

7 - EFFECTS OF A PROGRAM OF INTERVENTION ON LEVELS OF PHYSICAL ACTIVITY AND LIFESTYLE IN SPECIAL POPULATION.

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INTRODUCTION

Physical inactivity is increasing in an epidemic way, directly reflected in increased rates of morbidity and mortality from chronic degenerative diseases. Surveys of the World Health Organization suggest that physical inactivity alone accounts annually for approximately two million deaths worldwide (1). The population with a disability, particularly with intellectual disability (ID), have low levels of physical activity perhaps because they have been throughout history marked by segregation, social exclusion and invisibility.

The DI defined by disability characterized by significant limitations in intellectual functioning and adaptive behavior (2), has a prevalence of approximately 1% (3), with up to 2% of school age (4). In Brazil, about 1.6% of the population has this condition according to the IBGE (5). Studies show low levels of physical activity in this population when compared with individuals without ID (6), poor adherence to physical activity and not unusually high rates of physical inactivity and related diseases are common (6,7,8).

It is considered as the sum of habitual physical activity of daily activities, occupational, leisure and everyday life and their research has an impact on energy expenditure of man can be modified with ease and, moreover, are related to health parameters as control weight, diabetes, hypertension, among others (10).

The lifestyle, considering the concept as more holistic health, psychological well-being, physical and social (1), has become a determinant of health for individuals or groups. So the lifestyle is composed of positive or negative factors that reflect the information, will, opportunities and barriers from the reality of the subject (10).

Although some studies show that physical exercise can induce positive changes in neuromotor aspects such as cardiorespiratory fitness, muscular strength and overall strength, there is a need to develop and evaluate strategies to improve the lifestyle and physical fitness in this population (12,17).

Thus academic studies, over decades, answered many questions about the fitness of DI (18,19,20), still leave gaps in the influence of pedagogical action proposal, ie the analysis of similarities and contrasts in style these individuals in different teaching strategies and correlation of the inclusion levels of physical activity, fitness and lifestyle.

At least during the last 40 years was observed high prevalence of atherosclerosis, cardiovascular problems, obesity, among other problems in the population with DI (22,24). Research suggests that the reason for this is the delay in physical development, limited motivational levels than sedentary lifestyle (25,26). Similarly there were gains across different types of intervention on physical activity and lifestyle even more severe degrees of impairment of disability (20,21,22,23). Although few national studies in the area which is shown as a reference line with the previous features and the results too (11,23).

The objective was to evaluate the effect of an intervention program on physical activity levels of physical activity and lifestyle of young people and adults with intellectual disabilities.

METHODS AND POPULATION

The sample comprised 70 people of both genders aged between 18 and 35 divided by age and gender. This is an intervention study, conducted over a year about the effect of a program to promote physical activity and lifestyle with a view to social inclusion, assessed by questionnaires and physical tests.

The questionnaire used to assess the lifestyle was the profile of lifestyle. Self-administered instrument that consists of 15 items includes five aspects of lifestyle (nutrition, physical activity, preventive behavior, relationships and stress management) on a 0-3 scale with responses ranging from not at all, sometimes, almost always and true statement. The profile encompasses more positive scores 2 and 3 and more negative scores 0 and 1 (14).

As for the collection of data relating to levels of physical activity we used the international physical activity questionnaire (IPAQ long form 8). This instrument, with good stability and acceptable population for use with young adults and middle age, allows to estimate the amount of physical activity in four contexts (work, transportation, leisure and domestic activities) as a very active, active, insufficiently active (13).

Physical activity was proposed based on the recommendations of the American College of Sports Medicine (ACSM) at least 30 minutes of physical activity on most, preferably all days of the week (15). The activity performed during these 30 minutes were walking and stretching exercises held inside the school at the start of classes Monday through Friday. Acceptance criteria for the study population had mild to moderate intellectual disability, physical disability and had not respect the limit of 25% of absences to stay in the study. To verify the improvement or not the variables we collected based on the initial survey done at the beginning of the academic year 2008 and its comparison to the end of that year, was used in addition to basic statistical analysis of variance (ANOVA) was used to compare groups in the items of fitness and lifestyle, and the difference between the groups means the technique of Scheffé. We calculate the values of "p" between groups and between groups by assessing data pre and post-test ($p < 0.05$).

