Achievement of Treat-to-Target Thresholds with Envudeucitinib, a Selective TYK2 Inhibitor, in Moderate-to-Severe Plaque Psoriasis: Results from STRIDE and OLE

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Background

- > Treat-to-target thresholds in psoriasis (PsO) help to guide therapeutic decisions by defining clinically meaningful improvements in symptoms and quality of life (QoL).
- Psoriasis Area Severity Index (PASI), body surface area (BSA), and Dermatology Life Quality Index (DLQI) are validated scores used to define treatment success, with treat-to-target thresholds for PASI of $0, \le 1, \le 2, \le 3$, and ≤ 5 , BSA of $\le 1\%$ and $\le 3\%$, and DLQI of 0 and 0/1 being recognized in clinical guidelines and real-world practice. 1,2,3,4
- Envudeucitinib* (formerly known as ESK-001), a highly selective allosteric tyrosine kinase 2 (TYK2) inhibitor, has shown efficacy and a favorable safety profile in Phase 2 clinical trials, demonstrating its potential to achieve treat-to-target goals in moderate-to-severe plaque PsO.

*Envudeucitinib is investigational and has not been approved by any regulatory authority.

Envudeucitinib

Allosteric binding JH2 domain

Objectives

To assess the proportion of patients achieving clinically meaningful treat-to-target thresholds for PASI, BSA, and DLQI with envudeucitinib (envu) 40 mg twice daily (BID) in STRIDE and Open Label Extension (OLE).

Methods

Dose Assignment from

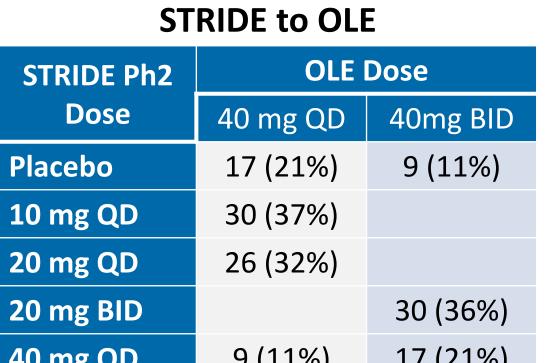
> STRIDE is a 12-week randomized, double-blinded, placebocontrolled Phase 2 study of envudeucitinib in adults with moderate-to-severe plaque PsO (NCT05600036).⁵

