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Neurodegenerative constraints in stimulus-driven eye movements

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Abstract

Eye tracking is a promising and non-invasive method for assessing cognitive processes in neurodegeneration. Our study focuses on the use of stimulus-driven eye tracking as a tool for discovering neurodegenerative conditions. In this study, we examine perceptual organisation (grouping, segmentation), and accentuation (Pinna & Sirigu, 2011) in neurologically impaired and healthy individuals. Based on a preliminary analysis, there are differences in the average number of fixations between clinical and control groups. Additionally, there are variations in the scanned area within specific sets of stimuli between the control and clinical groups. By identifying these differences, our study contributes to a deeper understanding of the mid-level perceptual processes in neurodegeneration.