



A RARE CASE OF PERITONEAL TUBERCULOSIS MIMICKING OVARIAN CARCINOMA

Tejinder Pal singh Sodhi, Maneshwar Singh Utaal, Kirti Savyasacchi Goyal* and Sameer Pundeer

Department of General Surgery, MMIMSR, Deemed to be University-Mullana, Ambala, Haryana, India

ARTICLE INFO

Article History:

Received 6th June, 2019

Received in revised form 15th July, 2019

Accepted 12th August, 2019

Published online 28th September, 2019

Key words:

Peritoneal tuberculosis, ovarian carcinoma, laparotomy

ABSTRACT

Peritoneal tuberculosis may present from mild pain abdomen to more complex presentations as that of intestinal obstruction. They remain a diagnostic and treatment challenge to the surgeon. A thorough history and physical examination along with imaging modalities such as ultrasound, CT- scan abdomen and histopathological investigations like FNAC and biopsy aids the surgeon in making the diagnosis in majority of cases. There have been reported similar cases but mostly were diagnosed after laparotomy. Thus in a case presenting with ascitis, pain abdomen, bulky adnexa, raised CA-125 and negative microbiology and histology; the differential diagnosis of peritoneal tuberculosis should always be borne in mind.

Copyright©2019 Tejinder Pal singh Sodhi et al. This is an open access article distributed under the Creative Commons Attribution License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited.

INTRODUCTION

A patient with abdominal distension, loss of appetite and weight, ascites, bulky ovaries, mesenteric lymphadenopathy, raised CA-125 fits quite well into the diagnosis of ovarian carcinoma. But as we learnt peritoneal tuberculosis mimics it just right. Peritoneal tuberculosis may present from mild pain abdomen to more complex presentations as that of intestinal obstruction. They remain a diagnostic and treatment challenge to the surgeon. A thorough history and physical examination along with imaging modalities such as ultrasound, CT- scan abdomen and histopathological investigations like FNAC and biopsy aids the surgeon in making the diagnosis in majority of cases. There have been reported similar cases but mostly were diagnosed after laparotomy.¹⁻³ Here we present a case of peritoneal tuberculosis mimicking ovarian carcinoma which we were able to diagnose and manage conservatively without surgical intervention, thus saving the patient from unnecessary laparotomy.

CASE REPORT

A 40 year old woman came to our opd with only complaint of pain abdomen since 3 months. There were 4-5 episodes of pain per day, each episode lasting for 15-20 minutes, severe intensity which used to aggravate after taking food and relieve spontaneously, no diurnal variation of pain and no specific character. There was history of loss of appetite and loss of approximately 10 kg weight in last 3 months. There was no associated complaints of fever/vomiting/diarrhea/constipation. She had Hb-9.8gm/dl, TLC-12000/cumm.

CA-125 on presentation was 648.70 U/ml. USG abdomen was suggestive of ascites with marked peritoneal and omental thickening with abdominal lymphadenopathy. CECT abdomen showed bulky ?bilateral adnexa with significant ascites with peritoneal, omental and mesenteric deposits causing diffuse wall thickening and clumping of small bowel loops with ?metastatic lymphadenopathy ?malignant ovarian tumor(mucinous epithelial tumor) with peritoneal carcinomatosis. Ascitic fluid analysis showed 100% lymphocytes and negative for mycobacterium as well as malignant cells, ADA of ascitic fluid was 81.6U/L. USG guided FNAC of mesenteric lymph node was suggestive of lymphohistiocytic clusters and few lymphoid cells but was negative for mycobacterium bacilli. Patient was transferred to oncology and gynecology departments as ovarian carcinoma was suspected. Patient was discharged and asked to follow up after a week. CA-125 was repeated which was found to have decreased to 243.3U/ml and endometrial biopsy was inconclusive. As a result alternate diagnosis of peritoneal tuberculosis was suspected and patient was started on ATT. A week after the ATT had been started, patient reported relief in pain abdomen and improved appetite.

***Corresponding author: Kirti Savyasacchi Goyal**

Department of General Surgery, MMIMSR, Deemed to be University-Mullana, Ambala, Haryana, India

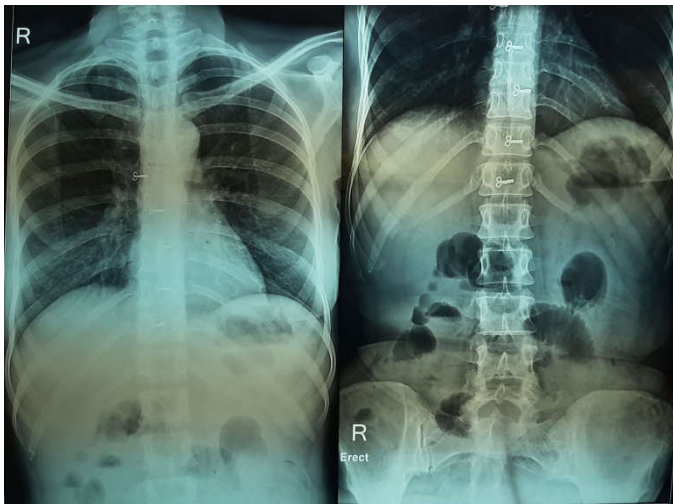


Figure 1 X-rays of chest(AP view) and abdomen(erect)

