



# Summary of Research: Overall Survival with Osimertinib in Resected EGFR-Mutated NSCLC

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## Abstract

This is a summary of the original article “Overall survival with osimertinib in resected EGFR-mutated NSCLC.” Osimertinib blocks the activity of the epidermal growth factor receptor (EGFR) on cancer cells, causing cancer cell death and tumor shrinkage, and is an effective treatment for EGFR-mutated non-small cell lung cancer (NSCLC). The ADAURA study assessed the effects of osimertinib versus placebo in patients with EGFR-mutated (exon 19 deletion or L858R) early stage (IB–IIIA) NSCLC removed by surgery (resected). Previous results from ADAURA demonstrated that patients treated with osimertinib stayed alive and cancer-free (disease-free survival) significantly longer than patients who received placebo. Recent data showed the overall length of time patients were alive after starting treatment (overall survival). In both the primary stage II–IIIA and overall stage IB–IIIA populations, patients in the osimertinib group had a significant 51% reduction in the risk of death compared with the placebo group. The data demonstrated that osimertinib after surgery significantly improved overall survival in patients with resected, EGFR-mutated, stage IB–IIIA NSCLC.

## 1 Summary of Research

This is a summary of the original article: “Overall survival with osimertinib in resected EGFR-mutated NSCLC” [1].

We present the results from the ADAURA trial on the overall length of time patients were alive after starting treatment (Fig. 1).

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### Why was this research done?



- Before the ADAURA study, for patients with early-stage non-small cell lung cancer (NSCLC), the recommended treatment was surgical resection, followed by chemotherapy for patients with stage II–IIIA and select stage IB disease. Despite having surgery with curative intent, the risk of the cancer recurring or of death remained high. Disease spreading to the brain is of particular concern and important to control.
- Epidermal growth factor receptor (EGFR) mutations are found in about 10–50% of patients with NSCLC.
- Osimertinib is a drug that can block the mutated form of EGFR protein on cancer cells, causing cancer cell death and tumor shrinkage.
- Osimertinib is known to be an effective treatment for patients with advanced NSCLC who have a mutation in the EGFR gene (EGFR-mutated). Based on this, and to improve outcomes in patients with early-stage resected EGFRm NSCLC using a personalized approach, osimertinib (and optional chemotherapy) was tested after surgery in the ADAURA study.
- Previous results from ADAURA demonstrated that patients who received osimertinib after surgery stayed alive and cancer-free longer than patients who received placebo. This summary describes recent results from ADAURA of the overall length of time patients were alive after starting treatment.

### How was this research done?

**Eligible patients:**

|   |                              |                                     |  |  |
|---|------------------------------|-------------------------------------|--|--|
|   |                              |                                     |  |  |
| <b>Adults</b>                             | <b>Early-stage NSCLC*</b>    | <b>EGFR mutation</b>                | <b>Had surgery to remove tumor</b><br>(plus optional chemotherapy) | <b>Able to carry out full or light activity</b><br>WHO Performance Status 0 or 1 |
| 18+ years (20+ years in Japan and Taiwan) | IB <sup>†</sup> , II or IIIA | Exon 19 deletion (Ex19del) or L858R |  |  |

\*Classified according to the 7<sup>th</sup> edition of the American Joint Committee on Cancer (AJCC) Cancer Staging Manual.  
†Patients with stage IB disease were not included in Japan.

In ADAURA, all eligible patients received standard treatment with surgery to remove the entire tumor, and chemotherapy if chosen, before being randomly assigned to one of two treatment groups.

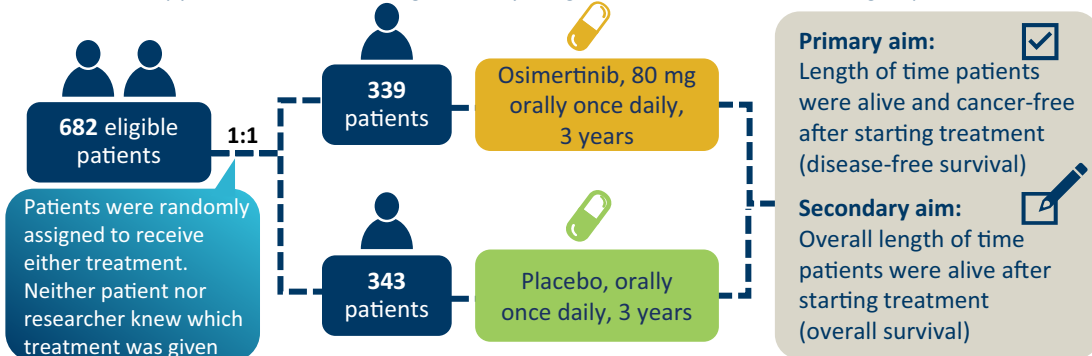


Fig. 1

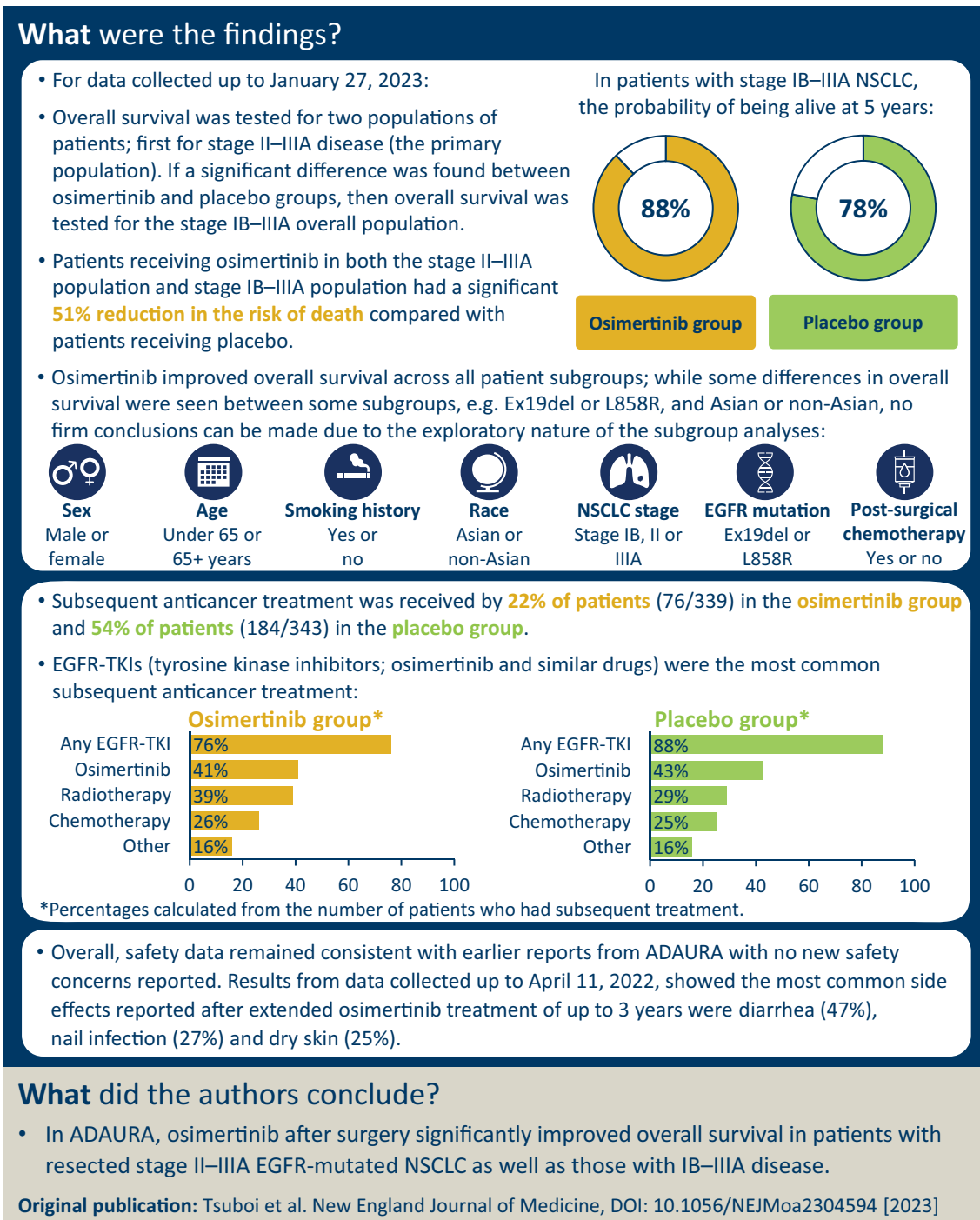


Fig. 1 (continued)

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## Declarations

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**Compliance and Ethics Guidelines** The trial was conducted in accordance with the provisions of the Declaration of Helsinki, the Good Clinical Practice guidelines of the International Council for Harmonization, applicable regulatory requirements, and the bioethics and human samples policy of the sponsor. The protocol was approved by relevant institutional review boards or ethics committees. All patients

provided written informed consent. This article is based on a previously conducted study and does not contain any new data from studies with human participants or animals performed by any of the authors.

**Consent for Publication** Not applicable.

**Data Availability** Provision of standard data underlying the findings described in this manuscript may be obtained in accordance with AstraZeneca's data sharing policy described at <https://astrazenecagrouptrial.s.pharmacm.com/ST/Submission/Disclosure>.

**Code Availability** Not applicable.

**Author Contributions** All authors contributed to the development of this article and approved the final document.

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## Reference

1. Tsuboi M, Herbst RS, John T, et al. Overall Survival with Osimertinib in Resected EGFR-Mutated NSCLC. *N Engl J Med.* 2023;389:137–47. <https://doi.org/10.1056/NEJMoa2304594>.