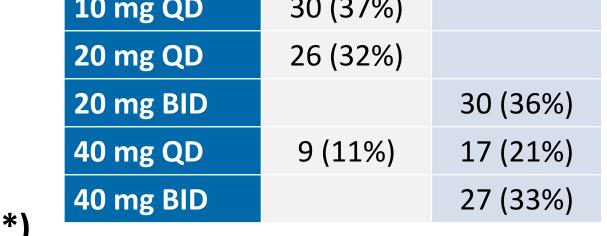
Results

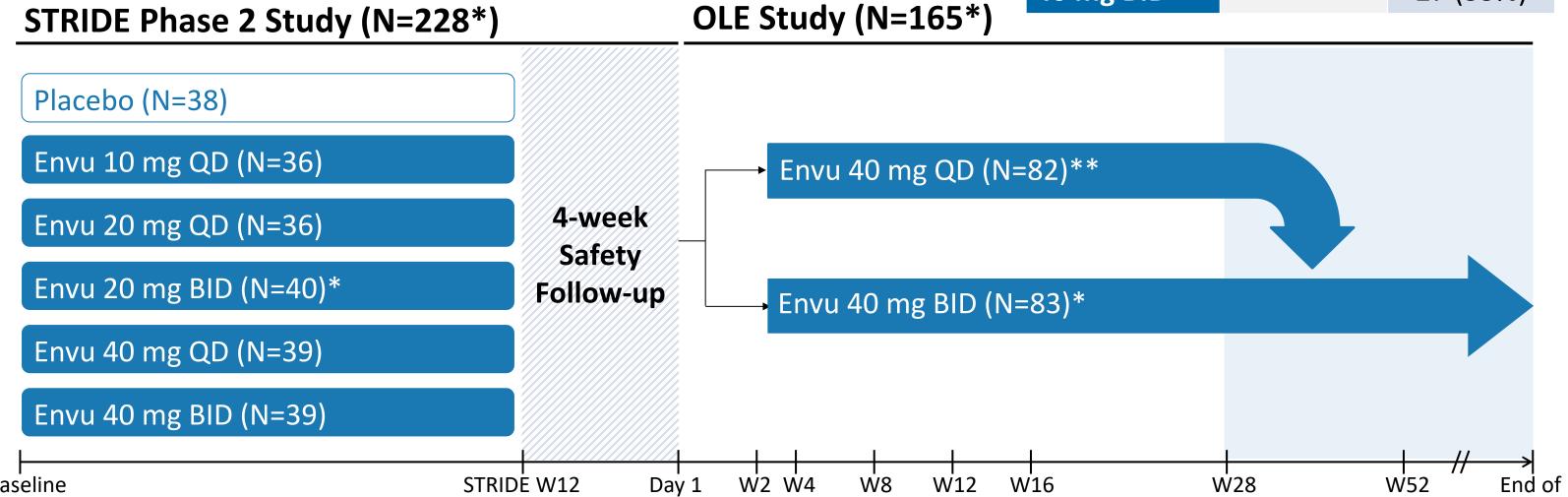
OLE study is an ongoing open-label extension study with envudeucitinib (NCT05739435).

Study Design

This study enrolled 95% of eligible patients who completed the STRIDE study.





