## **Peer Review File**

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1. No data/discussion regarding the prevalence of sarcopenia in gastric cancer? See large data abot the prevalence: 10.1002/jpen.2415.

Reply 1: We appreciate the reviewer's essential suggestions. We inserted the following sentence with recommended reference.

Changes in the text: (Page6, line 12-13) which is not negligible in oncology especially, because its frequency increases by up to 35% in gastric cancer [4]

2. There are already large meta analyses about the prognostic role of sarcopenia/low skeletal uscle mass in gastric cancer. I suggest the authors should cite an discuss previous findings:

doi: 10.1016/j.archger.2021.104534.
doi: 10.3390/jcm9010199;
10.1016/j.clnu.2019.10.021.;
doi: 10.1007/s10120-018-0882-2.
Novelty of your data? It shold more discussed.

Reply 2: We appreciate the reviewer's important comments. We inserted the following sentences and emphasized the novelty of our data with recommended references. Changes in the text: (Page13, line 1-7) Several systematic reviews and meta-analyses have reported the prognostic value of evaluating sarcopenia for postoperative complications and survival in patients undergoing gastrectomy [15-18]. These reviews are for all generations; however, the impact of sarcopenia on postoperative outcomes should be completely different in clinical practice between older patients and the other generations because the physical dysfunctions caused by sarcopenia are more frequently observed in older patients. A review targeted to older patients is in demand by surgeons, but no such reviews have been found thus far.

## 3. Furthermore, please indicate and compare the prognostic role of sarcopenia in curative setting vs palliative setting in gastric cancer (10.1080/01635581.2022.2077387).

Reply 3: We appreciate the reviewer's insightful comments. We inserted and modified the following sentences with recommended references. Changes in the text:

(Page13, line 16-17, Page14, line 1-3) In patients with malignant tumors, sarcopenia accelerates because of metabolic changes such as increased energy expenditure, excess

catabolism, and chronic inflammation, with a prevalence of 39.6% in the curative setting and 49.2% in the palliative setting [4]. In gastric cancer patients, sarcopenia significantly affected long-term outcomes in curative settings like other tumors [22], although the prognostic role of sarcopenia is limited in palliative settings [23].

(Page14, line 3-5) Older patients with gastric cancer are easy to fall into malnutrition because they often experience inadequate dietary intake, leading to poor protein synthesis and subsequent skeletal muscle loss.

## 4. Low skeletal muscle mass predicts treatment related toxicity and treatment response also (there are large meta analyses about the topics).

Reply 4: We appreciate the reviewer's reasonable suggestions. We inserted the following sentences with recommended references.

Changes in the text:

(Page14, line 6-8) Additionally, the low skeletal muscle mass increases chemotherapeutic toxicity, decreases chemotherapeutic efficacy and reduces quality of life [24], which become obstacles to adjuvant chemotherapy administration.

## 5. Finally, a recent report summarizes the relevant effects of sarcopenia in all tumors, also in gastric cancer:

Time to include sarcopenia into the oncological routine.

Eur J Cancer. 2023 Sep;190:112939. doi: 10.1016/j.ejca.2023.112939.

Reply 5: We appreciate the reviewer's kind comments. We reviewed the recommended report and reflected in our manuscript with recommended references.

Changes in the text: (Page14, line 1-3) In gastric cancer patients, sarcopenia significantly affected long-term outcomes in curative settings like other tumors [22], although the prognostic role of sarcopenia is limited in palliative settings [23].