

Colloidal Oatmeal in Adult Atopic Dermatitis

Atopic dermatitis is a common, relapsing inflammatory skin disorder characterized by genetic abnormalities in the skin barrier via mutations in filaggrin, deficiencies in ceramides and cathelicidins, immunologic disturbances with a shift toward the Th-2 inflammatory pathway, and an elevation in serum immunoglobulin (IgE) levels.¹

The Stats:



Atopic dermatitis (AD) affects up to 20% of children and 10% of adults worldwide.²⁻³



AD has the highest disease burden among skin diseases³



91% of patients experience itching on a daily basis⁴



AD costs are estimated at over \$5 billion dollars annually in patient visits, lost productivity and reduced quality of life.⁵⁻⁸

US FDA & Health Canada Approved Recognized Skin Protectant

The clinical benefits of colloidal oatmeal in atopic dermatitis have been demonstrated through extensive research across diverse patient populations and clinical applications. Colloidal oatmeal is the only single skin protectant OTC active ingredient that can claim to temporarily protect and help relieve symptoms of eczema as recognized by the US FDA & Health Canada OTC Monographs.⁹⁻¹¹



30+ Clinical Studies



3000+ patients

with dry and/or compromised skin¹²



Pivotal Study

Clinically proven to improve microbiome diversity, skin moisture barrier and disease severity in adults with mild to moderate AD¹³

Effects of Colloidal Oatmeal Topical Atopic Dermatitis Cream on Skin Microbiome and Skin Barrier Properties. Journal of Drugs and Dermatology 2020

Purpose

Evaluate the efficacy of a 1% colloidal oatmeal cream and a non-fragranced standard moisturizer on the skin microbiome, skin barrier function, skin hydration and skin pH of patients with mild-to-moderate eczema.

Design



61 patients

aged 16 to 50 years old who experienced a recent itch flare-up (determined by VAS) and one target lesion with an ADASI score of 6-12 and a moderate erythema and pruritis subscore

2 week

treatment period, followed by a 1-week regression period

Results

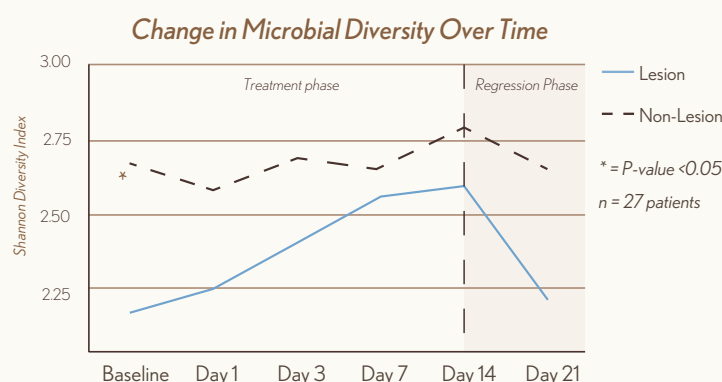
Significant improvements in microbial diversity, skin pH, skin barrier function, skin hydration and disease severity

At baseline, lesional skin had a higher pH, TEWL, and lower skin hydration than non-lesional skin.

For subjects treated with Colloidal Oatmeal Cream, disease severity significantly improved from baseline throughout the 14-day treatment. Both lesional and nonlesional skin had significant increases in hydration, reduced pH, TEWL and itch.

In comparison, the standard moisturizer provided no significant improvements in pH, TEWL or microbial diversity – only improved hydration.

Significant improvements in microbial balance



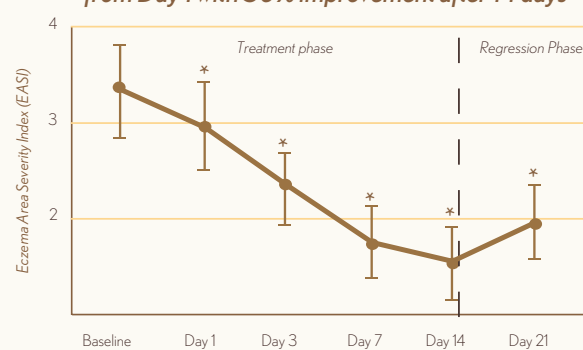
90%

of subjects showed an improvement in Eczema Area and Severity (EASI) scores by Day 3*

