THE CAPOEIRA AS PEDAGOGICAL TOOLS TO IMPROVE THE MOTOR COORDINATION FOR PEOPLE WITH SPECIAL NEEDS

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Abstract
The study of individuals with mental disability, particularly those with Down syndrome (DS), aimed to examine the influence of the training of poultry in motor coordination, exploring the aspects of motor skills, drive and overall balance, both used for the battery of tests for Scale Development Motor (EDM) to compare the evolution of the volunteers after the drills. After 10 weeks of intervention we observed significant improvement in some tests, however, sometimes not observed any change thus conclude that further studies are needed to confirm the effectiveness of training with the poultry for this population, the intervention reduced the time and small sample, were our main limiting factors.
Keywords: Motor Coordination - Down Syndrome - Capoeira

Introduction

The Down Syndrome (DS), also known as trisomy 21, is part of the group of non-progressive encephalopathies, i. e., it does not present improvement for the slow development, nor the aggravation of the disease. The encephalopathies are, generally, diseases located in the brain that constitute a set of clinical conditions with a diversity of pathological symptoms, both mental and motor (KAPLAN and SADOK, 1990). The child with DS has a tendency to spontaneous get better, because her central nervous system continues to mature with the passage of time, however, that maturation is slower than that observed in children without the syndrome.

Capoeira because its numerous movements performed in multiple planes and axes becomes an interesting pedagogical tool for training of motor coordination in individuals with DS, favoring with its practice the request of various physical qualities such as agility, dexterity,

coordination, flexibility, among others, therefore improving the stimulation of motor skills. Thus, Capoeira tends to develop in an integrated way the three areas of human learning: motor, social-affective and cognitive (SILVA, 1995).

But ultimately, what is capoeira? It's a fight, a dance, a sport, an art, a body therapy. Is it Popular culture or folklore? Capoeira is music, poetry, party, fun, play and a form of struggle is the manifestation and expression of an oppressed people in search of survival, freedom and dignity (FREITAS, 1997), that appeared in Brazil with the mixture of African cultures that have formed a group here, resisted and recreated it. Among these cultural elements mixed in Brazilian soil comes Capoeira that according to D´Amorim and Atil (2007), came to meet needs like recreation, resistance and survival.

Capoeira is an art with a playful character very present, it becomes an excellent tool to aid those with special needs, because in their day to day experience very few activities have these characteristics, being the basis of their education and development, almost exclusively grounded in concrete experiences, not so boosting training and experimentation with abstract situations.

Thus, this study of patients with Down syndrome (DS) aims to analyze the influence of training in capoeira in the motor coordination of these people, after 10 weeks of intervention. The Capoeira classes were developed with children from 8 to 15 years old, both sexes, where the main motor skills required were the general motor coordination, fine motor coordination and balance.

Down Syndrome

The DS results from a problem located in the chromosomes, and patients with the syndrome are increased by an extra chromosome in pair 21 coupled with the normal pair. Hence the name trisomy 21 (three times the chromosome 21), which is another name for DS. Because there are three 21 chromosomes, instead of two, there are changes affecting the genetic balance and therefore it produces changes in the normal development of the organism (MOREIRA et al., 2000). In 1866 Sir John Langdon Down described one patient where "the child's appearance was such that it was difficult to admit that he was the son of Europeans". The physical features of these children makes them resemble the inhabitants of Mongolia and therefore were wrongly called

Mongolian children, however this term is misleading, and carries a set of prejudices (MOREIRA et al., 2000).

The chromosomal abnormality that causes the DS is approximately one in every 800 or 1000 births (GALLAHUE, 2001). The incidence rate seems to be related to age, experiencing a dramatic increase in mothers older than 45 years of age. In fact, the incidence of Down babies in women at the age of 30 years is about one chance in every 885 births, while women of 49 years have about one chance in every 17 births to give birth to children with DS (GALLAHUE, 2001). One should not conclude, however, that the sole cause of the extra chromosome is the mother, the father contributes with the extra chromosome in 20% to 25% of the cases.

If they are treated early, children with DS tend to improve their features and can have a normal life and independent, we are so sure of it as we are when we say that the prejudices and stigmas of the society cause more harm than the facial features that they carry (ROSADAS, 1989).

Implications for pedagogical practice

The inclusion, as a broad social process, has been happening in the whole world, a fact that has been effecting since the 50's. The inclusion is the change in society as a prerequisite so that the person with disabilities can pursue their development and to exercise the citizenship (CIDADE and FREITAS, 2001).

