



Efficacy of Marshmallow 1% Ointment in the Treatment of Atopic Dermatitis: a Randomized, Pilot, Placebo Controlled Clinical Trial

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Atopic dermatitis (AD) known as atopic eczema is a chronic inflammatory skin disease, primarily affects infants and young children. The common drug used for AD treatment carries the risk of side effects. Then development of a safe therapeutic strategies is need [1]. The objective of this study was to evaluate the efficacy of topical Marshmallow 1% ointment in the treatment of AD. A randomized, pilot, clinical trial, was conducted to investigate the efficacy of marshmallow 1% ointment in 50 children with mild to moderate AD at the Mofid Children Hospital of Shahid Beheshti University of Medical Sciences, Tehran, Iran. The diagnosis of AD was made according to the criteria of Hanifin and Rajka by physicians. The inclusion criteria were children aged 3 months to 12 years, Atopic Dermatitis SCORAD score between 25-50, participant with no history of acute local infections and no history of contact dermatitis. Participants were excluded if they had skin sensitivity during treatment period and participants suffering from immunodeficiency diseases. Children with AD were randomly allocated in two groups and treated with either Marshmallow 1% ointment or Hydrocortisone 1% (Sina Daroo Co., Iran) as placebo, twice a day for 7 days and after that 3 times a week for a period of 21 days. The Atopic Dermatitis SCORAD index between the experimental and placebo groups were detected pre-treatment, at first week and after one month post treatment. Eleven patients in treatment group and 11 in placebo group completed the trial. According to the trial results, the severity of disease was not significant at the pre-treatment, end of first week and in first month of trial. Although there was no considerable relationship between both groups and SCORAD index at the end of the first week ($p=0.807$), but it was significant at the end of first month ($p=0.008$). A decreasing trend of SCORAD index was observed in treatment group. *Marshmallow* 1% ointment indicated more efficacy in decrease of disease severity compare to Hydrocortisone 1%. The result indicated that Marshmallow 1% ointment is appropriate remedy for children suffering from AD.

Keywords: Marshmallow, *Althaea officinalis*, Atopic dermatitis

References

[1] Kramer, O.N.; Strom, M.A.; Ladizinski, B., Lio, P.A. *Clin. Dermatol.* **2017**, *35*(4): 344-348.