

A Case of Morgagni Hernia in Adults: An Atypical Presentation

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Abstract: Morgagni hernia is a rare cause of diaphragmatic hernia especially in adults, usually presenting in children. These hernia are usually diagnosed incidentally on routine investigations or due to the obstruction of the herniating viscera or may present with the features of lung compression. Hernia sac usually contains omentum, transverse colon, liver and rarely stomach. Here in this case report, we are going to present a case report of a 70 yr old female presenting with Gastric Outlet Obstruction due to the herniation of stomach into the thoracic cavity through the diaphragm along with the necessary review of literature.

Keywords: Morgagni hernia; diaphragmatic hernia; gastric outlet obstruction; congenital diaphragmatic hernia

INTRODUCTION

Hernia of Morgagni was first described by Giovanni Battista Morgagni, an Italian anatomist and pathologist in 1769, while performing a postmortem examination on a patient who died of a head injury. It is a rare cause of diaphragmatic hernia usually presenting in children, males more than females [1]. These hernia are usually diagnosed incidentally on routine investigations or due to the obstruction of the herniating viscera or may present with the features of lung compression [2, 3]. Hernia sac usually contains omentum, transverse colon, liver and rarely stomach leading to various complications like gastric volvulus, colonic obstruction etc. [4].

CASE REPORT

A 70yr old female presented with the complaints of recurrent vomiting since 8 days and not passing flatus/motion since 2 days. Vomiting was of sudden onset, occurring around 15 minutes after meals. She didn't have any history of similar complaints and no significant medical/surgical history.

On examination, abdomen was soft, distended, and tender. Bowel sounds were present. Air entry was decreased on right side. Xray abdomen erect view revealed air fluid levels in left hypochondrium. X ray chest PA view revealed an air-filled cavity in the right lower lung field continuous with abdominal cavity. Ultrasonography showed distended stomach with stomach seen herniating into the thoracic cavity along with surrounding lung consolidation. On barium meal, stomach (antral and pyloric part) was seen in the right side of chest with contrast not passing into the small

bowel upto 6 hrs suggestive of diaphragmatic hernia with gastric outlet obstruction (Fig. 1). Spirometry revealed severe restrictive lung disease (extrathoracic).

Patient was operated under general anesthesia by upper midline abdominal incision. Stomach and part of colon was herniating into the thoracic cavity via an anterior diaphragmatic hernia (Fig. 2). The hernial contents were reduced and diaphragmatic defect repaired primarily. Patient tolerated surgery well without any undue complication. Postoperative period was uneventful and patient was discharged on 12th day.



Fig 1: Contrast study of the upper GI tract (Barium meal) showing part of GI tract (distal stomach) present in the thoracic cavity

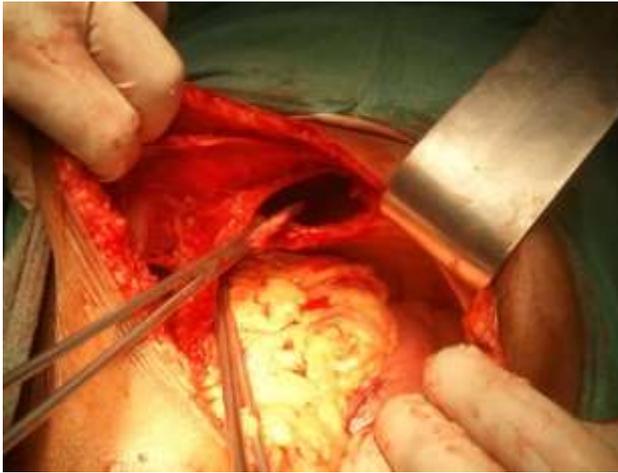


Fig. 2: Intraoperative photograph showing the diaphragmatic defect after reduction of the hernial contents

DISCUSSION

Diaphragmatic hernia are of two types; acquired and congenital. Congenital diaphragmatic hernia is of two types; Bochdalek and Morgagni with the latter being rarest (3-4%) [5]. It is found in the anterior part of the diaphragm and is diagnosed either incidentally on chest radiography or due to the features of strangulation of the herniating viscera (10-15% adult cases) [5].

Till date, only 93 cases of Morgagni hernia in adults have been reported with 81 diagnosed incidentally and 12 due to strangulation and 47 cases in children [6].

Gastric outlet obstruction can be due to peptic ulcer disease, gastric or pancreatic malignancy, caustic ingestion etc. Obstruction due to herniation in the Morgagni hernia is a rare presentation.

Our patient was an old female presenting with a large Morgagni hernia leading to gastric outlet obstruction which is a rare entity to present.

Diagnosis of the above mentioned condition is difficult with radiological findings leading to diagnosis of diaphragmatic hernia. CT scan has been considered as the most important investigation [7].

Treatment comprises of diaphragmatic repair either primarily or by using mesh by either open

transabdominal/ transthoracic or laparoscopic method [8]. Review of literature showed that in acute cases, laparotomy was found to be a preferred approach and in elective cases, laparoscopy was most commonly done [6].

CONCLUSION

Morgagni hernia is a rare type of hernia especially in adult patients but may cause intestinal obstruction and may present as an emergency due to strangulation of the herniating viscera. So this rare entity must be kept in mind when a patient presents with intestinal obstruction and breathing difficulty with characteristic radiological findings.

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