



New Biomarker Data Presented in a Late Breaking Oral Presentation at EADV Congress 2026 Showing Early Molecular Responses to Rezpegaldesleukin Across Multiple Immune Pathways Dysregulated in Patients with Atopic Dermatitis

September 30, 2026

Rezpegaldesleukin-associated improvements were detected as early as Week 2 and were significantly correlated with subsequent clinical response

SAN FRANCISCO and VIENNA, Sept. 30, 2026 /PRNewswire/ -- Nektar Therapeutics (Nasdaq: NKTR) and collaborators at the Icahn School of Medicine at Mount Sinai today announced new results from a multi-omic biomarker sub-study from REZOLVE-AD providing further evidence that rezpegaldesleukin engages its regulatory Tcell (Treg)-mediated mechanism in patients with moderate-to-severe atopic dermatitis, with significant biomarker changes associated with clinical improvement observed as early as Week 2.



**Bold immune science.
Transformative immune health.**

Rezpegaldesleukin is an investigational first-in-class Treg biologic designed to address imbalances in the immune system that underlie many autoimmune disorders and chronic inflammatory conditions. It targets the IL-2 receptor complex to preferentially stimulate the proliferation of Tregs to restore immune balance.

Atopic dermatitis (AD) is a chronic inflammatory skin disease characterized by Tcell-mediated immune dysregulation highly impacting patients' quality of life. Although current biologics effectively target type 2 inflammation, more than 50% of adults report inadequately controlled disease despite treatment.¹

The data were presented today in a late breaking oral presentation at the European Academy of Dermatology and Venereology (EADV) Congress 2026 in Vienna, Austria entitled "Multi-omic profiling identifies early molecular responses to rezpegaldesleukin, a novel regulatory T cell-inducing therapy, in atopic dermatitis" [[link to presentation](#)].

"More than half of adults with atopic dermatitis report inadequately controlled disease despite treatment with currently available biologics that target type 2 inflammation, underscoring the complexity of treating this heterogeneous disease and leaving a major unmet need for a novel approach to immune modulation," said Emma Guttman-Yassky, M.D., Ph.D., Waldman Professor of Dermatology and Immunology and Health System Chair of the Kimberly and Eric J. Waldman Department of Dermatology at the Icahn School of Medicine at Mount Sinai. "These data show that rezpegaldesleukin's novel approach to regulatory Tcell stimulation has the potential to treat patients with heterogeneous disease in atopic dermatitis and other autoimmune disease settings."

Dr. Guttman-Yassky continued, "Within 2 weeks of treatment, we observed significant systemic and cutaneous normalization across multiple disease associated pathways. Importantly, these early molecular changes correlated with clinical outcomes at Week 16 only in the rezpegaldesleukin-treated patients, providing a meaningful link between the biological activity of rezpegaldesleukin and the subsequent clinical benefit."

The biomarker sub-study analyzed blood and lesional skin tape samples from 100 patients in the Phase 2b REZOLVE-AD study during the 16-week induction period, including 59 patients treated with the planned Phase 3 rezpegaldesleukin dose of 24 µg/kg every two weeks (Q2W) and 41 patients who received placebo. Samples were collected at baseline and at Weeks 2 and 4, while clinical assessments were conducted at baseline and every two weeks through Week 16.

The analysis was designed to profile gene and protein expression in the skin and serum during the first weeks of treatment and to assess whether early molecular signals were associated with later clinical outcomes. Patients in the rezpegaldesleukin and placebo arms were well balanced across demographics and baseline disease characteristics. The mean reduction from baseline in Eczema Area and Severity Index (EASI) at Week 16 was 64% in the molecular cohort, consistent with the 61% reduction observed in the overall 24 µg/kg every two weeks (Q2W) cohort.

