Opinion



# A unique approach of cranial nerve stimulation by internet based therapy

## Abstract

The internet based therapy will be a promising intervention of oral motor and cognitive disorders in preschooler and school aged child. My intention is to use or add a new approach in classical institute based therapy by using computer or mobile at home premises for the purpose of physical therapy in place of clinical based therapy in treatment of developmental disabilities. The literature review shows that these types of disorders can be managed by early intervention and treatment through yoga and therapy. I observed that the child is more interested in playing games either in mobile or in computer. So, I want to utilize this opportunity in the form of therapy through his mother either by active gaming or passive gaming (Active games in which no involvement of parents and in passive parents will be involved) similar to that of institution based therapy. In our opinion, the result of this technique will be more in efficacy and improvement as the child is actively involved in the therapy session physically as well as mentally. This technique will reduce the burden on clinic and institution also reduces the cost of treatment by saving travelling cost, regular clinic charge and physiotherapist hassle.

**Keywords:** internet based therapy, oral motor, cognitive disorder, developmental disabilities, gaming, intervention, treatment

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## Introduction

The newborn human infant requires the normal structure, function, and maturation of the oral pharyngeal organs in order to take in the nutrients needed for growth to adulthood. In addition, the pharyngeal intersection of the pathways for nutrient acquisition and respiration mandate that the airway protective structures and reflexes develop appropriately as the nutrient acquisition functions mature. Concurrent with the child's general neurologic development, the primitive reflexive infant suck and swallow are transformed into the mature, voluntary-reflexive, complex, integrated deglutitive functions of biting, chewing, bolus formation, and propulsion into the pharynx. Finally, many disorders of these organs that occur in adulthood also occur in childhood, but may have different epidemiology, manifestations, or optimal management in these younger patients. Disorders of the smooth muscle esophagus in children vary from those in adults to a lesser degree than the deglutitive disorders.[1]

The role of physical therapy in oral motor and cognitive disorder plays a fundamental part in treatment of these disabilities in early childhood stage and can be managed with proper intervention and care. Persons, who are free from all kind of developmental disorders, are so fortunate that they can express what they want but on the other hand persons who are having some kind of disability are unable to perform daily activities and feel helpless. Though most clinicians saw oral motor on a scale from normal to abnormal and frequently emphasized the value of early identification and treatment, the referral and treatment pathways that are in trend whereby only the most severe children are treated. Child factors within the development of disorder include challenging behavioral characteristics, sensory sensitivities, difficult temperament, and lack of oral feeding motivation. The importance of these child factors are supported by assessment, which identifies distinct patterns of child characteristics associated with different types of disorder.[2]

In this scenario it is very necessary to provide basic cranial therapy exercises to the child to develop normal growth of all organs including brain development, oral motor and sensory development so as to free from all early childhood disabilities. Through some device like tablet that should attract him to do so in his early childhood to protect them from such type of severe disorder.[3]

## Procedure

We are concerning regarding the child with developmental disabilities having early sign and symptoms of disorders like cognitive, oral motor, swallowing, mental retardation, autism, dysarthria, dysphagia and apraxia of speech.

a) Create a physiotherapist unit in each district which is already available in district hospitals (In case of India).

b) Setup a master control unit or server in district hospitals.

c) Fix the time for daily exercise with internet based processing.

d) Give link to each incoming patient with proper instruction and advertisement through social media and other platforms.

e) Start exercise as per schedule; check the progress after 15 days.

In that manner we can reach to the rural, urban, and remotely located families to provide preschooler and school aged children incorporating childhood disabilities in early stage.[4]

## Conclusion

We are thinking that technology based intervention should be used in medical treatment as much as possible and also interested in how well internet based therapy interventions can be used in treatment of such disorders because technology based platforms are reliable, goal-centric and cost effective. We have to note that this type of technique will be a very useful, incorporating developmental disorder which

requires long term therapy for treatment. We think that it is necessary to compare this with other kinds of Technology-based treatments and clinic based treatments such computer-aided exposure with therapist involvement and self-administered computer-aided exposure. Use of technology for the society health will provide more impact in creating a better world which will free from disabilities. In this view, such type of medical treatment will be very helpful for countries like India, China, Bangladesh etc. and also for under developed, undeveloped and developing countries.

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## Conflict of interest

Author declares no conflict of interest.

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