini et al (2011) see in motor intervention programs the promotion of physical fitness standards, a special need for work aiming at a better motor performance.

Opportunity and structured practice are crucial aspects for the acquisition and, mainly, for the refinement of fundamental motor skills with the aim of achieving higher levels of agility performance. Also, Physical Education classes are unique possibilities for these objectives to be achieved, provided they are organized and taught by professionals in the area.

Despite the coherence and the theoretical indications of these propositions, the empirical evidence and evidence of the professional's role for the development of the students' agility in elementary education still need to be proven (MAIA, 2011).

Motor development can be understood as a process involving emergence, acquisition and improvement of functions and abilities from a biological predetermination present at birth until its adult age (OLIVEIRA, 2016).

### Physical fitness

Physical fitness is the ability to perform a muscular work in a way Pleasure, encompassing strength, muscular endurance, flexibility, body composition and The cardiorespiratory capacity. (BURGOS, et al, 2012).

With the improvement of physical fitness related to health enables children and adolescents to adopt an active life even though it is during or after school years, enabling the maintenance of a physical fitness status from the beginning to the end of life.

However, The human being has become increasingly less dependent on his abilities To survive, since modern times have reduced Of physical predominance. However, Motor performance is the term often used to group the various components of physical fitness related to health (muscle strength, muscular endurance, aerobic endurance, joint flexibility and body composition) and performance (speed of movement, agility, coordination, balance and Together (ARAÚJO; OLIVEIRA, 2008).

Motor performance is associated with the ability to perform motor tasks and their study is based on the product, in terms of: "at what distance?", "At what speed?", "How often?" (Gallahue, 2005). The identification of levels of development and functionality is essential for the development of intervention programs that aim to enhance the development of new skills, remedy already established difficulties and / or develop new strategies of movement (Farias, 2012).

The definition of motor development allows practitioners to identify the factors that make movement limited, enabling decision making on what skill and / or motor criteria to emphasize in the program, practice time for each skill, and performance goals Children (FARIAS, 2012).

### Agility

Coordinating capacities have a great influence on the development of physical capacities, and an individual who has a good development of these coordinating capacities is able to respond more quickly to the position, the displacement, the physical, cognitive and psychic demands that the technique requires. The development of these coordinating capacities is the process of motor learning, since technical training is the ideal combination of coordinating and conditioning capacities such as strength, agility, flexibility, among several others that value and perfect these techniques that will directly and indirectly promote improvements in the individual As a whole (SANTOS, 2015).

Agility is the ability to change the direction of the body, quickly and precisely. With agility, you can make quick and precise changes in body position during movement. Several races have been used as indirect measurements of this ability. Scores obtained from 30 feet, typically targeted as agility measures (GALLAHUE, 2003).

Agility is one of the most important motor performance variables in education Physical, which directly influences

strength, speed, flexibility and coordination, Developing in the student the mastery of the body and the confidence in itself. Being this used in almost all the batteries of tests of physical aptitude. In general sports such as basketball, futsal, tennis and day to day agility plays a key role in the development of these tasks (CORBIN; LINDSEY, 1997).

Agility is a neuromotor variable characterized by the ability to make rapid changes in direction, direction and displacement of the height of the center of gravity of every body or part of it. Sport agility is the response of the individual to being able to execute fast and coordinated movements within technical specificity (BARBANTI, 2003).

#### Methodology

**Test Battery:** Agility (Square Test) Material: A stopwatch, a square designed on non-slip ground with 4m side, 4 cones 50cm high or 4 bottles of 2L PET type coolant. Orientation: The student starts from the standing position, with an advanced foot forward immediately behind the starting line. At the evaluator's signal, you should move to the next cone in a diagonal direction. In the sequence, it runs towards the cone to its left and then moves to the cone diagonally (crosses the square diagonally). Finally, it runs towards the last cone, which corresponds to the starting point. The student should touch with each of the cones that mark the course. The timer shall be triggered by the evaluator at the moment when the evaluator performs the first step by touching the inside of the square with his foot. Two attempts will be made, and the best execution time will be recorded. Annotation: The measure will be recorded in seconds and hundredths of a second (two houses after the comma).

#### Result and Discussion

Table 01 - Descriptive statistics of mean, Standard Deviation and p value of the results obtained in the pre-test and in the post-agility test.

|    | Pre test | Post test |         |
|----|----------|-----------|---------|
| N  | M±DP     | M±DP      | p value |
| 38 | 7±6,18   | 9,04±8,49 | 0,574   |

Thirty-eight adolescents aged 13 to 16 were submitted to the program within 10 months, twice a week with approximately one hour of training in various modalities.

In the comparison of the pretest and post test results, we verified that the activities developed influenced the flexibility of the adolescents, based on the means, but according to  $p = 0.574$ , we verified that the difference was not significant.

#### Final considerations

Today's challenge is to develop physical activity programs that contemplate the overall development of the adolescent, a challenge that accompanies the characteristics and needs of each one.

We developed a periodization where the results showed the efficiency in agility, because we were able to develop or even maintain a standard, but without significant difference when evaluating the results obtained before the intervention with those obtained after.