RESULTS

The classification of levels of habitual physical activity (Table 2) followed the trend of the study. Group 1 of the youngest, showed no difference between himself but .39 when compared with group 2 (29 to 35 years) all levels of physical activity were statistically significant <0.05 . In the comparison between groups showed that group 2 had better responses to intervention.

Tabela1:Data on age and gender groups.

	Total N=70(%)	Group 1(18-28)(%) N= 37	Group 2 (29-35) (%) N=33
age (years) Gender	-	21(18-28)	32(29-35)
Male	28(34.3) 42(65.6)	17(46.8) 19(53.1)	11(34.6) 22(65.3)
Female			

Tabela 2: Classification of habitual physical activity level.

Level of physical activities/ group	Grupo 1 n=37 % Pré e pós	Grupo 2 n=33 % Pré e pós	p
Very active	12(32.4) 14(37.8)	5** (15.1) 8(24.2)	<0,05
Active	17(45.9) 18(48.6)	13** (39.3) 14(42.4)	<0,05
Low active	8(21.6) 5(13.5)	15** (45.4) 11(33.3)	<0,05

The data for the lifestyle it was observed that the groups were similar in the consumption of five servings of fruits and vegetables (.68), intake of fatty foods and 4-5 meals per day (.38 and .47 respectively.) Does not be statistically valid. In the physical activity component was no difference <.05 in the three evaluated items. At first, about 30 minutes of physical activity, excluding activity held in school 50% of group 2 accumulated negative scores while only 10% of group 1 achieved the same score. Unlike this, in item 3, the first group moves less than group 2 with regard to walking and biking for transportation.

DISCUSSION

The regular programs of physical activity for people with intellectual disabilities are being studied more carefully in recent years. However, different studies, which showed that this population does not reach minimum levels of physical activity and, moreover, also has negative components in their lifestyle have not observed this issue in view of intervention in lifestyle and activity levels physics.

In the nutrition component can be observed that food is similar in both groups was filled with a responsible student noted that, in a sense, the negative behaviors are also relevant to parents, and despite some knowledge reported by respondents that was not a positive factor of differentiation in supply.

The study showed that with regard to lifestyle physical activity component that the younger population moves as a way to offset, unless the older ones that does not validate the walk as an effective means of increasing levels of physical activity or obtain certain health benefits, because the walk is reported mild and too short to accumulate 30 minutes or 10 fractionated.

Neurological reasons may explain the difficulty of this population in some aspects of physical fitness when compared with people without disabilities, but it is worth noting that the physiologic changes, because of metabolic adaptations generated during the training process, simply by virtue of offering the Physical activity may be an important parameter to be investigated mainly at this stage of life where I recognize the importance of active behavior (9,10,11,12,16,17).

This study, although a study with a small sample collection materials and overhead, it was shown concern in all parameters. There is a strong trend toward a sedentary lifestyle and lack of information for all pass. There is a central importance in deepening our knowledge in the area because this population, including the entire community and professionals, it is lacking of information and opportunities.

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EFFECTS OF A PROGRAM OF INTERVENTION ON LEVELS OF PHYSICAL ACTIVITY AND LIFESTYLE IN SPECIAL POPULATION.

ABSTRACT:

Physical inactivity is increasing in an epidemic way, directly reflected in increased rates of morbidity and mortality from chronic degenerative diseases. Surveys of the World Health Organization suggest that physical inactivity alone accounts annually for approximately two million deaths worldwide. The population with a disability, particularly with intellectual disability (ID), have low levels of physical activity. Objective: To evaluate the effect of an intervention program on physical activity levels of physical activity and lifestyle of young people and adults with intellectual disabilities. Methods: The sample comprised 70 people of both genders aged between 18 and 35 divided by age and gender. This is an intervention study, conducted over a year about the effect of a program to promote physical activity and lifestyle evaluated by questionnaires and physical tests. Physical activity was proposed based on the recommendations of the American College of Sports Medicine (ACSM) at least 30 minutes of physical activity on most, preferably all days of the week. The activity performed during these 30 minutes were walking and stretching exercises. For analysis of data was used in addition to basic statistical analysis of variance (ANOVA) was used for comparison between groups and the difference between the groups means the technique of Scheffé. We calculate the values of "p" ($p < 0.05$). Results: Group 1, the younger students, no difference between himself but .39 when compared with group 2 (29 to 35 years) all levels of physical activity were statistically significant $<.05$. In the comparison between groups showed that group 2 had better responses to intervention. Conclusion: This study, although a study with a small sample and collection of indirect materials, proved to be troublesome in all parameters. There is a strong trend toward a sedentary lifestyle and lack of information.

KEYWORDS: intellectual disability, physical activity and lifestyle

EFFETS D'UN PROGRAMME D'INTERVENTION SUR LES NIVEAUX DE L'ACTIVITÉ PHYSIQUE ET MODE DE VIE DANS SPECIAUX DE POPULATION.

RÉSUMÉ:

L'inactivité physique augmente de façon épidémique, directement reflétée dans les taux accru de morbidité et de mortalité par maladies chroniques dégénératives. Les enquêtes de l'Organisation mondiale de la santé indiquent que l'inactivité physique représente à lui seul chaque année environ deux millions de décès dans le monde entier. La population ayant un handicap, notamment en déficience intellectuelle (DI), ont un faible niveau d'activité physique. Objectif: évaluer l'effet d'un programme d'intervention sur les niveaux d'activité physique de l'activité physique et mode de vie des jeunes et des adultes ayant une déficience intellectuelle. Méthodes: L'échantillon comprenait 70 personnes des deux sexes âgés de 18 et 35 divisé par âge et par sexe. Il s'agit d'une étude d'intervention, menée pendant un an sur l'effet d'un programme visant à promouvoir l'activité physique et mode de vie évaluée par des questionnaires et des tests physiques. L'activité physique a été proposé sur la base des recommandations de l'American College of Sports Medicine (ACSM) au moins 30 minutes d'activité physique sur la plupart, de préférence tous les jours de la semaine. L'activité réalisée au cours de ces 30 minutes ont été la marche et des exercices d'étirement. Pour l'analyse des données a été utilisé dans plus d'une analyse statistique de base de la variance (ANOVA) a été utilisé pour la comparaison entre les groupes et la différence entre les groupes moyens de la technique de Scheffé. Nous calculons les valeurs de "p" ($p<0.05$). Résultats: Groupe 1, les plus jeunes, pas de différence entre lui-même mais par rapport à 0,39 groupe 2 (29 à 35 ans) tous les niveaux d'activité physique étaient statistiquement significatives $<.05$. Dans la comparaison entre les groupes ont montré que le groupe 2 a de meilleures réponses à l'intervention. Conclusion: Cette étude, bien qu'une étude avec un petit échantillon et la collecte des matières indirectes, s'est avéré être gênant dans tous les paramètres. Il ya une forte tendance à la sédentarité et le manque d'information.

MOTS-CLÉS: déficience intellectuelle, l'activité physique et mode de vie

EFFECTOS DE UN PROGRAMA DE INTERVENCIÓN EN LOS NIVELES DE ACTIVIDAD FÍSICA Y EL ESTILO DE VIDA DE LA POBLACIÓN ESPECIAL.

