

higher chances of showing delays on the psychomotor development. Prematurity may be associated with antenatal external factors, such as socioeconomic conditions and low education level and the postnatal variables, such as the birth weight and growth percentile. The Test of Infant Motor Performance (TIMP), it is a clinical tool highly sensitive to small changes in motor performance. As much sooner as changes are detected on motor milestones, sooner the intervention will occur.

Objectives: Analysis on the motor development profile in PTNs.

Methods: Cross-sectional study. performed in a joint accommodation (JA) in a public hospital in Brazil. It included the neonates (NT) with gestational age (GA) higher than 34 and stable, excluding NTs with genetic syndromes, congenital malformations, osteomyo-articular disorders, sensory impairments, and neurological disorders. The tool used was the TIMP scale, the child was filmed and evaluated by a blind researcher who has scored and categorized the groups with or without changes in the motor performance. In the data analysis we used the Minitab® 14 statistical package, the statistical significance was considered as $p < 0.05$. For the comparison between the groups, we used the unpaired t test or the Mann Whitney depending on the data distribution.

Results: The sample of the study was composed of 8 neonates' terms and 6 preterm neonates. Regarding the characterization of the sample, the maternal age of the group of PTN was 26.4 ± 6 and the group of NNT 25.1 ± 6.7 , the inferior social class was 100% and 75%, appointment number of antenatal 6.2 ± 1.3 e 7.2 ± 3.2 . Considering the head circumference the PTNs presented 28.7 ± 2.6 and the NNTs 39.2 ± 2.1 , chest circumference 27.5 ± 1.2 and 33.8 ± 1.9 , the GA 33.2 ± 2.2 and 39.7 ± 1.3 , birth weight 1707 ± 258 and 3275 ± 388 , and height 37 ± 7.7 e 49.2 ± 2.6 respectively. The data related to the brute score from TIMP have shown that the PTNs had the score lower (42.1 ± 2.4) to the NNT (48.5 ± 5.7), $p = 0.01$.

Conclusion: This current research shows that there is a statistically significant difference in the motor performance on preterm neonates in the hospital environment. Thus, showing that the early detection enables the implementation of sensorimotor intervention programs performed by a child physiotherapist.

Implications: Premature infants presenting motor decline in the first months of life, presents commitment to learning and social interaction, pointing to the relevance of having a professional physiotherapist on JA and the role of early intervention guiding the parents and reducing the consequences of prematurity.

Keywords: Prematurity, Child Development, Psychomotor Development

Conflict of interest: The authors declare no conflict of interest.

Acknowledgment: Not applicable.

Ethics committee approval: Comitê de Ética em Pesquisa da Universidade Federal de Santa Catarina, protocolo n° 08989819.2.0000.0121.

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DEVELOPMENT OF A PROTOCOL WITH BEHAVIORAL STRATEGIES TO INCREASE ADHERENCE TO THE PRACTICE OF SELF-ADMINISTERED HOME EXERCISES IN POST-STROKE INDIVIDUALS

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Background: Home rehabilitation in post-stroke patients seems to be more beneficial than hospital or outpatient treatment, as it allows the repeated practice of tasks incorporated in the person's own environment. However, patient adherence to treatment is a crucial determinant of rehabilitation.

Objective: This study aims to develop a clinical trial protocol for the feasibility of a group task-oriented therapy (TOT) program in post-stroke patients, which uses behavioral strategies based on the Theory of Self-Determination to increase adherence to guidance from patients' home exercises.

Methods: Initially, a protocol development study will be carried out, without a control group, with pre and post intervention evaluations that will last for 6 weeks. Participants will be 20 individuals diagnosed with stroke who will be submitted to a group TOT program twice a week, lasting 1 hour and to a self-administered home exercise program. Behavioral strategies will be applied during the TOT and the results will be compared with the pre-intervention assessments. The exercises will be organized in the form of four tasks, targeting specific movement components that must be performed for a certain number of repetitions defined individually. The primary outcome measure is adherence to the exercise program and will be assessed using the Exercise Adherence Assessment Scale (EARS-Br); adherence to formal guidance on the home exercise program (self-monitoring diary) and motivational regulations, self-determination and basic psychological needs assessed using the Exercise Behavioral Regulation Questionnaire (BREQ-3) and the Basic Psychological Needs on Exercise scale (BPNES). The feasibility of the methods and protocol performance aiming at a future large-scale randomized controlled clinical trial (RCT) will be explored using predefined feasibility criteria. Feasibility criteria include (1) a minimum 75% adherence rate to home exercise (self-monitoring diary), (2) a minimum 10% change in the Exercise Adherence Rating Scale (EARS-Br) from control week, without behavioral strategies; (3) at least a 10% change in behavior between pre- and post-intervention (assessed using the BREQ-3); (4) a 10% change with the protocol in basic psychological needs assessed using the BPNES pre- and post-intervention.

Results: This protocol may contribute to increase adherence to home exercises in post-stroke patients and help in the change of patients' behavior. The characterization of the sample will be presented through descriptive analysis; the frequency of the practice of household chores, through means and standard deviation and adherence rate to the number of prescribed repetitions (%).

Conclusion and Implications: results will allow us to define the protocol and identify the preliminary viability in increasing adherence to the practice of self-administered home exercises, changing behavior and changing basic psychological needs.

Keywords: Stroke, Adherence, Behavior change, Self-Determination Theory

Conflict of interest: The authors declare no conflict of interest.

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