To enable us to initiate this research aiming to improve the motor skills of students with Down syndrome, it was necessary that we sought the basic knowledge for each student and also that we knew the various aspects of human development in its different spheres, passing by the biological knowledge (physical, sensory, neurological); cognitive; motor; of social interaction and emotional-affective. In the specific case of DS it is necessary to know that people with such condition have associated problems, from which we addressed the principal in Table 01.

Table 01 (Problems associated with DS).

01	Heart Disease	50%
02	Respiratory problems	40%
03	Generalized hypotonia	almost 100%
04	Thermal variation	100%
05	Obesity	> 50%
06	Language problems	almost 100%
07	Mental retardation	100%
08	Atlantoaxial instability	12 a 20%
09	Vision Problems	60%
10	Hearing problems	50%
11	Malformation of the thyroid	4%
12	Dental problems	almost 100%
13	Umbilical hernia	almost 100%
14	Digestive disorders	12%
15	Leukemia	10%
16	Hepatitis (A or B)	70%

Motor and cognitive development

The diversity of biological factors, functions and accomplishments that exist in all human beings are present, also, in children with DS. Mental development and intellectual abilities of these children comprise a large extent between mental retardation and intelligence close to those considered as normal standards (CANNING and PUESCHEL, 2005).

It is known that the physical growth of children with DS is slower, and that according to Pueschel (2005), this variation in growth is determined by genetic, ethnic and nutritional factors; by hormonal function; the presence of additional congenital anomalies; for other health factors and by certain environmental conditions. According to Maia and Boff, (2008), growth and development of children with DS are near to those presented by "normal" children, in relation to overall motor skills. Suggesting that as a child with DS will acquire skills in the area of mobility, these skills seem to be incorporated into her daily repertoire, gaining independence also in this function area (MAIA and BOFF, 2008).

Regarding to developmental milestones, children with DS have

some delays with respect to children without Down syndrome. As previously mentioned, there is huge variability in the period of development performance in children with DS. Several factors may cause this delay, especially, if the environment where the child lives does not provide facilities for early and frequent stimuli.

Below we present some stages of development cited by Pueschel (2005) that illustrate this difference between children with and without the presence of the syndrome. Among these periods of development can be cited: sitting, that in children with Down syndrome takes about nine months while children without DS can in seven, crawling, 13 months in children with DS and 10 months in children without, walking usually children with DS take 20 months while children without DS do it in 13.

It is essential to help the child with DS, from an early age, to develop interests and skills needed to perform a variety of physical and recreational activities, like playing ball, swimming and track movement with rhythms, including here the importance of Capoeira.

In relation to intellectual abilities, as well as other areas of development, in the past were underestimated. Recent reports and investigations conducted by Pueschel (2005), indicate that most children with DS have a performance in the range between mild and moderate, thus contradicting the notion that existed until very recently that children often have severe or deep mental retardation. It is also erroneous the conception that children with DS show a decline in cognitive function with advancing age. According to Gimenez (2005), mentally disabled children, have similar cognitive development, going through the same steps as a normal child, only more slowly.

Motor coordination

The proposed use of Capoeira for training of motor coordination in people with DS was conduct because we believed that Capoeira's pluridiversity can work with the global motor, fine motor skills and balance, in an enjoyable and stimulating manner, because every moment they experience new challenges and the diverse situations in each game and each wheel, this feature is of fundamental importance for the development of various forms of motor skills.

You can define motor coordination, as the ability to integrate into efficient patterns of motion, motor systems with different sensory

modalities. The Coordination binds to components of motor fitness of balance, speed and agility, but it is not closely aligned to the strength and endurance (GALLAHUE, 2001).

Other terms used throughout this study, will be appraised according to the following (MELHEM, 2002).

- Global MOTOR: it is related to various forms of moving the body, standing or on the move, with simultaneous movements of upper and lower limbs. The dynamic body movements play an important role in the improvement of nerve controls and tuning of sensations and perceptions.
- Fine motor: it is the ability to perform coordinated movements using small muscle groups. Examples: to write, to draw, to paint, to cut, to play instruments, etc.
- Balance: it is the ability of an individual to maintain the posture of his body unchanged, even when it is placed in various positions, while he was in one or more bases of support. The balance is divided into:
  - Static balance – it refers to the ability of the body to remain in a certain stationary position.
  - Dynamic balance – it refers to the ability of the individual to remain in the same position, when moving from one point to another.