For this change to occur significantly, we suggest increasing training time and implementing activities related to the object of study, since each modality has its specific characteristics, and according to reality and educational need.

#### ABSTRACT

Performance is based on increasing physical abilities, being observed from year to year, the more the adolescent improves strength, stamina, reaction time, speed of movement, coordination and so on, we can expect to observe better and better levels of performance. Physical Education can contribute to the teaching-learning process, it is necessary to know the characteristics of the students in their potentialities, limitations and needs in their development. "Providing learning opportunities and development of fundamental motor skills is of utmost importance for children's development. The definition of motor development allows professionals to identify the factors that make movement limited, making it possible to decide which skill and / or motor criteria Which should be emphasized in the program, the practice time for each skill and the performance goals of the child. Agility is one of the most important motor performance variables in physical education, which directly influences strength, speed, flexibility and coordination , Developing in the student the mastery of the body and the confidence in itself. Being this used in almost all the batteries of tests of physical aptitude. In general sports such as basketball, futsal, tennis and day to day agility plays a fundamental role in motor development, the methodology was the tests: Agility (Test of Square), were submitted to the program 38 adolescents from 13 to 16 in the period of 10 months, twice a week with approximately one hour of training in several modalities. In the comparison of the pretest and post test results, we verified that the activities developed influenced the flexibility of the adolescents, based on the means, but according to  $p = 0.574$ , we verified that the difference was not significant. The conclusion tells us that we developed a periodization where the results showed the efficiency in the agility, because we were able to develop or even maintain a pattern, but without significant difference in evaluating the results obtained before the intervention with those obtained after.

Key words: Agility, evaluation, adolescent.

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## AGILITY EVALUATION WITH ADOLESCENTS FROM 13 TO 16 YEARS PRACTICAL IN SPORTS MODALITIES ABSTRACT

Performance is based on increasing physical abilities, being observed from year to year, the more the adolescent improves strength, stamina, reaction time, speed of movement, coordination and so on, we can expect to observe better and better levels of performance. Physical Education can contribute to the teaching-learning process, it is necessary to know the characteristics of the students in their potentialities, limitations and needs in their development. "Providing learning opportunities and development of fundamental motor skills is of utmost importance for children's development. The definition of motor development allows professionals to identify the factors that make movement limited, making it possible to decide which skill and / or motor criteria Which should be emphasized in the program, the practice time for each skill and the performance goals of the child. Agility is one of the most important motor performance variables in physical education, which directly influences strength, speed, flexibility and coordination , Developing in the student the mastery of the body and the confidence in itself. Being this used in almost all the batteries of tests of physical aptitude. In general sports such as basketball, futsal, tennis and day to day agility plays a fundamental role in motor development, the methodology was the tests: Agility (Test of Square), were submitted to the program 38 adolescents from 13 to 16 in the period of 10 months, twice a week with approximately one hour of training in several modalities. In the comparison of the pretest and post test results, we verified that the activities developed influenced the flexibility of the adolescents, based on the means, but according to  $p = 0.574$ , we verified that the difference was not significant. The conclusion tells us that we developed a periodization where the results showed the efficiency in the agility, because we were able to develop or even maintain a pattern, but without significant difference in evaluating the results obtained before the intervention with those obtained after.

Key words: Agility, evaluation, adolescent.

## EVALUATION AGILITY AVEC ADOLESCENTS 13 À 16 ANS D'ARRANGEMENTS PRATICIENS SPORTS RÉSUMÉ

La performance est basée sur l'augmentation des capacités physiques, être observé d'année en année, plus l'adolescent améliore la force, l'endurance, le temps de réaction, la vitesse du mouvement, la coordination et ainsi de suite, nous pouvons nous attendre à voir les niveaux de performance de mieux en mieux, de sorte que l'éducation physique peut contribuer au processus d'enseignement-apprentissage, il faut connaître les caractéristiques des élèves dans leurs capacités, les limites et les besoins de leur développement. «Offrir des possibilités d'apprentissage et le développement des habiletés motrices de base est essentielle pour le développement de l'enfant, la définition du développement du moteur permet aux professionnels d'identifier les facteurs qui rendent un mouvement limité, ce qui permet la prise de décision sur ce que les critères de compétence et / ou moteurs qui devrait être souligné dans le programme, le temps de pratique pour chaque compétence et des objectifs de performance, l'agilité de l'enfant est l'une des variables les performances du moteur le plus important dans l'éducation physique, et cela influe directement sur la force, la vitesse, la flexibilité et la coordination , le développement du corps étudiant du domaine et de la confiance elle-même. Ceci étant utilisé dans la quasi-totalité batterie de tests de conditionnement physique. Dans les sports en général et le basket-ball, le futsal, le tennis et l'agilité quotidienne joue un rôle fondamental dans le développement du moteur, la méthodologie a été les tests: Agilité (test carré), ont été soumis au programme 38 adolescents de 13 à 16 dans la période 10 mois, deux fois par semaine sur une durée de formation sous diverses formes. En comparant les résultats du prétest et posttest, nous constatons que les activités ont influencé la flexibilité des adolescents, fondées sur des moyennes, mais selon  $p = 0,574$  constaté que la différence n'a pas été significative. la conclusion nous qui a développé une périodisation où les résultats ont montré l'efficacité dans l'agilité dit, parce que nous pouvons développer ou même maintenir une norme, mais sans différence significative lors de l'évaluation des résultats obtenus avant l'intervention avec ceux obtenus après.