Highlights from the REZOLVE-AD Multi-omic Biomarker Sub-study

- Repegaldesleukin induced rapid Treg-associated molecular changes, including significant up-regulation of FOXP3 and IL2RA as early as week 2 of treatment as compared to baseline, with concurrent modulation of multiple immune pathways which are dysregulated in patients with atopic dermatitis.
- Transcriptomic and proteomic analyses demonstrated significant systemic and cutaneous normalization across multiple immune pathways, including Th1, Th2, Th17, and JAK-STAT signaling pathways, as early as week 2 of treatment as compared to baseline, including early modulation of fibrosis- and tissue-remodeling biomarkers.
- Proteomic analysis demonstrated significant improvements in cardiovascular, atherosclerotic, and alopecia areata signatures as compared to baseline or placebo.
- Early serum biomarker changes at week 2, including increases in IL-10 and TGFβ1 expression and reduction in CCL17/TARC expression, were associated with subsequent EASI improvement at Week 16, linking early molecular effects with later clinical response. Correlations between early biomarker changes and Week 16 EASI improvement were statistically significant in the repegaldesleukin-treated patients but not in placebo-treated patients ($p < 0.001$).
- These findings support repegaldesleukin as a Treg-directed approach to heterogeneous inflammatory diseases, including atopic dermatitis and others, through early normalization of dysregulated immune pathways.

"These data further solidify repegaldesleukin's potential to restore immune balance by stimulating regulatory T cells rather than suppressing a single inflammatory pathway, highlighting its promise as a pipeline in a product," said Jonathan Zalevsky, Ph.D., Chief Research and Development Officer at Nektar Therapeutics. "This latest analysis highlights both the breadth and speed of the molecular response, strengthening our confidence in repegaldesleukin's differentiated mechanism of action as we advance the program through Phase 3."

About REZOLVE-AD Phase 2b Study

The global 393-patient Phase 2b REZOLVE-AD ([NCT06136741](#)) study was conducted in patients with moderate-to-severe atopic dermatitis who had not previously been treated with a JAK inhibitor or other biologic. Patients were randomized (3:3:3:2) to receive subcutaneous repegaldesleukin at one of three dose regimens: 24 µg/kg every two weeks (Q2W), 18 µg/kg Q2W, or 24 µg/kg every four weeks (Q4W). A fourth arm received placebo Q2W. Primary and key secondary endpoints were assessed at Week 16. Following the induction period, repegaldesleukin-treated patients who achieved EASI percent reductions of at least 50 were re-randomized (1:1) to continue at the same dose level on a Q4W or Q12W regimen through Week 52 in a blinded maintenance period. Placebo patients with EASI percent score reductions of at least 50 continued to receive placebo Q4W.

About Repegaldesleukin

Autoimmune and inflammatory diseases cause the immune system to mistakenly attack and damage healthy cells in a person's body. A failure of the body's self-tolerance mechanisms enables the formation of the pathogenic T lymphocytes that conduct this attack. Repegaldesleukin is a potential first-in-class disease modifying therapeutic that may address this underlying immune system imbalance in people with many autoimmune and inflammatory conditions. It targets the interleukin-2 receptor complex in the body to stimulate proliferation of powerful inhibitory immune cells known as regulatory T cells. By activating these cells, repegaldesleukin may act to bring the immune system back into balance.

In February 2025, the U.S. FDA granted Fast Track designation for repegaldesleukin for the treatment of adult and pediatric patients 12 years of age and older with moderate-to-severe atopic dermatitis whose disease is not adequately controlled with topical prescription therapies or when those therapies are not advisable. In July 2025, the FDA granted Fast Track designation for repegaldesleukin for the treatment of severe alopecia areata (AA) in adults and pediatric patients 12 years of age and older who weigh at least 40 kg.

Repegaldesleukin is being developed as a self-administered injection for a number of autoimmune and inflammatory diseases, including atopic dermatitis, alopecia areata and Type 1 diabetes. It is wholly owned by Nektar Therapeutics.

About Atopic Dermatitis

Atopic dermatitis is the most common type of eczema, affecting approximately 30 million people in the United States.² AD is characterized by a defect in the skin barrier, which allows allergens and other irritants to enter the skin, leading to an immune reaction and inflammation.

About Nektar Therapeutics

Nektar Therapeutics is a clinical-stage biotechnology company focused on developing treatments that address the underlying immunological dysfunction in autoimmune and chronic inflammatory diseases. Nektar's lead product candidate, repegaldesleukin (REZPEG, or NKTR-358), is a novel, first-in-class regulatory T cell stimulator being evaluated in atopic dermatitis, alopecia areata, and Type 1 diabetes mellitus. Nektar's pipeline also includes preclinical bivalent tumor necrosis factor receptor type II (TNFR2) antibody and bispecific programs, NKTR-0165 and NKTR-0166, and a modified hematopoietic colony stimulating factor (CSF) protein, NKTR-422.

