A case of abdominal enteric cyst in China

Ya-hong Chen a, Zhe Lv b, Zhen Shen a, Yan Chen b, Hai-cheng Gao b,∗

a Department of Gastrointestinal surgery, China-Japan Union Hospital of Jilin University, Changchun, 130041, China
b Department of Clinical Pharmacy, Jilin University School of Pharmaceutical Sciences, Changchun, 130021, China

ARTICLE INFO
Article history:
Received 15 February 2017
Received in revised form 20 February 2017
Accepted 20 February 2017
Available online 24 February 2017

Keywords:
Abdominal enteric cyst
Laparoscopic surgery
Treatment
Surgery

ABSTRACT
To investigate a case of abdominal enteric cyst in China. The patient was admitted to the china-Japan
Friendship Hospital of Jilin University, which was due to intermittent pain in the left side for the last 4
months. In this surgery, CT was used to diagnose the basic condition of the patient. Surgery was used for
Treatment of patients with diseases. As soon as patients have been successfully operated by laparoscopic
surgery.
© 2017 The Authors. Published by Elsevier Ltd on behalf of IJS Publishing Group Ltd. This is an open
access article under the CC BY-NC-ND license (http://creativecommons.org/licenses/by-nc-nd/4.0/).

1. Introduction
Abdominal enteric cyst is the cystic mass [1]. It is produced from
foregut ectopic embryonic residual organization [1]. It may occur in
any part of human body. It is relatively rare in clinical [2]. Such dis
deases occur in the spinal canal and intracranial in the vast majority
[3]. Abdominal enteric cyst constrict nerve root compression, which
lead to nerve root pain [4]. In addition, a few of abdominal enteric
cyst occur in the mediastinum, chest, abdominal, and so on [5].
In the paper, abdominal enteric cyst was treated by laparoscopic
surgery in china.

2. Case report
Female patient was thirty-six years old. She was admitted to the
china-Japan Friendship Hospital of Jilin University, which was due to
intermittent pain in the left side for the last 4 months. There was
no significant change in the course of the disease, such as palpi
tations, shortness of breath, no cough, sputum, no urinary frequency,
urgency and dysuria, and so on. The left abdomen found a mass. Its
size was about 7 cm × 3 cm (Fig. 1). The border of mass was unclear,
irregular shape, poor mobility. Its relationship was unclear with the
surrounding tissue. The patient’s abdomen was no tenderness, no
rebound tenderness and muscle tension.

3. Auxiliary examination
Cystic low density shadow was found in left abdomen
descending Colon by abdominal CT (Fig. 2). Its size was about
1.3 cm × 4 cm × 7 cm. The wall of Cystic low density shadow was
thick and coarse. In addition, its surrounding fat tissue was slightly
turbid. It was similar to the descending colon in local tissue. Edge of
the spleen and adjacent peritoneum boundary was unclear. There’s
an obvious thickening in local peritoneal.

4. Treatment
The patient was diagnosed with abdominal mass by patient
symptoms, signs and auxiliary examination. Laparoscopic explo
ration was used in this patient. The patient found a dumbbell-
shaped tumor in the descending colon (Fig. 3), and its size was
15 cm × 7 cm × 7 cm. Dumbbell-shaped tumor was characterized
by soft, cystic, smooth surface, clear boundary. Dumbbell-shaped
tumor was removed with a 3 cm by surgery.

5. Postoperative pathology
Dumbbell-shaped tumor was cut open, which saw the end of the
capsule inside the brown viscous liquid. One end of the capsule saw
the light yellow clear liquid (Fig. 4). The capsule was chronic inflam
nation with bleeding and calcification, and didn’t see epithelial
cells, cholesterol crystals.