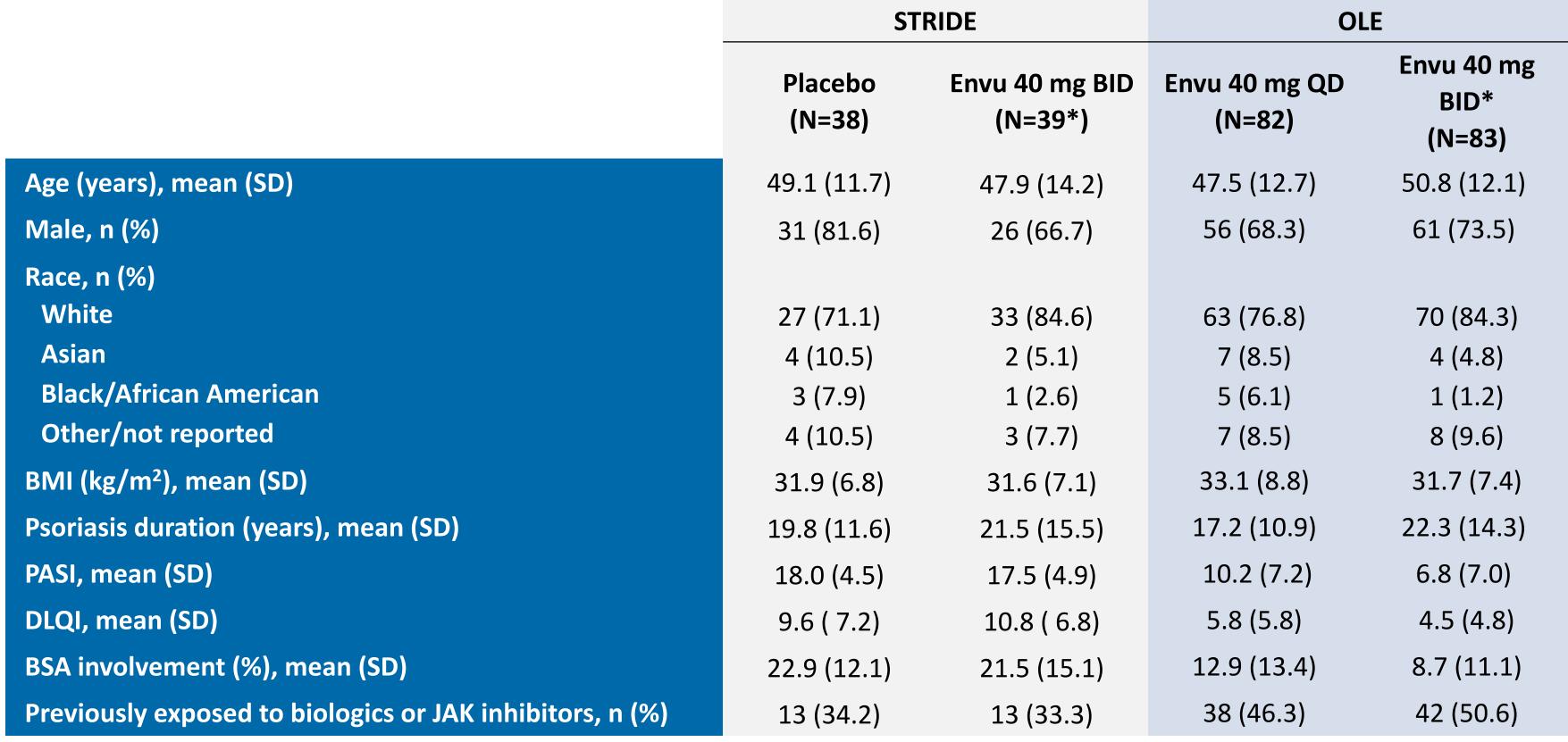


Statistical Analyses

- Achievement of treat-to-target thresholds at Week 12 of STRIDE and Week 52 of OLE was performed as a post-hoc analysis. All p-values presented are nominal.
- Efficacy analyses were performed on the modified Intent-To-Treat (mITT) population that included all randomized patients who received at least one dose of study drug.
- A non-responder imputation (NRI) was applied to analyses for STRIDE.
- A modified NRI (mNRI) was applied to analyses for OLE where patients who discontinued due to adverse events or inadequate response were non-responders and last observation was carried forward (LOCF) for discontinuations due to other reasons.
- LS Means and 95% confidence interval (CI) of percent change from baseline of PASI total score was based on a mixed model repeated measures (MMRM) analysis.

Envu 40 mg BID OLE W52 (N=80)

Demographics and baseline disease characteristics were distributed similarly across dosing arms, both in STRIDE and OLE study



At Week 52, 60% of patients on envudeucitinib 40 mg BID achieved BSA ≤1%

BSA ≤3%

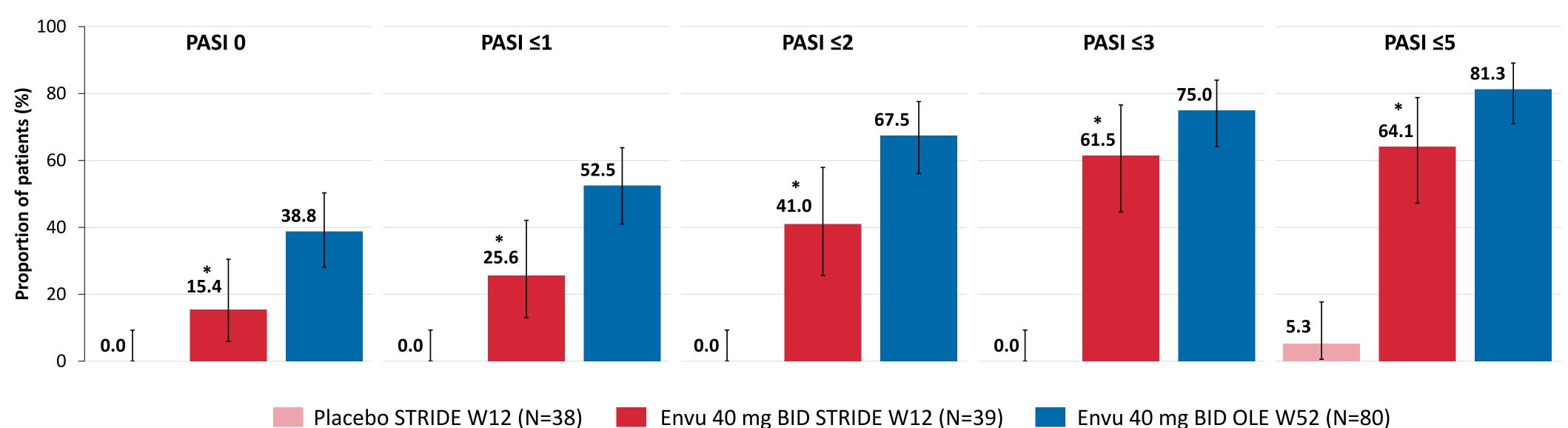
ITT analysis population. *Based on original dose assignment at start of OLE.