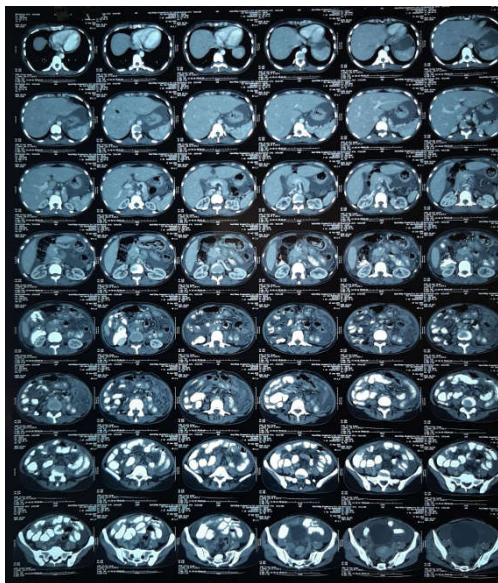


Figure 2 CECT abdomen (axial sections)

USG/CT guided FNAC of large mesenteric lymph nodes helps to pin point diagnosis or rule out the differentials.⁶⁻⁷

CONCLUSION

In a case presenting with ascites, pain abdomen, bulky adnexa, raised CA-125 and negative microbiology and histology; the differential diagnosis of peritoneal tuberculosis should always be borne in mind.

References

1. Devi L, Tandon R, Goel P, Huria A, Saha PK. Pelvic tuberculosis mimicking advanced ovarian cancer. *Doct.* 2012;42(3):144-146. doi:10.1258/td.2012.120076.
2. Oge T, Ozalp SS, Yalcin OT, Kabukcugolu S, Kebapci M, Arik D, Isikic T. Peritoneal tuberculosis mimicking ovarian cancer. *Eur J Obstet Gynecol Reprod Biol.* 2012;162(1):105-108. doi:10.1016/j.ejogrb.2012.02.010.
3. Xi X, Shuang L, Dan W, Ting H, Han MY, Ying C, Quan M, Sun C, Chen Z, Cui F, Ming C, Zhou JF, Xuan WS, Lu YP, Ma D. Diagnostic dilemma of abdominopelvic tuberculosis: a series of 20 cases. *J Cancer Res Clin Oncol.* 2010;136(12):1839-1844. doi:10.1007/s00432-010-0842-7.
4. Shen-Gunther J, Mannel RS. Ascites as a predictor of ovarian malignancy. *Gynecol Oncol.* 2002;87(1):77-83. doi:10.1006/gyno.2002.6800.
5. Riquelme A, Calvo M, Salech F, Valderrama S, Pattillo A, Arellano M, Arrese M, Soza A, Vivani P, Letelier LM. Value of adenosine deaminase (ADA) in ascitic fluid for the diagnosis of tubercular peritonitis: a meta-analysis. *J Clin Gastroenterol.* 2006;40(8):705-710. doi:10.1097/00004836-20060900-00009.
6. Piura B, Rabinovich A, Leron E, Yanai-Inbar I, Mazor M. Peritoneal tuberculosis mimicking ovarian carcinoma with ascites and elevated serum CA-125: case report and review of literature. *Eur J Gynaecol Oncol.* 2002;23(2):120-122.
7. Uzunkoy A, Harma M. Diagnosis of abdominal tuberculosis: experience from 11 cases and review of the literature. *World J Gastroenterol.* 2004;10(24):3647-3649.

DISCUSSION

The case treated by us was that of peritoneal tuberculosis which was initially misdiagnosed to be advanced ovarian carcinoma. The signs and symptoms of peritoneal tuberculosis which includes pain abdomen, loss of appetite and weight, abdominal distension, ascites are also seen in cases of advanced ovarian carcinoma⁴. This may lead to unnecessary laparotomy if not carefully further evaluated.

Also CA-125 has been shown to lack specificity for ovarian carcinoma and increased levels are also seen in endometriosis, diverticulitis, pancreatitis, IBD, and also peritoneal tuberculosis.

Ascitic fluid analysis with raised ADA may help but detection of mycobacterium bacilli has high false negative rates.⁵ Pulmonary findings may not be present in cases of abdominal tuberculosis and thus chest x-ray was not useful. CECT abdomen provides additional information as in amount of ascitic fluid, focal mass, lymph nodes, status of adnexa which aids in diagnosis.