Other skills are also encouraged with the practice of capoeira, we can cite as an example: the body schema, space, logical reasoning, rhythm, laterality, muscle control, socialization, auditory perception, time, strength, speed.

Played and sung musicalization

According to Maria Montessori, cited by Zausmer (2005), "The hands are the instruments of human intelligence." Thus, we highlight here the importance of musicalization mainly that played for the training of fine motor. However, before we turn to the technical part of the music found in Capoeira, it is necessary to briefly discuss the "why" of music and instruments in capoeira circle.

To follow the exercises and to conceal them at the same time, while the slaves used music, that gave them a unique aspect. The music drives the activity, cause through its rhythm that the players speed up or slow down their movements. Without escaping from history and principles of capoeira, we must redeem it all with a very unique way and in a way that anyone can learn how to sing (FREITAS, 1997). Still regarding musicality, Ravagnani (2008), says that music educa-

tion done by informed professionals and aware of their role, educates and rehabilitates constantly, since it affects the individual in all his aspects: physical, mental, emotional and social.

The musicalization training, especially the one played aiming to improve fine motor coordination. For that, we facilitated contact with instruments such as: tambourine, conga, berimbau and agogô. To develop this skill were initially used alternative tambourines, prepared with tree fern plastic dishes and metal caps.

At the beginning of rhythm activities, we use the tambourine to perform a work of body awareness, playing the tambourine with their feet, sometimes right foot sometimes the left one, with elbows, knees, head, their back, with the belly, etc., thus reinforcing the notion of laterality and body schema, naming the body parts to facilitate the understanding of the movements to be used later in class. Secondly, after the initial contact with alternative instruments, we began to use the official instruments, and the conga as the first instrument to be entered in our classes.

The singing classes were held in order to improve communication between students and also as a way to include them in capoeira circle, however, this bias was not evaluated in our research, being used only to compose the playful atmosphere always present in capoeira.

Playfulness, capoeira and learning

The game has three important roles: psychological, pedagogical and socialized. Psychological function in the game according to Freitas (2003), "The toy provides the basic framework for the needs change and consciousness", this way the child's development is determined by the action in the imaginative level. From the pedagogical point of view, according to Lima (1980), the studies of Piaget were those who contributed to those educators realize the educational importance of the game for the development and their relationships with learning. For Goulart (1987), is through the symbolic game that we reach the concrete proof of child development.

The plays and games have the cognitive domain, motor and social affective. Thus, through them may be a better development in motor coordination, in the visual stimulus, creativity, self-esteem, movement automation, and better time management and space within a movement (FREITAS, 1997).

> The game is a larger category, a metaphor for life, a playful simulation of reality, which manifests itself, which takes effect when people do sport, when they fight, when doing gymnastics, or when children play. (FREIRE and SCAGLIA, 2003).

The child with special educational needs is fully capable of developing, especially when resources are provided to encourage this development, in other words, based on adaptation or modification when necessary. Thinking about it we decided to enter the games and play using the elements of capoeira, so that children could initially make contact with something that resembles the playful universe experienced by them in other situations of play, being sometimes constrained by the influence of the environment where they live.

By understanding that learning and play are interconnected and that together they provide the knowledge, we must create conditions where the toy leads to learn and to act cognitively without impositions.

Freire and Scaglia (2003) indicate the four major functions of games and plays, which are listed below:

- The game helps to remember what was learned: if a newly acquired knowledge is not required for some time, will tend to atrophy as the muscles of a broken arm. However, if we observe children, we notice that, as soon as they gain some new knowledge, some new skill, they immediately begin to repeat it, and do this to exhaustion, showing a plenty pleasure in that attitude.
- The game does maintain what has been learned: since the game's content is not unprecedented, we play with things that we already incorporated, whether motor skills, whether sensations or ideas. This systematic repetition ensures integrity of acquired knowledge.
- The game improves on what was learned: whenever the contents of a game are the things we learned in a given situation, the systematic repetition of the game inevitably enhances the skills acquired and involved in it, because this circularity facilitates the exercise.
- If, during the game, skills can be improved by repetition, it certainly will cause the player to get prepared for new challenges, that is, to assimilate knowledge of higher level.

Aside from the numerous possibilities mentioned above, the plays and games have another great utility, which is to use them for warming up, aiming not only to put them under physiological conditions for the practice of Capoeira, but also to prepare and encourage children

for the main part of the class, leaving a better joint mobility and promoting greater respiratory and cardiovascular activation.

