AB021. Relationship between language development and birth conditions of children born premature

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Abstract: Delay in language acquisition is one of the disorders in premature children described in literature. The effects of prematurity, in association with such birth conditions as weight, may be considered a risk factor for the development of children's language. This study aimed to relate weight, gestational age, and length of hospital stay with the language development of children born premature. Methods: Participants were 28 parents and their children aged 0 to 24 months corrected, with diagnosis of prematurity who were born with weight below 1,500 g and/or gestational age below 33 weeks. The children were evaluated in the post-discharge routine of the same hospital of birth, through the Initial Acquisition Scale of Speech and Language. The protocol, used as a screening instrument for children aged 0 to 36 months, is divided into three categories: auditory-expressive, auditory-receptive, and visual. The evaluation data were related to the variables of weight at birth, gestational age, and length of hospital stay. Findings: The children had, on average, 4.93 months of corrected age (SD =4.30). They presented, on average, a birth weight of 1427 g (SD =551.24), gestational age of 30.93 weeks (SD =2.4), and length of hospital stay of 50.96 days (SD =23.3). More than half of the children achieved the expected performance for age in the auditory-expressive (64.1%) and visual (60%) categories. Half of them presented the same result for auditory-receptive (50%) and overall performance (57.1%). We observed a positive correlation between birth weight and the auditory-expressive category (c=0.462, P=0.013) and overall performance (c=0.378, P=0.047): a higher weight related to better scores in the categories. Meanwhile, a longer hospitalization time related, albeit weakly, to worse test performance. Conclusion: Half of the children showed the expected performance at the corrected age. The weight variable was an intervening birth condition in the language acquisition of preterm infants.

Keywords: Language; preterm children; birth conditions