BACKGROUND AND RATIONALE
• MET-TKI therapy in MET-ex14 NSCLC is associated with improved outcomes over chemotherapy.
• The aim of this study was to evaluate the real-world utilization and outcomes of MET-TKIs in advanced non-small cell lung cancer (NSCLC) patients with MET-ex14 NSCLC who received 1L treatment in the US from 2016 to 2021.

RESULTS
• Overall, 12 eligible patients met the criteria (Table 1).
• Baseline characteristics were comparable across FP-L1 groups (Table 1).

METHODS
• This retrospective, observational cohort study included de-identified patient data from the US-based Flatiron Health Foundation Medicine Clinico Genomics database (1/1/2016-12/31/2021). The data were extracted from 106,000 adult patients with metastatic non-small cell lung cancer from 2016 to 2021.
• Longitudinal clinical data were derived from electronic health records consisting of patient-level structured and unstructured data collected via technology-enabled clinical assessment. Clinical data were linked to genomic data for patients with a退市 Foundation Medicine's comprehensive genomic profiling testing using de-identified and de-identified testing.

• The authors thank Gowri Natarajan (Novartis Healthcare Pvt Ltd) for her clinical expertise and guidance and the Flatiron Health Foundation Medicine Clinico Genomics database for their support.

Table 1: Baseline characteristics by FP-L1 expression

<table>
<thead>
<tr>
<th>FP-L1 group</th>
<th>Frequency (%)</th>
<th>Baseline characteristics</th>
</tr>
</thead>
<tbody>
<tr>
<td>MED-Low</td>
<td>9 (75.0)</td>
<td>Gender: Male (8/9, 88.9%) Age at baseline (years): 61 (23-94)</td>
</tr>
<tr>
<td>MED-Med</td>
<td>3 (25.0)</td>
<td>Gender: Male (3/3, 100%) Age at baseline (years): 60 (33-73)</td>
</tr>
<tr>
<td>MED-High</td>
<td>0 (0.0)</td>
<td>Gender: Male (0/0, 0%) Age at baseline (years): 61 (41-73)</td>
</tr>
</tbody>
</table>

Figures

1. Inclusion criteria
2. Treatment patterns of 1L and 2L therapy in the (A) high FP-L1, (B) low FP-L1, (C) negative PD-L1, and (D) unknown FP-L1 groups

Table 2: PFS and OS by FP-L1 expression and by type of 1L therapy in the high FP-L1 group

<table>
<thead>
<tr>
<th>FP-L1 group</th>
<th>Median PFS (months)</th>
<th>1L therapy</th>
<th>OS (months)</th>
</tr>
</thead>
<tbody>
<tr>
<td>MED-High</td>
<td>12.9 (7.1-14.1)</td>
<td>Crizotinib</td>
<td>21.1 (14.2-31.0)</td>
</tr>
</tbody>
</table>

Acknowledgments
• The authors thank Alex Robins, Carolyn Senger, and David Engle of Flatiron Health for their assistance with data extraction and with the preparation of the manuscript.
• The authors thank Gowri Natarajan (Novartis Healthcare Pvt Ltd) for her clinical expertise and guidance and the Flatiron Health Foundation Medicine Clinico Genomics database for their support.

Conclusions
• Across patients in the MED-high group who received 1L and 2L crizotinib therapy, the median OS was 21.1 months (95% CI: 14.2-31.0 months).
• The observed trend for an increase in the proportion of patients with advanced NSCLC with a MET-ex14 mutation, limit the interpretability of the results across patient groups.

Study limitations
• The study is subject to selection biases inherent to real-world data analyses, which are subject to sampling errors in samples selected for inclusion.
• Data in the CGSDB are largely derived from a community setting in the US and may not represent clinical practice.

References

This study is funded by Novartis. Results presented at the ESMO 2022 Congress held in Paris, France from September 10-14, 2022.