Materials and methods

Type of study

The research was characterized as experimental according to Silva (2001), since intervention techniques were introduced in order to examine whether there would be improvements in the following variables: fine motor, general motor coordination and balance.

Subjects

Six volunteers participated in the survey, four males aged of 11,0±3,2 years old and two females aged 11,5±2,1 years old, group age was 11,2±2,7 years old, all patients with Down syndrome (DS), including a male representative of the DS known as mosaicism[1], the others were having the classical DS, that is, two chromosomes in pair 21. All participants were authorized by their parents and/or guardians to participate in this study as the statement of responsibility signed by them and by the directors of the Associação de Pais e Amigos dos Excepcionais (APAE) from Cuiabá-MT.

Protocols and procedures

We observed before and after the intervention, the following variables: fine motor (MF), global motor (MG) and balance (EQ). For the analysis of the variables mentioned above the Motor Development Scale (EDM) was used as indicated for children with learning difficulties at school; delays in psychomotor development, problems in speech, writing and math, behavior problems (hyperactivity, anxiety, lack of motivation, etc.); neurological, mental and sensory changes, as provided in Rosa Neto (2002) before and after intervention for com-

1-When the error occurs in the distribution of pair 21 chromosome, in the first cell division of the fertilized egg, the baby is born with Down Syndrome. But when the error in chromosome distribution occur in the second cell division some cells of the baby will be normal and others will have trisomy 21. This is called mosaicism cell or mosaic Down syndrome.

parison of results and statistical inference. All tests were performed by the same appraiser for a continued pattern of execution and evaluation. The tests were performed in the following order: fine motor, global motor and balance, individuals who were able to perform the testing protocols described below were considered approved and reproved those who failed to perform such tasks.

The tests comprising the MF variable were:

- To make a node

Material: A pair of shoelaces of 45 cm and a pencil. “Pay attention in what I do”. To make a simple lace on a pencil. “With this shoelace, you will make a node on my finger as i did on pencil”. Any type of node that cannot be undone is acceptable.

- Throwing with a ball

Throwing a ball (6 cm in diameter) in a target 25x25, located on the chest, 1,50 m distance (throwing with the arm bent, hand near the shoulder, feet together). Errors: moving out of the arm in an exaggerated manner; do not attach the elbow to the body during the throw; hit less than two times on three with the dominant hand and one on three with the non - dominant hand. Attempts: three for each hand.

- To grab a ball

To grab a ball with one hand (6 cm diameter), threw from 3 meters distance. The child should keep the arm relaxed alongside the body until they say “grab it”. After 30 seconds of rest, the same exercise should be done with the other hand. Errors: To grab less than three times over Five with the dominant hand; less than twice over Five with the non - dominant. Attempts: five for each hand.

The battery tests of MG were comprised by:

- To jump at 20 cm height

With feet together, jump without impulse from a height of 20 cm. Material: two media with a rubber band attached at the ends of them at a height of 20 cm. Errors: touching the rubber band; to fall (despite not touching the rubber band); to touch the floor with hands. Attempts: three, two of which are positive.

- To walk in straight line

With eyes open, walk 2 meters in straight line, alternately placing the heel of one foot against the tip of the other. Errors: depart from the line; to swing; to put a foot away from the other; perform the procedure incorrectly. Attempts: three.

- Lame foot

With eyes open, to jump over a distance of 5 meters with the left leg,

the right leg bent at right angles to the knee, arms relaxed along the body. After a rest of 30 seconds, the same exercise should be done with the other leg. Errors: take a distance of more than 50 cm from the line; touch the floor with the other leg; swing your arms. Attempts: two for each leg. Time: undetermined.

- Jump on the air

To jump on the air, you need to bend your knees to touch your heels with your hands. Errors: Do not touch your heels. Attempts: three.

- Lame foot with a matchbox

The knee should be bent at right angles, and arms relaxed along the body. From 25 cm foot resting on the floor a matchbox is placed. The child must take it propelling it her foot to the point placed at 5 meters. Errors: to touch the floor (even once) with the other foot; to exaggerate the movement with the arms; to trespass with the box in more than 50 cm the fixed point; to fail moving with the box. Attempts: three.

The tests for the EQ item were:

- Balancing on tiptoe

To sustain on tiptoe, with eyes open and arms along the body, with feet and legs together. Duration: 10 seconds. Attempts: three.

