

AB026. PP-5 Petersen hernia— a rare cause of acute abdomen after laparoscopic gastric bypass operation

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Abstract: Petersen's hernia is a rare type of internal herniation and it has been reported in the literature after Laparoscopic Roux-en-Y gastric bypass (LGB) which is one of the most common bariatric surgical methods. A 27-year-old female patient with a history of LGB operation 2 years ago at the outpatient clinic for obesity presented to the emergency department with complaints of abdominal pain, nausea and vomiting persisting for two days. On her physical examination, there was tenderness, with defense and rebound markedly in the upper left quadrant of abdomen. Laboratory tests were unremarkable except for leukocytosis. Abdominal X-ray showed air fluid levels. Abdomen computerized tomography (CT) was compatible with mechanic bowel obstruction. Explorative laparotomy was performed due to signs of acute abdomen and mechanic bowel obstruction. During laparotomy, it was observed that the small intestines herniated into the space between Roux leg and transverse colon mesocolon which called as "Petersen hernia". After reducing the incarcerated small intestines without resection, hernia defect was repaired by non-absorbable suture material. Postoperative follow-up period was unremarkable. The patient was discharged postoperative fifth day without any complication. Internal herniation often presents with non-specific findings. It does not show any clinical findings unless strangulation or incarceration occurs. It is a rare clinical condition that may occur in the early postoperative period and may occur many years later. It has been reported in the literature that the incidence of internal herniation is increased in patients who underwent LGB, which is one of the bariatric surgery methods. These patients often present to the emergency

department with non-specific complaints such as abdominal pain, nausea and vomiting. Abdomen CT with oral and intravenous contrast is important in the diagnosis of the disease. Thickening of intestinal loops, dilated bowel loops, target sign and abnormal clustering of intestinal loops may be helpful in diagnosis. Petersen hernia should be kept in mind in patients with a history of bariatric surgery presenting with abdominal pain. Delays in diagnosis can result in incarceration or strangulation with high mortality and morbidity. In conclusion, closure of meso openings during LGB operations reduces the formation of Petersen hernia that may develop in early and late postoperative periods. It will reduce the mortality and morbidity secondary to Petersen hernia.

Keywords: Laparoscopic gastric bypass; ileus; Petersen hernia; acute abdomen

Provenance and Peer Review: This abstract is included in "Abstracts from the 3rd Turkish National Congress on Bariatric and Metabolic Surgery, 21st-24th November 2019, Antalya-Turkey", which is commissioned by the Guest Editor (Mehmet Mahir Özmen) for the series "Bariatric and Metabolic Surgery" published in *Annals of Laparoscopic and Endoscopic Surgery*. This abstract did not undergo external peer review.

Conflicts of Interest: The authors have completed the ICMJE uniform disclosure form (available at <http://dx.doi.org/10.21037/ales-2019-bms-37>). The series "Bariatric and Metabolic Surgery" was commissioned by the editorial office without any funding or sponsorship. The authors have no other conflicts of interest to declare.

Ethical Statement: The authors are accountable for all aspects of the work in ensuring that questions related to the accuracy or integrity of any part of the work are appropriately investigated and resolved.

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doi: 10.21037/ales-2019-bms-37

Cite this abstract as: Atici SD, Arican C, Uğurlu L, Aydın C. Petersen hernia—a rare cause of acute abdomen after laparoscopic gastric bypass operation. *Ann Laparosc Endosc Surg* 2020;5:AB026.