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Resting state electroencephalogram in autism spectrum disorder identification based on neuro-physiological interface of affect (NPiA) modelling (Article)

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Abstract

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Children with autism spectrum disorder (ASD) is likely to have repetitive and restricted repertoire in its behaviors, activities and interests. Early detection and intervention of ASD can help these children to lead an almost normal life. Thus it is important to ensure that early detection of such ASD preschoolers can be carried out. The brain connectivity of ASD can be achieved better by capturing and analyzing through the EEG and machine learning. In this paper we presented both the time domain approach, which were used by most researchers to identify ASD and also the neuro-physiological interface of affect (NPiA) at resting state. There seems to be consistency in results based on the NPiA at resting state for eyes opened and eyes closed while using time domain approach shows otherwise. Therefore, both models can be used to have a better accuracy in diagnosing an ASD. Future works also can have the NPiA model approaches on the other learning disabilities. Copyright © 2019 American Scientific Publishers All rights reserved.

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