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Case Report

Massive intra-abdominal bleed from ruptured duodenal ulcer following major gynaecological surgery

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A 30-year-old Afro-Caribbean lady with multiple fibroids presented to gynaecology. Since she was keen to maintain her fertility, she was treated conservatively with gonadotrophic releasing agonist hormone (GnRH analogues), ulipristal acetate and uterine artery embolization but the treatments were unsuccessful. Subsequently, she underwent laparotomy and myomectomy of a 22 cm fibroid uterus with massive blood loss, needing blood transfusion. She was readmitted 10 days later, generally feeling unwell with abdominal pain and was noted to be profoundly anaemic. Provisional diagnoses of intra-abdominal bleed, sepsis, degeneration of remaining fibroids was suspected. With the help of multidisciplinary team including the general surgeons and radiologists, she was diagnosed to have ruptured duodenal ulcer and underwent a relaparotomy with under-running of ruptured duodenal ulcers. She made a protracted recovery with further complication of wound abscess. This highlights the importance to consider gastrointestinal bleed from ruptured stress ulcer after major surgery, although rare in gynaecology.

Key words: Fibroid, ulipristal, myomectomy, duodenal ulcers, haemorrhage

INTRODUCTION

Use of non-steroidal anti-inflammatory drugs (NSAIDs) is recognised as a common cause of peptic ulcer disease. As many as 30% of adults taking NSAIDs have gastrointestinal adverse effects and there is an increased risk with female sex and those with obesity. Severe physiological stress like major surgery is also known to increase the risk for secondary (stress) ulceration.

Although there was no known history of prolonged use of NSAIDs in this case but during her re-admission she was prescribed diclofenac sodium, a strong NSAIDs. This case report describes the challenges of diagnosis of intra-abdominal bleeding following a major gynaecological surgery due to another coincidental surgical cause.

CASE PRESENTATION

A 30-year-old Afro-Caribbean woman presented to the gynaecology clinic with a long-standing history of heavy menstrual bleeding. She was obese, known to have chronic hepatitis secondary to hepatitis B infection and chronic anaemia. She had one previous vaginal delivery and was contemplating further pregnancies in the future.

Pelvic ultrasound demonstrated multiple uterine fibroids, largest measuring around 10 cm with distortion of the endometrial cavity. Heavy periods were controlled initially with a 3 month course of GnRH analogues which made her amenorrhoeic although there was no shrinkage in the size of the fibroids. Later she had uterine artery embolization which was unsuccessful. She was also prescribed a course of ulipristal acetate, a synthetic selective progesterone receptor modulator, again showing no effect on the size of the fibroids.

Since she wanted fertility sparing procedure, she was counselled and consented for open abdominal myomectomy surgery. On imaging she was noted to have bilateral mild hydronephrosis secondary to distal ureteric compression, so prophylactic pre-procedure bilateral ureteric stenting was performed. She underwent midline laparotomy and myomectomy of a 22 cm ibroid with 3 litres of blood loss, requiring 6 units of blood transfusion, HDU admission and was discharged after 10 days on oral iron supplementation.

Within 10 days of discharge, she had emergency re-admission with nausea, vomiting, pain abdomen and generally feeling unwell. The diagnostic dilemma was between sepsis,

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degeneration of remaining small fibroids or possible intra-abdominal bleeding. She continued to deteriorate clinically despite conservative measures, with a notable drop in haemoglobin levels. However, 2 days following admission she became extremely anaemic with haemoglobin of 4 g/L with history of dark coloured stool. Again, the diagnostic dilemma was between stool colour due to oral iron intake or upper gastro-intestinal bleeding following use of diclofenac NSAIDs. She was rushed to ITU with a provisional diagnosis of GI bleed once reviewed by the general surgeons. On the same day she underwent laparotomy under the surgical team who identified and repaired the actively bleeding duodenal ulcers. Post-operative period was complicated with sepsis secondary to wound infection, for which she underwent CT guided drainage of abdominal wound abscess. Following this she went on to have slow protracted phase of recovery.

The patient was eventually discharged after a month of second admission. She was followed up in the gynaecology outpatient' clinic at 3 months. She recovered fully and a year later consulted again regarding her fertility prospects. She was informed of the high risks and the possibility of tubal factor infertility.