6. Discussion
Enteric cysts were first reported in 1928 by Kubie and Ful
ton [6,7]. The disease can occur at any site or tissue of the body

∗ Corresponding author.
E-mail address: gaohc19814271@126.com (H.-c. Gao).

http://dx.doi.org/10.1016/j.ijscr.2017.02.036
2210-2612/© 2017 The Authors. Published by Elsevier Ltd on behalf of IJS Publishing Group Ltd. This is an open access article under the CC BY-NC-ND license (http://creativecommons.org/licenses/by-nc-nd/4.0/).
The study found that most of the disease occur in the central nervous system such as the spinal canal and intracranial [8]. At present, the incidence of children and adolescents is higher and the incidence of males is higher than that of females [9]. It is the performance of the corresponding parts on the nerve root pain in clinical [4]. It can self-mitigation, recurrent. In addition, there are the corresponding feeling and movement disorders. The study found that the rest of the intestinal cysts can occur in the mediastinal, thoracic, abdominal and other parts. It is rare in the abdominal cavity. As the same time, it was gradually increased with the tumor volume. Thus, it could oppress the adjacent organs and produce the corresponding symptoms. It is reported that there is no specific clinical examination of peritoneal intestinal cysts. Abdominal color Doppler ultrasound or abdominal CD can be effectively found intraperitoneal cystic mass. In this experiment, Abdominal color Doppler ultrasound or abdominal CD results showed one side of the capsule wall was the lining of the epithelial gland. The side of the wall was mostly smooth muscle tissue. Finally, the cysts were successfully removed by laparoscopy, the patients had been effectively treated by surgery. The work has been reported in line with the SCARE criteria [10].

7. Conclusion
In short, the aim was to provide a fast and comfortable treatment for patients suffering from this disease worldwide.

Consent
Written informed consent was obtained from the patient for publication of this Case report and any accompanying images. A copy of the written consent is available for review by the Editor-in-Chief of this journal. Patients and their families have been informed consent.

Competing interests
The authors have no conflicts of interests.

Authors’ contributions
All authors read and approved the final manuscript.

Authors’ information
Not applicable.

Ethical approval
This case has been informed by patients and their families.

Guarantor
Shen Zhen.
Source of funding

China–Japanese Friendship Hospital, Jilin University.

Acknowledgement

Thanks are due to our general surgery colleagues.

References

[1] S.H. Ranganath, E.Y. Lee, R.L. Eisenberg, Focal cystic abdominal masses in pediatric patients, AJR Am. J. Roentgenol. 199 (1) (2012) W1–W16.
[2] H.H. Al-Qahtani, Enteric duplication cyst as a leading point for ileoileal intussusception in an adult: a rare cause of complete small intestinal obstruction, World J. Gastrointest. Surg. 8 (6) (2016) 472–475.
[3] Z. Dokumcu, O. Uygun, T. Turhan, et al., Two-stage approach in the management of thoracic neuroenteric cyst with spinal extension: thoracoscopic excision following dorsal laminectomy, Childs Nerv. Syst. 31 (2) (2015) 185–189.
[4] J.Y. Lee, M. Shuster, H. Duran, et al., Enteric cyst and recurrent abdominal pain in an adult, J. Med. Soc. N. J. 72 (2) (1975) 141–144.
[5] H. Setty, K.K. Hegde, V.N. Narvekar, Neuroenteric cyst of the posterior mediastinum, Australas. Radiol. 49 (2) (2005) 151–153.
[6] L.S. Kubie, J.F. Fulton, A clinical and pathological study of two teratomatous cysts of the spinal cord containing mucus and ciliated cells, Surg. Gynecol. Obstet. 47 (1928) 297–311.
[7] D.G. Harriman, An intraspinal enterogenous cyst, J. Pathol. Bacteriol. 75 (2) (1958) 413–419.
[8] J.L. Baumann, C. Patel, Enteric duplication cyst containing squamous and respiratory epithelium: an interesting case of a typically pediatric entity presenting in an adult patient, Case Rep. Gastrointest. Med. 2014 (2014).
[9] S.A. Weber, G.F. Ferrari, Incidence and evolution of nasal polyps in children and adolescents with cystic fibrosis, Braz. J. Otorhinolaryngol. 74 (1) (2008) 16–20.
[10] R.A. Agha, A.J. Fowler, A. Saetta, I. Barai, S. Rajmohan, D.P. Orgill, the SCARE Group, The SCARE Statement: consensus-based surgical case report guidelines, Int. J. Surg. 34 (2016) 180–186.

Open Access

This article is published Open Access at sciedirect.com. It is distributed under the IJSCR Supplemental terms and conditions, which permits unrestricted non-commercial use, distribution, and reproduction in any medium, provided the original authors and source are credited.