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Modulation of symptoms of autism spectrum disorders

Autism is a congenital developmental disorder characterized by abnormal social interaction, persistent repetitive patterns of behavior, and impaired communication skills. Autism appears before the third year of age. It belongs to autism spectrum disorders (ASD). There is currently no treatment for ASD that provides significant improvement in core symptoms. However, recent studies suggest that ASD is associated with gut dysbiosis; the modulation of gut microbiota in children with ASD may improve the manifestation of ASD symptoms. Here we present a randomized, double-blind, placebo controlled pilot study demonstrated that the ASD suffering children have significantly modified gut microbiome that is converted to nearly neurotypical one by supplementation of children with biological response modifier Juvenil, which is a molecular complex prepared by alcohol/ether extraction of bovine blood. In parallel, Juvenil positively modulate children´s autism symptoms in the categories of motor manifestations, visual reactions, fear and nervousness, non-verbal communication and level and activity. This pilot study has been registered by the Ethics commission of the University Hospital Hradec Kralove, Czech Republic, No.: 202005 S09P, registered in May 12th 2020.

Keywords: autism, gut microbiome, biological response modifier, neuropsychology.

Biography

The author's dominant topic is infection biology oriented towards host-pathogen interactions with a special focus on early innate immune responses of hosts. A parallel topic is basic research on modulators of biological responses.

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