Dyslexia as a Learning Disability of Students with Difficulties in Reading

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Abstract: Dyslexia is a learning disability that interferes with a person’s ability to read, thus hindering one’s educational goals (Lewis, 1998). The number of dyslexic learners in the Philippines has increased dramatically over the last years and only a few were able to acquire education up to the secondary level or even graduate from college (DepEd-Phil, 2012). Education plays an important role in society. It is one of the significant factors in the development of children, communities, and countries. One support service that has attracted considerable attention to help dyslexic learners in their reading skills is computer-based assistive technology. In this paper, a critical analysis of the literature on assistive technology for dyslexia and its underlying theoretical frameworks are hereby investigated. An understanding on the challenges of dyslexia and assistive learning technology are examined so that technology can be used to train, assist, and enable learning. The principal theoretical perspective that underpins effective teaching and learning strategies and approaches for learners with difficulties in learning, including dyslexia, is on constructivist set of ideas about cognitive development. In the construction of a constructivist environment in education, technology is identified as a major contributing factor in enhancing learning. Technology is used as a tool in cultivating knowledge and experience among students. The theory of diffusion of innovation seeks to explain how innovations such as the assistive technology are taken up in a population, how the students accept and use the computer-based assistive technology. Collectively, the theories of constructivism and diffusion of innovation elucidates the characteristics of the computer-based assistive technology that may influence adoption by the students with special needs. It confirms that understanding these theoretical perspectives and technology will provide the opportunity for dyslexic learners not only to be able to read but also to have a better future through education.

Key Words: dyslexia; assistive technology; education; constructivism; theory of diffusion of innovation