Invited Commentary

A commentary on “Simultaneous versus staged resection for synchronous colorectal liver metastases: A population-based cohort study". Importance of avoiding any other additional risk in selected patients with synchronous colorectal liver metastases

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Dear Editor,

We read with great interest the article of Dr. Bogach and Colleagues [1], in which they have evaluated trends of resection for synchronous colorectal cancer liver metastases (CRLM) and associated patient outcomes with a retrospective cohort study from 2006 to 2015 in the province of Ontario, Canada.

This subject has received some interest over the last few years especially with the rise of neoadjuvant therapies worldwide and the high incidence of CRLM especially in the last decades [2,3].

Although they have concluded simultaneous resection can be an effective and safe alternative to staged resection for selected patients with secondary liver cancer overlapping patient cohorts with recently published manuscript [4], it is argue to show any remarks after a complex clinical therapeutic option with regard to survival and surgical outcome without a prospective study.

Therefore, this paper is to the point and puts issues in perspective, pointing out a hot topic of hepatic surgery: the impact of simultaneous abdominal operations on the feasibility and outcome of liver resection. This is an elegant and methodologically correct manner to capture the postoperative complication rate at the population level using the widely used Clavien Classification.

Simultaneous resection was shown to be feasible with a similar postoperative complications, but higher postoperative mortality, with poorer long-term survival and oncological outcomes.

In an era in which liver function and primary indication for major and complex liver radical resections are crucial for achieving better results, it appears necessary to conduct prospective randomized trials to clarify how and whether simultaneous versus staged resection for CRLM impacts feasibility and outcome after pre-operative portal vein embolization (PVE) [5].

In this setting, we have analyzed our experience in surgical management after extended hepatectomy (EH) in 59 cases in a southern Italian referral center, over a period of sixteen years. We examined demographics, pre-operative PVE, operative factors, and early post-operative complications, focusing on the results of patients who underwent EH from 1999 to 2007 (P1) and from 2008 to 2016 (P2).

The most common cause for EH was CRLM: 24 patients underwent EH in the P1 period, and 35 in the P2 period. Fifty-four right, and 5 left, EHs were performed. Mean hospital stay was 18.1 (5–107) days, depending on the Clavien Classification [$\geq$IIIa 25.4 $\pm$ 24 vs. <IIIa 10.4 $\pm$ 5.6, $p = 0.01$].

Comparing periods (P1 vs. P2) we found an important increase in the number of PVEs ($p = 0.056$), negative margins ($p = 0.007$), and hospital stay ($p = 0.008$), and a decrease in the need for blood transfusion ($p = 0.04$).

The increase in PVE in select patients, and the lack of association between short-term complications and positive margins, particularly on CRLM, suggest strong consideration of this surgical option to expand selection criteria and clinical management in these groups of patients.

It is interesting to note that no simultaneous resection for CRLM was performed to confirm the importance of avoiding any other additional risk in selected patients.

In this framework, surely, the article presented here by Dr. Bogach helps in finding answers provided by a methodologically correct large retrospective cohort study.

Provenance and peer review

Invited Commentary, internally reviewed.

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