BSA ≤1%

100

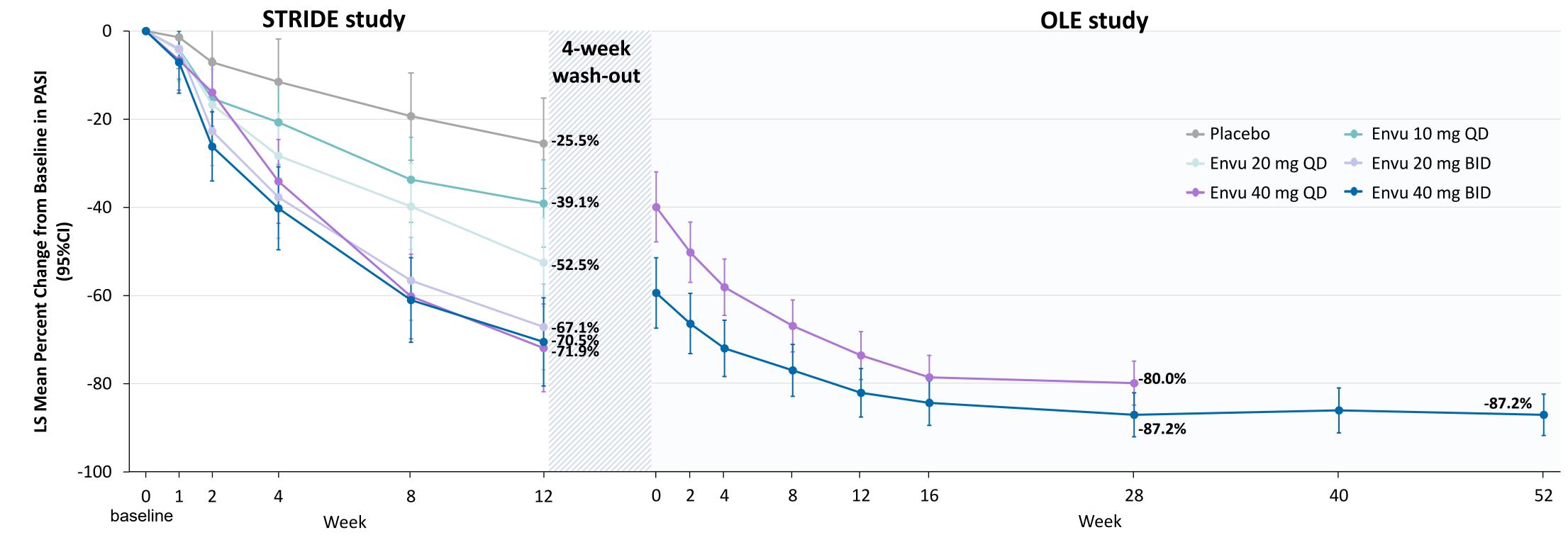
Placebo STRIDE W12 (N=38)

Consistent improvement in absolute PASI thresholds over time with envudeucitinib through 52 weeks



Error bars represent the 95% CI. * p<0.013 versus placebo (STRIDE).