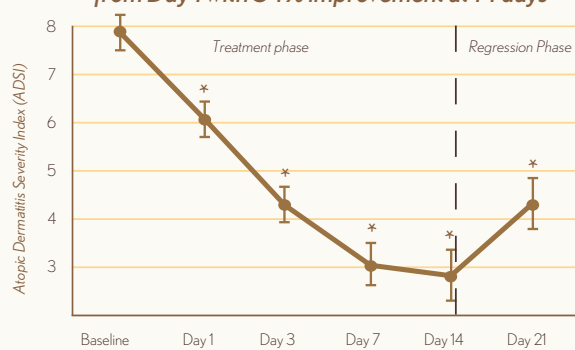
97%

of subjects showed significant improvement in Atopic Dermatitis Severity Index (ADSI) scores by Day 3*

Significant improvement in AD disease severity from Day 1 with 50% improvement after 14 days



Significant improvement in lesion extent and severity from Day 1 with 54% improvement at 14 days



n=31 patients 16-50 years of age with mild to moderate atopic dermatitis that experienced a recent flare-up.

81%

of subjects showed improvement in dryness, roughness and itch Day 1* with 61% improvement after 14 days

97%

of subjects showed improvement in itchy, dry skin by Day 3* with 54% improvement after 14 days

*statistically significant improvement n=31

REFERENCES

- Yang G, Seok JK, Kang HC, Cho YY, Lee HS, Lee JY. Skin Barrier Abnormalities and Immune Dysfunction in Atopic Dermatitis. *Int J Mol Sci*. 2020;21(8):2867. Published 2020 Apr 20. doi:10.3390/ijms21082867
- Odhiamblo JA, Williams HC, Clayton TO, Robertson CF, Asher MI; ISAAC Phase Three Study Group. Global variations in prevalence of eczema symptoms in children from ISAAC Phase Three. *J Allergy Clin Immunol*. 2009;124(6):1251-8.e23. doi:10.1016/j.jaci.2009.10.009
- Deckers IA, McLean S, Linsen S, Momms M, van Schayck CP, Sheikh A. Investigating international time trends in the incidence and prevalence of atopic eczema 1990-2010: a systematic review of epidemiological studies. *PLoS One*. 2012;7(7):e39803. doi:10.1371/journal.pone.0039803
- Dawn A, Papoiu AD, Chan YH, Rapp SR, Rasette N, Yosipovitch G. Itch characteristics in atopic dermatitis: results of a web-based questionnaire. *Br J Dermatol*. 2009;160(3):642-644. doi:10.1111/j.1365-2133.2008.08941.x
- Abuabara K, Yu AM, Okhovat JP, Allen IE, Langan SM. The prevalence of atopic dermatitis beyond childhood: A systematic review and meta-analysis of longitudinal studies. *Allergy*. 2018;73(3):696-704. doi:10.1111/all.13320
- Lee HH, Patel KR, Singam V, Rastogi S, Silverberg JL. A systematic review and meta-analysis of the prevalence and phenotype of adult-onset atopic dermatitis. *J Am Acad Dermatol*. 2019;80(6):1526-1532.e7. doi:10.1016/j.jaad.2018.05.1241
- Barbarot S, Auziere S, Gadkari A, et al. Epidemiology of atopic dermatitis in adults: Results from an international survey. *Allergy*. 2018;73(6):1284-1293. doi:10.1111/all.13401
- Silverberg JL, Hanifin JM. Adult eczema prevalence and associations with asthma and other health and demographic factors: a US population-based study. *J Allergy Clin Immunol*. 2013;132(5):1132-1138. doi:10.1016/j.jaci.2013.08.031
- Fowler JF Jr. Colloidal oatmeal formulations and the treatment of atopic dermatitis. *J Drugs Dermatol*. 2014;13(10):1180-1185.
- FDA. Skin Protectant Drug Products for Over-the-Counter Human Use; Final Monograph. 68FR33362 June 4, 2003. Available from: <http://www.fda.gov/downloads/Drugs/DevelopmentApprovalProcess/DevelopmentResources/Over-the-CounterOTCDrugs/StatusofOTCRulemakings/ucm091520.pdf> Accessed 8.17.21
- Health Canada: Medicated Skin Care Products Monograph: http://webprod.hc-sc.gc.ca/nhp/nd-bdipsn/atReq.do?atid=skin_peau&lang=eng Accessed 8.17.21
- Data on file. Johnson & Johnson Consumer Inc.
- Capone K, Kirchner F, Klein SL, Tierney NK. Effects of Colloidal Oatmeal Topical Atopic Dermatitis Cream on Skin Microbiome and Skin Barrier Properties. *J Drugs Dermatol*. 2020 May 1;19(5):524-531. PMID: 32484623.