Genital Involvement in Patients With Atopic Dermatitis is Associated With Sexual Difficulties and Higher Disease Burden: Results From a Real-World Multicountry Cohort Study (MEASURE-AD)

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**Introduction/Background:** Atopic dermatitis (AD) is a chronic, relapsing inflammatory skin disease characterized by erythematous and pruritic lesions. Genital involvement of AD is not well characterized or studied; the prevalence of genital AD and its impact on sexual function and quality of life has not been fully elucidated.

**Objective:** To evaluate disease burden and quality of life among patients with genital involvement of AD.

Methods: MEASURE-AD is a cross-sectional, non-interventional cohort study enrolling subjects from 28 countries to assess the disease burden associated with moderate-to-severe AD.

Patients aged ≥ 12 years with a physician-confirmed diagnosis of moderate-to-severe AD who were receiving or eligible to receive systemic therapy were enrolled between December 2019 and December 2020 during routine clinic visits. Patients ≥ 16 years were included in this post hoc analysis. Genital involvement was identified using the SCORing Atopic Dermatitis (SCORAD) index. The extent and severity of AD were evaluated using the Eczema Area and Severity Index (EASI), body surface area (BSA), and the validated Investigator Global

Assessment for Atopic Dermatitis (vIGA-AD). Pruritus was assessed using the Worst Pruritus Numeric Rating Scale (WP-NRS). Quality of life assessments were conducted using the Dermatology Life Quality Index (DLQI)/Children's DLQI (CDLQI). Association between burden and genital AD was analyzed by applying Kruskal-Wallis and Chi-square tests to continuous and categorical variables, respectively.

Results: In the MEASURE-AD study, 1474 patients (708 females [48.0%]; 766 males [52.0%]) were enrolled with a mean (SD) age of 38.0 (16.5) years and AD duration of 23.3 (15.4) years. A total of 245 patients (16.6%) were identified as having genital AD; 1229 (83.4%) had no genital AD involvement. Patients with genital AD had significantly higher EASI (mean [SD]: 23.5 [13.7] vs 13.1 [12.0]) and WP-NRS (6.4 [2.6] vs 5.1 [3.1]) scores (P < .0001 for both), a greater number of AD regions affected (3 other regions affected: 94.7% vs 60.5%; P < .0001), greater body surface area involvement (mean [SD]: 40.9% [24.7] vs 21.5% [20.72]; P < .0001), and more severe disease (vIGA-AD score of 4: 31.8% vs 17.6%; P < .0001) than patients without genital AD. Patients with genital AD had greater impairment in quality of life compared with those without genital involvement (DLQI mean [SD]: 13.9 [7.4] vs 10.1 [7.7]; P < .0001). Specifically, more patients with genital AD experienced sexual difficulties than those without genital AD (DLQI sexual difficulties, a lot/very much: 37.8% vs 18.4 %; P < .0001; Figure). Conclusion: Patients with genital AD experienced a higher disease burden and greater impairment of quality of life with a considerable impact on sexual function compared with patients without genital involvement. Healthcare providers should proactively inquire about genital AD symptoms as some patients may be hesitant to raise the topic out of embarrassment or fear of judgment. Effective treatment is important for mitigating the multidimensional burden of AD; the burden of genital AD should be considered during treatment decision-making discussions between patients and healthcare providers.

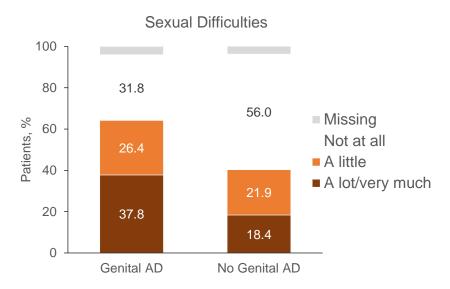


Figure 1. Patients reporting sexual difficulties on DLQI\*

AD, atopic dermatitis; DLQI, Dermatology Life Quality Index.

\*P < .0001 for genital AD vs no genital AD groups across all categories.

**Keywords:** atopic dermatitis, genital eczema, quality of life, disease burden, sexual function

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