- Static Lame Foot

With eyes open, to sustain on the right leg, while the other remains bent at a right angle, with thigh parallel to the right and slightly in abduction with arms along the body. To rest for 30 seconds and do the same exercise with the other leg. Errors: to lower more than three times the raised leg; to touch with the other foot on the floor; to jump; to sustain on tiptoe; to swing. Duration: 10 seconds. Attempts: three.

- To make the figure of the number four with the legs

To sustain on the left feet with the right foot resting on the inner surface of the left knee, with hands fixed on the thighs and with eyes open. After a rest of 30 seconds, perform the same exercise with the other leg. Errors: drop a leg; losing balance; rise on tiptoes. Duration: 15 seconds. Attempts: two for each leg.

Classes were performed over 10 weeks, with weekly frequency of three days in the afternoon, being held on Mondays, Wednesdays and Fridays, with duration of 50 minutes each lesson, 10 minutes for stretching/heating, 30 minutes for the main part and 10 minutes for the return to calm. For specific training of MG, we used some of the basics of Capoeira, such as swing, cocorinha, negative closed, blessing, aú, armada, queixada, half-moon front, half moon of compass and basic descent. Regarding the training of MF, we prioritized to the music

played, using the instruments tambourine, conga, and finally the berimbau due to its greater complexity of manipulation. The balance did not receive specific training, being only observed their performance through the practice of MG.

This study sought to stimulate further and not only the practice of capoeira. To this end we attempted to focus on three dimensions of content according to Darido (2005), addressing the conceptual dimension (through videos, magazines and pictures about capoeira), the procedural dimension (through the practical experiences of capoeira) and finally the attitudinal dimension (this dimension emphasizing the need to respect the physical integrity of colleagues).

Results and discussion

We observe in Table 01 results for fine motor tests. In making a node test, all individuals showed proficiency in that test, reaching 100% of approval. This is due, perhaps, the fact that all have experienced similar situations everyday; for example, tie the laces of his sneakers. Zausmer (2005) reports that in children with DS, the development of global motor skills may be impaired due to the weakness presented by them and, thus, having better fine motor. Thus it is expected that in cases where there is not the need for major muscle groups, such as making a knot, a child with DS can present fine motor patterns skills superior to the more rustic skills.

The fact mentioned earlier can be seen when we analyze the test throwing with a ball, where it became clear that the lowest muscle capacity of children with DS affects the proficient standard of throwing a ball, because for one to perform a certain task, there is a need for earlier neuromuscular maturation, besides the obvious environmental factor, cause in their day to day children who were surveyed did not perform similar tasks. Also in relation to fine motor skills, we can analyze the existence of an equilibrium when we observe the test grabbing a ball, this balance was due to the characteristic of the test, because three attempts were held for each hand, thus, there was a balance between successful receptions by the dominant hand along with the failure of the grab when done by non-dominant hand, thus proving, once again the need to invest in both the early stimulation, as a continuation of the tasks, mainly with the participation of qualified professionals for this.

Table 02 – fine motor tests

FINE MOTOR	PREVALENCE	
To make a node	**n**	**%**
Approved	6	100
Disapproved	0	0
Throw with a ball	**n**	**%**
Approved	1	16,67
Disapproved	5	83,33
To grab a ball	**n**	**%**
Approved	2	33,33
Disapproved	2	33,33
Medium	2	33,33

After 10 weeks of intervention it appears that some changes in motor behavior of children in relation to fine motor, but in some tests modifications were not found and those that were improved, was appreciably (Table 02). However, we observed that such changes came to contribute to a more autonomous lifestyle of the evaluated group. The lack of a better result with the trainings were possibly due to the short time of intervention, especially when dealing with children with DS, because they have a different time in relation to learning and development as previously mentioned in this study. In relation to poor performance on fine motor activities, CASTRO (2005), shows that the main belated motor events include the standing posture, to walk, to throw, to reach, to grasp and to manipulate, just those who got the worst performances.