CONCLUSION

In the event of secondary stress ulcer, perforation is an uncommon complication following surgeries like gastric bypass. There have been reports on gastro-intestinal bleeding from stress ulcers postoperatively following gastrointestinal surgeries and liver or renal transplantations (Hori, 1978, Ngom, et al., 2008, Salvi 1998). Literature is also available regarding bleeding from stress ulcers following major stresses like prolonged ITU admission (Singhi, 2013). natural calamities like earthquakes (Singhi, 2013) prolonged hospital admissions for infections like pneumonia (Tabasco-Minguillán, 1997). and post-rubella complications (Trobo, 1994). This can be managed with conservative or surgical measures, depending on the clinical situation (Yamanaka, 2013, Weber, 1977, Zerey, 2008). No preoperative factors were predictors of peptic ulcer disease, including body mass index, age, gender or co-morbidities. When these do occur, most often lead to life threatening situations. Diagnosis of a surgical condition that is completely different to the case in question sometimes is not easy to make. In this case, initially the line of thought on her readmission was mostly complications related to her myomectomy surgery like sepsis, collection or intra-abdominal bleeding, degeneration of remaining fibroids or paralytic ileus. Even the significant history of dark coloured stools was thought to be related to oral iron consumption. Imaging also did not provide any confirmatory diagnosis. However, multidisciplinary collaboration allowed the surgeons to review her and provisional diagnosis of upper gastro-intestinal bleeding was made. She was booked for an urgent endoscopy but in view of her deterioration and significant anaemia exploratory laparotomy was carried out.

Our case describes the challenges to diagnosis conundrum and a reminder that gastro-intestinal bleeding following NSAIDs use and following major gynaecological surgery should be kept in mind. Although rare, major gynaecological surgeries are by no means an exception and particular consideration should be given to the possibility of bleeding from ruptured stress ulcer. This emphasizes the need for a holistic approach while dealing with similar clinical situations and try to avoid NSAIDs as this may precipitate gastrointestinal bleeding. When faced with the possibility of hemodynamically decompensated patient with suspicion of intra-abdominal bleed, there is a need for early identification and appropriate multidisciplinary team management involving gynaecologist and general surgeon to ensure patient safety and appropriate management.

CONFLICTS OF INTEREST

None

REFERENCES

1. Hori K, Mitsuno T(1978).The surgical management of massive gastro-intestinal hemorrhage due to stress ulcer following surgery. Int Surg. 63:39-44.
2. Ngom G, Diouf ML, Fall M, Konaté I, Sankalé AA, Diop M et al. (2008). Perforation and haemorrhage duodenal bulbar ulcers in a child: a case report. Dakar Med.53:28-31.
3. Salvi G, Mattei R, Pampaloni F, Calabri GB, Cristiano R, Calabri G (1998). Gastroduodenal stress ulcer: A pediatric case report. Pediatr Med Chir.20:349-5.
4. Sarosdy, MF, Anatolio BC, Robert S, Harold VG, William D, Lynn HB (1985). Upper gastrointestinal bleeding following renal transplantation. Urology. 26: 347-350.
5. Singhi S, Jain P, Jayashree M, Lal S (2013). Approach to a child with upper gastrointestinal bleeding. Indian J Pediatr. 80:326-33.
6. Tabasco-Minguillán J, Jain A, Naik M, Weber KM, Irish W, Fung JJ, Rakela J, et. al(1997). Gastrointestinal bleeding after liver transplantation.Transplantation. 63: 60.
7. Trobo JI, Lorente L, Aller MA, Durán MC, Betriu C, Arias J (1994). Hemorrhagic gastroesophageal ulceration by pulmonary infection in extrahepatic cholestatic pigs. J Med. 25: 251-4.
8. Yamanaka K, Miyatani H, Yoshida Y, Asabe S, Yoshida T, Nakano M, Obara S, Endo H, (2013). Hemorrhagic gastric and duodenal ulcers after the great east japan earthquake disaster. World J Gastroenterol. 19: 7426.
9. Weber E, Akovbiantz A, Landolt M, Koeltz HR, Nussbaumer U, Peter P, Blum AL(1977). A prospective study of post-operative bleeding from stress lesions I Epidemiology. Dtsch Med Wochenschr. 102: 152-155.
10. Zerey M, Sigmon LB, Kuwada TS, Heniford BT, Sing RF(2008). Bleeding duodenal ulcer after Roux-en-Y gastric by pass surgery. J Am Osteopath Assoc. 108: 25-27.