Nektar is headquartered in San Francisco, California. For further information, visit www.nektar.com and follow us on LinkedIn.

Cautionary Note Regarding Forward-Looking Statements

This press release contains forward-looking statements which can be identified by words such as: "can," "develop," "potential," "expand," "address," "may," "plan" and similar references to future periods. Examples of forward-looking statements include, among others, statements regarding the safety and efficacy profile and therapeutic potential of, and future development plans for, rezpegaldesleukin, NKTR-0165, NKTR-0166, and NKTR-422, and potential patient preferences and market adoption related thereto, and plans and timing of future data releases. Forward-looking statements are neither historical facts nor assurances of future performance. Instead, they are based only on our current beliefs, expectations and assumptions regarding the future of our business, future plans and strategies, anticipated events and trends, the economy and other future conditions. Because forward-looking statements relate to the future, they are subject to inherent uncertainties, risks and changes in circumstances that are difficult to predict and many of which are outside of our control. Our actual results may differ materially from those indicated in the forward-looking statements. Therefore, you should not rely on any of these forward-looking statements. Important factors that could cause our actual results to differ materially from those indicated in the forward-looking statements include, among others: (i) our statements regarding the therapeutic potential of rezpegaldesleukin, NKTR-0165, NKTR-0166 and NKTR-422 are based on preclinical and clinical findings and observations and are subject to change as research and development continue; (ii) rezpegaldesleukin, NKTR-0165, NKTR-0166 and NKTR-422 are investigational agents and continued research and development for these drug candidates is subject to substantial risks, including negative safety and efficacy findings in future clinical studies (notwithstanding positive findings in earlier preclinical and clinical studies); (iii) rezpegaldesleukin, NKTR-0165, NKTR-0166 and NKTR-422 are in clinical development and the risk of failure is high and can unexpectedly occur at any stage prior to regulatory approval; (iv) data reported from ongoing clinical trials are necessarily interim data only and the final results will change based on continuing observations; (v) early molecular signals observed in REZOLVE-AD may not be associated with later clinical outcomes in future clinical trials; (vi) the timing of the commencement or end of clinical trials and the availability of clinical data may be delayed or unsuccessful due to regulatory delays, slower than anticipated patient enrollment, manufacturing challenges, changing standards of care, evolving regulatory requirements, clinical trial design, clinical outcomes, competitive factors, or delay or failure in ultimately obtaining regulatory approval in one or more important markets; (vii) a Fast Track designation does not increase the likelihood that rezpegaldesleukin will receive marketing approval in the United States; (viii) patents may not issue from our patent applications for our drug candidates, patents that have issued may not be enforceable, or additional intellectual property licenses from third parties may be required; and (ix) certain other important risks and uncertainties set forth in our Annual Report on Form 10-K filed with the Securities and Exchange Commission on March 13, 2026 and our subsequent filings. Any forward-looking statement made by us in this press release is based only on information currently available to us and speaks only as of the date on which it is made. We undertake no obligation to update any forward-looking statement, whether written or oral, that may be made from time to time, whether as a result of new information, future developments or otherwise.

Contacts

For Investors:

Vivian Wu
628-895-0661
VWu@nektar.com

Corey Davis, Ph.D.
LifeSci Advisors
212-915-2577
cdavis@lifesciadvisors.com

For Media:

Susan Roberts
LifeSci Communications
202-779-0929
sroberts@lifescicomms.com

1. Lio P, Mackie D, Bates D, Mulvihill E, Patel M, Kim Y, Shi V. Burden, Control, and Treatment of Moderate to Severe Atopic Dermatitis in 2021: A United States Patient Survey Study. *J Drugs Dermatol*. 2023 Feb 1;22(2):119-131. doi: 10.36849/JDD.7071. PMID: 36745377.
2. *Eczema stats*. National Eczema Association. (2022, September 27). <https://nationaleczema.org/research/eczema-facts/>

 View original content to download multimedia: <https://www.prnewswire.com/news-releases/new-biomarker-data-presented-in-a-late-breaking-oral-presentation-at-eadv-congress-2026-showing-early-molecular-responses-to-rezpegaldesleukin-across-multiple-immune-pathways-dysregulated-in-patients-with-atopic-dermatitis-302894328.html>

SOURCE Nektar Therapeutics