Nearly 90% PASI improvement from baseline at 52 weeks with envudeucitinib 40 mg BID

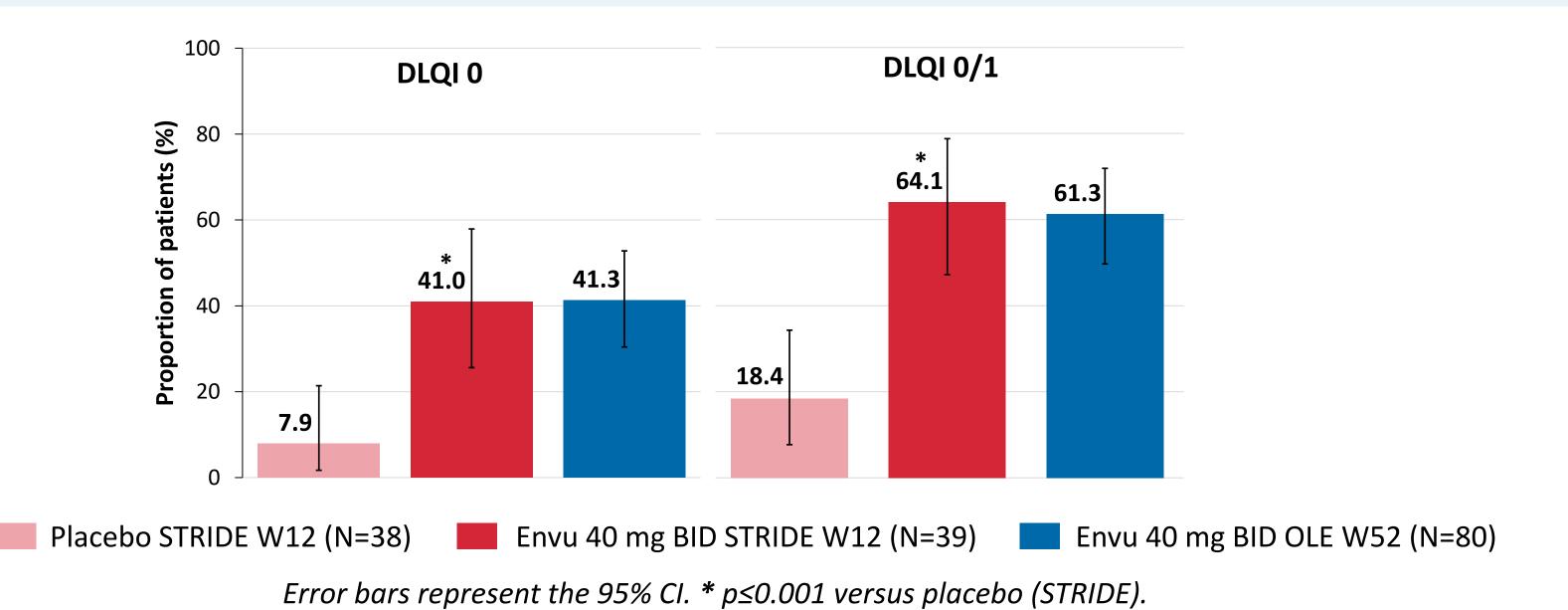


Patients on 40 mg QD in OLE received placebo, 10 mg QD, 20 mg QD and 40 mg QD in STRIDE. Patients on 40 mg BID in OLE received placebo, 20 mg BID, 40 mg QD, 40 mg BID in STRIDE.

At Week 12 and 52, >60% of patients on envudeucitinib 40 mg BID reported minimal or no impact on QoL

Envu 40 mg BID STRIDE W12 (N=39)

Error bars represent the 95% CI. * p<0.0001 versus placebo (STRIDE).



Safety profile at 52 weeks remained consistent with that observed in the placebo-controlled treatment period, with upper respiratory tract infection, nasopharyngitis, headache, and COVID-19 being the most common adverse events.⁶

Conclusions

- Treatment with envudeucitinib 40 mg BID led to rapid and sustained achievement of stringent treat-to-target thresholds in patients with moderate-to-severe plaque PsO.
- Sustained improvements in both skin clearance and QoL were observed from Week 12 through Week 52, reflecting consistent benefits across clinical and patient-reported outcomes.
- These results demonstrated sustained efficacy over time, reinforcing envudeucitinib's potential as a differentiated next-generation oral TYK2 inhibitor.

References

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Disclosures

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- † Author is employed by Alumis Inc.

^{*1} patient was randomized but not dosed.

^{**}Upon identification of most beneficial dose (STRIDE, OLE Week 28), 40 mg QD patients switched to 40 mg BID between Week 40 and Week 64.