Mots - clés: mobilité, évaluation, adolescent.

## EVALUACIÓN DE LA AGILIDAD CON ADOLESCENTES DE 13 A 16 AÑOS DE RÉGIMEN LOS DEPORTISTAS RESUMEN

El rendimiento se basa en el aumento de las capacidades físicas, observándose de año en año, más que el adolescente aumenta la fuerza, resistencia, tiempo de reacción, velocidad de movimiento, coordinación y así sucesivamente, podemos esperar ver los niveles de rendimiento cada vez mejor, de manera que la educación física puede contribuir al proceso de enseñanza-aprendizaje, es necesario conocer las características de los estudiantes en sus capacidades, limitaciones y necesidades en su desarrollo. "Proporcionar oportunidades de aprendizaje y desarrollo de habilidades motrices básicas es fundamental para el desarrollo del niño, la definición de desarrollo motor permite a los profesionales para identificar los factores que hacen que el movimiento limitado, lo que permite la toma de decisiones en el que los criterios de cualificación y / o motores debe enfatizarse que en el programa, el tiempo de práctica para cada habilidad y objetivos de rendimiento, agilidad del niño es

una de las variables de rendimiento del motor más importante en la educación física, y esto influye directamente en la fuerza, la velocidad, la flexibilidad y la coordinación , el desarrollo del alumnado del dominio y la confianza en sí. Esto se utiliza en casi toda la batería de pruebas de aptitud. En los deportes en general y el baloncesto, fútbol sala, tenis y agilidad todos los días juega un papel fundamental en el desarrollo motor, la metodología de las pruebas era: la agilidad (prueba cuadrado), se sometieron al programa de 38 adolescentes de 13 a 16 en el período 10 meses, dos veces a la semana con alrededor de un tiempo de formación en diversas formas. La comparación de los resultados de la prueba previa y posterior a la prueba, nos encontramos con que las actividades influyeron en la flexibilidad de los adolescentes, con base en los promedios, pero de acuerdo con  $p = 0,574$  encontró que la diferencia no fue significativa. la conclusión de nosotros que desarrolló una periodización donde los resultados mostraron la eficacia en la agilidad dice, porque podemos desarrollar o incluso mantener un estándar, pero con diferencias significativas en la evaluación de los resultados obtenidos antes de la intervención con los obtenidos después.

Palabras - clave: movilidad, evaluación, adolescente.

## AVALIAÇÃO DA AGILIDADE COM ADOLESCENTES DE 13 A 16 ANOS PRATICANTES DE MODALIDADES ESPORTIVAS

### RESUMO

Desempenho é baseada em crescentes habilidades físicas, sendo observadas de ano em ano, quanto mais o adolescente aprimora força, resistência, tempo de reação, velocidade de movimento, coordenação e assim por diante, podemos esperar observar níveis de desempenho cada vez melhores. Para que a Educação Física possa contribuir no processo ensino-aprendizagem, devem-se conhecer as características dos alunos em suas potencialidades, limitações e necessidades no seu desenvolvimento. "Proporcionar oportunidades de aprendizagem e desenvolvimento das habilidades motoras fundamentais é de extrema importância para o desenvolvimento infantil. A definição do desenvolvimento motor permite aos profissionais identificarem os fatores que tornam o movimento limitado, possibilitando a tomada de decisão sobre que habilidade e/ou critérios motores que devem ser enfatizados nos programa, o tempo de prática para cada habilidade e as metas de desempenho da criança. A agilidade é uma das variáveis da performance motora mais importantes na educação física, sendo que esta influencia diretamente na força, velocidade, flexibilidade e coordenação, desenvolvendo no aluno o domínio do corpo e a confiança em si. Sendo esta utilizada em quase todas as baterias de testes de aptidão física. Nos esportes em geral como basquetebol, futsal, tênis e no dia a dia a agilidade exerce papel fundamental no desenvolvimento motor, a metodologia foi o teste: Agilidade (Teste do Quadrado). Foram submetidos ao programa 38 adolescentes de 13 a 16 no período de 10 meses, duas vezes por semana com aproximadamente uma hora de treino em diversas modalidades. Na comparação dos resultados do pré teste e do pós teste, verificamos que as atividades desenvolvidas influenciaram na flexibilidade dos adolescentes, tendo como base as médias, porém de acordo com o  $p = 0,574$  constatamos que a diferença não foi significativa. A conclusão nos diz que desenvolvemos uma periodização onde os resultados mostraram a eficácia na agilidade, pois conseguimos desenvolver ou até mesmo manter um padrão, porém sem diferença significativa ao avaliar os resultados obtidos antes da intervenção com os obtidos após.

Palavra-chave: Agilidade, avaliação, adolescente.