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Letter to the Editor

Evaluation and treatment of iron deficiency, with or without anemia, in enhanced recovery after bariatric surgery[☆]

Evaluación y tratamiento del déficit de hierro con o sin anemia en rehabilitación multimodal de cirugía bariátrica

Dear Editors

The recent publication by Dr. Ruiz-Tovar et al. of the Bariatric Surgery (BS) Working Group of the Spanish Multimodal Rehabilitation Group (*Grupo Español de Rehabilitación Multimodal*, GERM) about a protocol¹ based on the Spanish enhanced recovery in abdominal surgery guidelines (*Recuperación Intensificada en Cirugía Abdominal*, RICA)² and on the clinical pathway for BS³ offers a series of recommendations grouped into 3 stages (pre, peri and postoperative),¹ where there is a significant lack of reference to the evaluation and treatment of anemia or iron deficiency in any of the stages described.

The RICA guidelines include several recommendations for the preoperative management of anemia,² in the same way that the BS clinical pathway recommends evaluating the presence of anemia with a blood count, which is included in the pre-admission workup within the temporal matrix.³ Likewise, the clinical practice guidelines for BS emphasize the detection and preoperative treatment of anemia and trace element deficiencies, including iron.⁴

Anemia is detected in 15–20% of patients who are candidates for BS.⁵ Iron-deficiency, present in up to 50% of these patients, is the main etiological factor of anemia.^{5,6} In addition, morbidly obese patients have a higher prevalence of disease associated with iron deficiency, such as chronic gastritis with or without *Helicobacter pylori* infection, peptic esophagitis, as well as an increased inflammatory status *per se*, which is associated with the restriction of functional iron for erythropoiesis.^{5–7} The presence of pre-BS anemia or iron

deficiency is associated with a greater risk of perioperative complications and a higher occurrence of postoperative anemia in the medium and long term. Therefore, early iron supplementation (intravenous) is recommended before hospital discharge, especially after malabsorptive BS techniques.^{4,5,7}

In conclusion, although the prevalence of anemia in BS is not as high as in other elective abdominal surgeries, it must be evaluated and treated; moreover, surgery may even need to be delayed until it is corrected.⁸ Following the methodology used by the GERM for the application of multimodal rehabilitation measures in colorectal surgery in Spain,⁹ a similar study is planned to analyze BS patients.¹⁰

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Conflict of interests

We have no conflict of interests to declare with regards to the writing of this article.

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