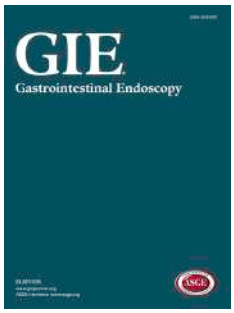

Acute pancreatitis due to intragastric balloon hyperinflation (with video)

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- Barrichello Jr, S and André Veinert: performed the case.
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- Hoff, AC: performed the literature review.
- Thompson, CC: reviewed the case and edited the manuscript.
- All author's approved the final version of this manuscript.

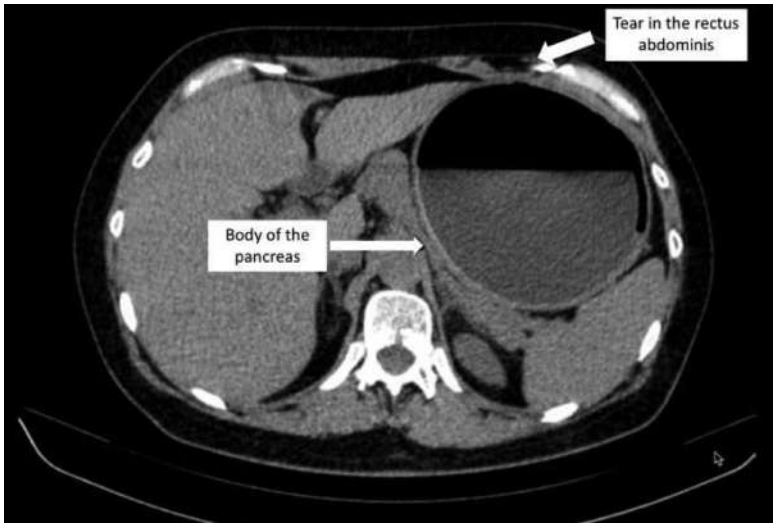
Acute pancreatitis due to intragastric balloon hyperinflation (with video)

We present the case of a 53-year-old woman who underwent intragastric balloon (IGB) placement for obesity (BMI: 30.2 kg/m^2) after failing medical therapy. The IGB was filled with 700 mL of saline solution. On postoperative day 42, she developed severe abdominal pain, without nausea or fever. The patient had bulging of the abdominal wall and presented with diffuse pain and tenderness (A).

Abdominal radiograph showed a hyperinflated IGB (B). Laboratory tests showed elevated C-reactive protein (32 mg/L), amylase (550 u/L) and lipase (1890 u/L), and normal white blood count. CT scan showed a distended IGB (1200 mL), with an air-fluid level, compressing the body of the pancreas with upstream pancreatic duct dilation. Additionally, a tear in the rectus abdominis was seen (C) (Video 1).

An esophagogastroduodenoscopy confirmed hyperinflation, and IGB removal was performed (D). The patient had improvement of symptoms and was discharged on the second day after removal. During follow-up, the patient had an abdominal ultrasound showing no stones or sludge in the gallbladder and no pancreatic duct dilation. Additionally, laboratory tests had normalized.

In summary, hyperinflation can occur, and early diagnosis with IGB removal is essential to avoid severe adverse events.



GIE-D-19-00971R1

Intragastric balloon therapy has come and gone and has now come back again. Many surgeons and gastroenterologists in the United States are now once again placing intragastric balloons as a means of nonsurgically promoting weight loss in their patients. This case illustrates multiple adverse events (rectus abdominus tear, muscle pancreatitis, abdominal distension, etc) due to overinflation of an intragastric balloon.

This patient was treated via removal of the offending overinflated intragastric balloon, which seems reasonable. Another option, if the device would allow it, is a partial deflation to reduce the mechanical pressure on nearby organs, although this was not done in this patient. Despite the benefits of these devices, they do have drawbacks, and every center that places them has seen some therapeutic misadventures. The ideal endoscopic treatment for obesity has yet to be developed, but balloons represent an intermediate step that allows patients to achieve some meaningful success.

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