Treatment With Fremanezumab Attenuates the Association Between Weather and Headache in Participants With Episodic Migraine: A Post-Hoc Analysis of the HALO-EM Study

Objectives: To determine whether daily weather variables and headache days during non-treatment periods and, if so, whether fremanezumab use modifies this association.

Methods: This post-hoc analysis assessed a large clinical trial (HALO-EM) dataset of daily headache diaries with daily weather variables.

Results: Fremanezumab treatment significantly altered associations between temperature and daily headache days, suggesting that fremanezumab may prevent headaches associated with weather triggers in participants with EM.

Conclusion: Treatment with fremanezumab attenuated the association between weather variables and headache, suggesting that fremanezumab may prevent headaches associated with weather triggers in participants with EM.

Demographics:
- Of the 1,376 participants with 74,084 daily diary records in the US, 16 participants were in regions without adequate weather data, and were not included in the final analysis of 660 participants (71,030 days of data, Figure 2).

Figure 1. Temperature-Related Headache Triggers Pre-Post Fremanezumab Treatment

Figure 2. National Climatic Data Center Map and Number of Participants Within Each Region

Table 1. Baseline Characteristics

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<thead>
<tr>
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<th>Placebo N=216</th>
<th>Fremanezumab N=660</th>
<th>Total population N=876</th>
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</thead>
<tbody>
<tr>
<td>Age, Mean (SD)</td>
<td>40.9 (12.3)</td>
<td>41.4 (12.3)</td>
<td>41.2 (12.3)</td>
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<tr>
<td>Gender, Female, n (%)</td>
<td>184 (86.2)</td>
<td>378 (56.1)</td>
<td>562 (58.2)</td>
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<td>Concomitant preventive drug use, n (%)</td>
<td>45 (20.8)</td>
<td>83 (18.7)</td>
<td>128 (14.9)</td>
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<tr>
<td>Race, White, n (%)</td>
<td>173 (80.1)</td>
<td>390 (87.8)</td>
<td>563 (65.8)</td>
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References: