MADRID 2026 ESMO congress

LBA47

A prospective, randomized, phase II study of perioperative tislelizumab with chemotherapy in patients with locally advanced resectable oral squamous cell carcinoma (OPTIMAL study)

Y. He[1], J. Houyu[1], G. Ren[1], J. Hu[1], R. Xia[2], Y. Wu[1], S. Zhou[1], X. Qu[1], Z. Ren[1], L. Chen[3], L. Zhu[4], R. Li[1], Y. Wang[1]

[1] Department of Oral & Maxillofacial – Head & Neck Oncology, Shanghai Ninth People's Hospital - Shanghai Jiao Tong University School of Medicine, Shanghai, China, [2] Department of Oral Pathology, Department of Oral Pathology, Shanghai, China, [3] Clinical Research Unit, Shanghai Ninth People's Hospital, Shanghai Jiao Tong University School of Medicine, Shanghai, China[4] Department of Radiology, Shanghai Ninth People's Hospital - Shanghai Jiao Tong University School of Medicine, Shanghai, China

Background

KEYNOTE-689 showed improved survival results in resectable HNSCC, but the EFS curve separated at ⊠6 months and then plateaued, suggesting the optimal duration of postoperative immunotherapy warrants further exploration. As memory T cells are largely retained in lymph nodes, omitting radiation in patients who respond well to neoadjuvant immunotherapy may preserve immune function and maximize the benefit of adjuvant immunotherapy.

Methods

Patients with resectable LA-OSCC were randomized 1:1 to the experimental orcontrol arm, stratified by stage (III or IVa). Experimental arm: patients received three cycles of tislelizumab 200mg, albumin-bound paclitaxel 260mg/m^2 and cisplatin 75 mg/m^2,Q3W followed by surgery. Postoperatively, patients achieving aMPR without high-risk factors (positive margins or ENE) received six cycles of adjuvant tislelizumab (radiotherapy-free), others underwent standard postoperative RT or CRT. In the control arm, patients underwent surgery followed by standard postoperative RT or CRT. The primary endpoint was 2-year EFS. Secondary endpoints included ORR, PFS, OS and safety.

Results

As of Sep 6, 2026, 116 patients were recruited (Jun, 2024_ Apr, 2026). 58 subjects were evaluable in the experimental arm and the ORR was 81.03% (47/58). Among them, 55 subjects undergone surgery, yielding a MPR rate of 65.45% (35/55) and a pCR rate of 45.45% (25/55). 9 EFS events occurred (3 suffered PD during neoadjuvant stage, 5 relapsed, and 1 died due to radiotherapy complications, 3 deaths) in the neoadjuvant plus radiotherapy subgroup while 2 EFS events (0 death) occurred in the radiotherapy-frees subgroup. In the control group, 19 EFS events occurred including 8 deaths. Grade ≥3 TRAEs occurred in 25.9% of the patients in the experimental arm and 36.2% in the control group (mainly related to radiotherapy and surgery).

Conclusions

An intensive immuno-neoadjuvant therapy, combined with shorter-cycle immuno-adjuvant therapy in LA-OSCC patients who achieve MPR without high-risk features, may represent a more suitable treatment model, potentially allowing radiotherapy omission in selected responders with better safety and tolerance.

Clinical trial identification

NCT06470217; release date: 06/17/2024.

Legal entity responsible for the study

Shanghai Ninth People's Hospital affiliated to Shanghai Jiao Tong University School of Medicine.

Funding

Shanghai Ninth People's Hospital affiliated to Shanghai Jiao Tong University School of Medicine.

Disclosure

All authors have declared no conflicts of interest.

© European Society for Medical Oncology