Table 03 – Fine motor post-tests

FINE MOTOR	PREVALENCE	
To make a node	**n**	**%**
Approved	6	100
Disapproved	0	0
Throw with a ball	**n**	**%**
Approved	1	16,67
Disapproved	5	83,33
To grab a ball	**n**	**%**
Approved	5	83,33
Disapproved	0	0
Medium	1	16,67

The results presented in the tests shown in table 03 were similar to those reported in the literature about the lack of muscle strength shown by patients with DS, for presenting very comprehensive muscle hypotonia. According to CASTRO (2005), children with DS, have short arms, no plantar arch, wide space between the joints – which gives a hiperextensible characteristic, but unstable in posture and join amplitude –, distended and hypo tonic abdomen. Based on previous statements, and as identified in tests of jump of 20 cm height, lame walk, jump on the air and lame foot with matchbox, we found that such musculoskeletal changes are crucial for maintaining the motor gesture more proficient, especially in activities where more than one valence motor is required as the previously cited tests that require strength and balance in equivalent doses.

In the walk straight test, there was more approval of the analyzed individuals (Table 03), perhaps because it is a commonplace activity for everybody, only being hampered by the need to maintain balance on the line marked on the ground.

Table 04 – Global MOTOR tests

GLOBAL MOTOR	PREVALENCE	
To jump at 20 cm height	**n**	**%**
Approved	2	33,33
Disapproved	4	66,67
Walking straight	**n**	**%**
Approved	4	66,67
Disapproved	2	33,33
Lame foot	**n**	**%**
Approved	2	33,33
Disapproved	4	66,67
Jump on the air	**n**	**%**
Approved	0	0
Disapproved	6	100
Lame foot with matchbox	**n**	**%**
Approved	0	0
Disapproved	6	100

Analyzing post-test data for the global motor function (Table 04), we found that activities that require the loss of contact with the ground in a sense are the worst, This much is true that in the two tests where the lack of contact with the ground by the lower limbs did not find any modification, a fact confirmed in our training, where the greatest difficulty was in relation to the achievement of "AÚ" (little star). However, we could observe a significant improvement of walking in a straight line, where in the post-test we obtained 100% yield, besides improvement in the motor pattern of gait.

In the lame walk test, we also managed to get improvements in motor behavior of children, perhaps by the test characteristic, which did not require prolonged loss of contact of the feet with the ground.

Table 05 – Global MOTOR Post-tests

GLOBAL MOTOR	PREVALENCE	
To jump at 20 cm height	**n**	**%**
Approved	2	33,33
Disapproved	4	66,67
Walking straight	**n**	**%**
Approved	6	100
Disapproved	0	0
Lame foot	**n**	**%**
Approved	5	83,33
Disapproved	1	16,67
Jump on the air	**n**	**%**
Approved	0	0
Disapproved	6	100
Lame foot with matchbox	**n**	**%**
Approved	0	0
Disapproved	6	100

The last valence to be observed was the static balance, being this one of the most frequent problems in patients with DS when it comes to motor gestures, because besides the changes already osteo muscle skeletal discussed previously, children with DS according GIMENEZ and MANOEL (2005), show weakness related to balance, since they have immaturity of the cerebellum and of the vestibular apparatus, both extremely important in maintaining of the balance and of the static posture. Apart from proprioceptors (muscle spindle, Pacinian corpuscle and Golgi tendon organ), that allied to the cerebellum and vestibular system, provide to the central nervous system proficient balance conditions, both static and dynamic.

Regarding the balance tests applied, we note that the weakness that we formerly quoted coincides with the test results (Table 05), especially when the test requested the withdrawal of one foot of the ground, thereby reducing the support base and increasing instability and hence the imbalance.

Table 06 – Balance tests

BALANCE	PREVALENCE	
Tiptoe Balance	**n**	**%**
Approved	2	33,33
Disapproved	4	66,67
Static lame foot	**n**	**%**
Approved	1	16,67
Disapproved	5	83,33
To make a four	**n**	**%**
Approved	0	0
Disapproved	6	100

After the intervention we achieved satisfactory results (Table 06), despite the short training time, and noticed a better performance in the test with certain specificity with the training of Capoeira, although we did not stay on tiptoes constantly, but at some times of transition in certain strokes and in the very swing.

Table 07 – Balance Post-tests

BALANCE	PREVALENCE	
Tiptoe Balance	**n**	**%**
Approved	6	100
Disapproved	0	0
Static lame foot	**n**	**%**
Approved	4	66,67
Disapproved	2	33,33
To make a four	**n**	**%**
Approved	0	0
Disapproved	6	100

Conclusion

It can be concluded that Capoeira has the necessary tools for the proper improvement of motor skills investigated in this study, thus, reinforces the use of Capoeira as an educational tool for people with special needs. However, we emphasize the need for further studies to determine the best duration, intensity and frequency of training.

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