Case Report

DOI: 10.5455/2320-6012.ijrms20140843

Spontaneous cholecystocutaneous fistula: still a complication of gallstones

Bappaditya Har*, Rounak Shinde, Abhishek Prasad, Bitan Kumar Chattopadhyay

Department of General Surgery, IPGMER & SSKM Hospital, Kolkata-700020, West Bengal, India

Received: 18 May 2014 **Accepted:** 10 June 2014

*Correspondence: Dr. Bappaditya Har,

E-mail: adi.bappaditya7@gmail.com

© 2014 Har B et al. This is an open-access article distributed under the terms of the Creative Commons Attribution Non-Commercial License, which permits unrestricted non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

ABSTRACT

Inspite of the tremendous improvement in early diagnosis and treatment of gallstones patients still present with spontaneous cholecystocutaneous fistula. With the introduction of widespread use of ultrasonography for diagnosis & laparoscopic cholecystectomy, it has now become a rare complication. Over the past 50 years fewer than 20 cases has been reported. We report here, a case presenting with discharging opening in anterior abdominal wall with intermittent expulsion of stones.

Keywords: Fistula, Gallstone, Biliary fistula

INTRODUCTION

Gallstones can present in different ways. It may present with biliary colic, acute cholecystitis, chronic cholecystitis, obstructive jaundice & even gallstone ileus. Though reports of spontaneous cholecystocutaneous fistulae have been found in medical literature dating back to the 17th century, spontaneous cholecystocutaneous fistula is now one of the rarest presentations. Patients are usually female at their 5th decade presents with a localised abscess that rupture to produce a fistula. Gradually, stones may come out through the external opening. Ultrasonography & fistulogram may help in diagnosis & should be treated early.

CASE REPORT

A 52 years old lady presented with spontaneous discharging opening 2 cm above the umbilicus with intermittent expulsion of stones (Figure 1). On further query, she had an erythematous lesion over the same site for the last 7 day & on rupture of the lesion the discharging opening has formed. Liver function tests

were normal. Ultrasonography showed contracted gallbladder packed with stones and a tract communicating with the skin, also containing stones (Figure 2).



Figure 1: External fistulous opening few cm above the umbilicus.



Figure 2: Ultrasonography showing contracted gallbladder packed with stones and a tract communicating with the skin, also containing stones.

Ultrasonography guided insertion of a fine catheter through the external opening was done & a fistulogram performed. It showed the tract is continuous with the gallbladder & packed with stones (Figure 3). The patient was treated with open chloecystectomy along with excision of the fistulous tract (Figure 4). Histopathology came to be chronic calculous cholecystitis with chronic inflammatory infiltrate along the fistulous tract.



Figure 3: Fistulogram showing the tract is continuous with the gallbladder & packed with calculi.



Figure 4: Post cholecystectomy specimen along with the fistulous tract.

DISCUSSION

Spontaneous cholecystocutaneous fistula was a common complication of gallstones until the beginning of twentieth century and a total 226 cases have been reported till now. It has become a rare complication of chronic calculus cholecystitis because currently gallstones are diagnose & treated at early stage. Most patients are females in fifth decade of life and an erythematous lesion may be the only presenting sign. It has been suggested to be associated with polyarteritis nodosa, trauma, typhoid and drug treatment.

Chronic bile outflow obstruction increases intragabladder pressure, decreases gallbladder perfusion proportionally and leads to necrosis and perforation of the gallbladder.² Once gallbladder becomes perforated, it may drain into the peritoneal cavity, adjacent viscera or adhere to the abdominal wall to form an external fistula. Most frequently, external biliary fistulae drain via an external opening in the right upper quadrant, however umbilicus, right groin, anterior chest wall and the gluteal region have also been report.³ Ultrasonography and fistulogram are presently the imaging modalities for diagnosing this complication. However, magnetic resonating cholangio pancreaticogram may be helpful for diagnosis. If it presents early with an abscess, drainage with proper antibiotic is the initial treatment of choice. Subsequently, elective cholecystectomy with excision of the fistulas tract has been suggested as a definitive treatment modality. However, a percutaneous treatment may be considered in high-risk patients.3 Malik et al. described an different approach that involves the laparoscopic removal of the gallbladder and dissection but without excision of the fistula from the abdominal wall.4 This approach may provide an alternative option to open excision of the fistula for co-morbid elderly patients

Funding: No funding sources Conflict of interest: None declared Ethical approval: Not required

REFERENCES

- 1. Yüceyar S, Ertürk S, Karabiçak I, Onur E, Aydoğan F. Spontaneous cholecystocutaneous fistula presenting with an abscess containing multiple gallstones: a case report. Mt Sinai J Med. 2005;72:402-4.
- 2. Urban CA, Urban LABD, Lima RS, Bleggi-Torres LF. Spontaneous combined internal and external biliary fistulae in association with gallstones and gliomatosis of the gallbladder. Rev Bras Cancerol. 2001;47:273-6.
- 3. Davies MG, Tadros E, Gaine S, McEntee GP, Gorey TF, Hennessy TP. Combined internal and external biliary fistulae treated by percutaneous cholecystlithotomy. Br J Surg. 1989;76:1258.
- 4. Malik AH, Nadeem M, Ockrim J. Complete laparoscopic management of cholecystocutaneous fistula. Ulster Med J. 2007;76:166-7.

DOI: 10.5455/2320-6012.ijrms20140843 **Cite this article as:** Har B, Shinde R, Prasad A, Chattopadhyay BK. Spontaneous cholecystocutaneous fistula: still a complication of gallstones. Int J Res Med Sci 2014;2:1194-6.