



# Systemic oncological treatments for advanced esophageal cancer: an assessment of the existing evidence and controversies about their appropriateness

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#### Background

Advanced esophageal cancer (EC) is a highly aggressive malignancy that poses significant challenges to patients and healthcare providers worldwide.

## Objectives

To comprehensively evaluate systemic oncological treatments (SOT) for advanced EC, examining their effectiveness, safety, and appropriateness based on existing evidence.

### Methods

Part of the broader ASTAC-Study project, this research aims to describe and assess evidence on the efficacy and appropriateness of anticancer drugs in advanced non-intestinal digestive cancers. Esophageal cancer, including gastroesophageal junction, was the focal point. The project comprised three studies: Study 1 conducted

an overview of systematic reviews; Study 2 critically assessed European clinical practice guidelines (CPGs); Study 3 conducted a scoping review and evidence map.

#### Results

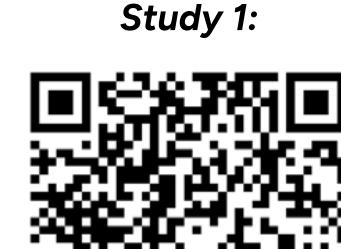
Table 1: ASTAC-Study Advanced Esophageal cancer

Uncertainty about whether systemic oncological treatments (SOT) including

Study 1	Systematic review of systematic reviews	chemotherapy (CT), immunotherapy, biological, and targeted therapy, improve overall survival (OS) and progression-free survival (PFS) over conservative approaches. Most systematic reviews had critically low methodological quality and lacked important outcomes.
Study 2	Critical assessment of European clinical practice guidelines (CPGs)	Low methodological quality in half of the CPGs published since 2010, with a lack of credible recommendations.
Study 3	Scoping review and evidence map	Identified evidence on the efficacy and safety of SOT compared to best supportive care (BSC) for advanced gastroesophageal cancer. Diverse inclusion criteria and inadequate reporting led to heterogeneity in patient prognosis and control arm definition.

#### Conclusions

The available evidence for treating advanced EC patients lacks consistency, leading to discrepancies with recommendations by relevant CPGs. Potential bias may favor the overuse of anticancer drugs over BSC. High-quality research is urgently needed to understand SOT effectiveness versus BSC in managing advanced EC. Enhancing



Study 2:





methodological precision, considering patient preferences, and addressing evidence gaps will contribute to informed clinical decision-making and improved patient outcomes.





### References

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