RESUMEN:

La inactividad física está aumentando de forma epidémica, refleja directamente en el aumento de las tasas de morbilidad y mortalidad por enfermedades crónico-degenerativas. Las encuestas de la Organización Mundial de la Salud sugieren que la inactividad física por sí sola representa anualmente alrededor de dos millones de muertes en todo el mundo. La población con discapacidad, en especial con discapacidad intelectual (DI), tienen bajos niveles de actividad física. Objetivo: evaluar el efecto de un programa de intervención en los niveles de actividad física de la actividad física y estilo de vida de los jóvenes y adultos con discapacidad intelectual. Métodos: La muestra está compuesta por 70 personas de ambos sexos con edades comprendidas entre 18 y 35 años divididos por edad y sexo. Este es un estudio de intervención, llevada a cabo más de un

año sobre el efecto de un programa para promover la actividad física y estilo de vida evaluada por cuestionarios y pruebas físicas. La actividad física se propone sobre la base de las recomendaciones del Colegio Americano de Medicina Deportiva (ACSM) por lo menos 30 minutos de actividad física la mayoría, preferiblemente todos los días de la semana. La actividad realizada durante estos 30 minutos fueron caminar y hacer ejercicios de estiramiento. Para el análisis de los datos se utilizó, además de análisis estadísticos básicos de la varianza (ANOVA) fue utilizada para la comparación entre los grupos y la diferencia entre los grupos mediante la técnica de Scheffé. Calculamos los valores de "p" ($p < 0.05$) Resultados: Grupo 1, los estudiantes más jóvenes, sin diferencia entre sí mismo, sino 0,39, en comparación con el grupo 2 (29 a 35 años) todos los niveles de actividad física fueron estadísticamente significativas <0.05 . En la comparación entre los grupos mostró que el grupo 2 tuvieron una mejor respuesta a la intervención. Conclusión: Este estudio, aunque un estudio con una muestra pequeña y recogida de materiales indirectos, resultó ser un problema en todos los parámetros. Hay una fuerte tendencia hacia el sedentarismo y la falta de información.

PALABRAS CLAVE: discapacidad intelectual, la actividad física y estilo de vida

EFEITOS DE UM PROGRAMA DE INTERVENÇÃO EM NÍVEIS DE ATIVIDADE FÍSICA E ESTILO DE VIDA EM POPULAÇÃO ESPECIAL.

RESUMO:

A inatividade física tem aumentado de maneira epidêmica, refletindo diretamente no aumento dos índices de morbimortalidade das doenças crônicas degenerativas. Levantamentos da Organização Mundial de Saúde apontam que o sedentarismo por si só responde anualmente por aproximadamente dois milhões de mortes por todo o mundo. A população com algum tipo de deficiência, particularmente a com deficiência intelectual (DI), possuem baixos níveis de atividade física. Objetivo: Avaliar o efeito de um programa de intervenção em atividade física em níveis de atividade física e estilo de vida de jovens e adultos com deficiência intelectual. Metodologia: A amostra foi composta por 70 pessoas de ambos os gêneros com idades entre 18 e 35 anos divididos por idade e gênero. Trata-se de um estudo de intervenção, realizado ao longo de um ano, sobre o efeito de um programa de promoção de atividade física e estilo de vida avaliados por meio de questionários e testes físicos. A atividade física proposta foi baseada nas recomendações do Colégio Americano de Medicina Esportiva (ACSM) de pelo menos 30 minutos de atividades físicas na maioria ou, preferencialmente, todos os dias da semana. A atividade desenvolvida durante estes 30 minutos eram a caminhada e exercícios de alongamento. Para análise de dado foi utilizada além da estatística básica a análise de variância (ANOVA) utilizada para a comparação entre os grupos e para a diferença entre as médias dos grupos a técnica de Scheffé. Calculamos os valores de "p" para ($p < 0.05$). Resultados: O grupo 1, dos alunos mais jovens, não apresentou diferença entre ele mesmo .39 mas quando comparado ao grupo 2 (29 a 35 anos) todos os níveis de atividade física foram estatisticamente significativos $<.05$. Na comparação entre os grupos observou-se que o grupo 2 obteve melhores respostas a intervenção. Conclusão: O presente estudo, apesar de ser um estudo com uma pequena amostra e materiais de coleta indiretos, demonstrou-se preocupante em todos os parâmetros avaliados. Observa-se uma tendência forte para o sedentarismo e a carência por informações.

PALAVRAS CHAVE: Deficiência intelectual, atividade física e estilo de vida