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Original Research Paper

General Surgery

CHOLEDOCHAL CYST: VARIED PRESENTATION

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ABSTRACT Aim- To analyse different presentation of Choledochal cyst in different age group and management Introduction- Choledochal cyst is a rare disease of the biliary tract. It has been classified on the basis of anomalous unuions(Komi classification) and their anatomical location (Todani classification). Type 1 is the most common type . The etiology of Choledochal cyst still remains unclear. The CT,MRCP and ERCP are important techniques for diagnosis and choice of management. Materials and methods- A retrospective review of the records of all the patients with biliary disease admitted and managed at RIMS, Ranchi in our unit in department of general surgery. Data regarding age of presentation, investigation, management and follow up were analysed. Result- In one year from July 2021 to July 2022 out of 142 cases of biliary diseases 4 were Choledochal cyst, presenting in young, adult and elderly age group with different manifestations. All underwent Hepaticojejunostomy. Conclusion- Choledochal cyst should be considered in the differential diagnosis in all patients with history of biliary colic pain, intrabiliary calculosis ,mechanical jaundice and dialatation of bile duct especially in younger patients.

KEYWORDS : Abdominal pain, choledochal cyst, hepaticojejunostomy

INTRODUCTION:

A Choledochal cyst is a congenital anomaly of the bile duct. This is a rare disease of the biliary tract. Biliary cysts are considered a premalignant condition requiring surgical intervention. Commonly diagnosed in infancy but may present in adulthood.

Classification

Choledochal cyst has been classified on the basis of anomalous unions (Komi classification) and their anatomical locations (Todani classification)

Type 1- Most common type, involves only the extrahepatic biliary tree and usually a fusiform dilation.

Type 2-A saccular diverticulum off the common bile duct.

Type 3-Cystic dilation of intramural common bile duct also known as choledochoceles.

Type 4- a) Cysts involving both intrahepatic and extrahepatic biliary tree.

b) Multiple cysts limited to the extrahepatic biliary tree.

The common presenting symptoms are nonspecific and diagnosis is achieved by various imaging techniques (CT,MRCPERCP) of which ERCP being the best as it's more useful for defining the distal biliary tree and pancreatic ductbile duct junction.

AIM AND OBJECTIVES

AIM-

To analyse different presentation of Choledochal cyst in different age group and management.

Objective-

- 1. To study presentation of Choledochal cyst in different age group
- 2. To study variation in line of management with variation in presentation

MATERIALS AND METHODS

A retrospective review of records of all the patients with biliary disease admitted and managed at RIMS,Ranchi in our unit in department of general surgery. Data regarding age of presentation, type of presentation, investigation, management and follow up were analysed.

Type of study- Observational study Place of study-RIMS,Ranchi

Case Presentation

1. Khelabala devi, 60yr/F

C/O-Pain Rt upper abdomen for 20 days. She developed pain at Rt hypochondrium and epigastric region which was colicky and not radiating to any site, there was also complain of dyspepsia.

G/E-No positive finding present.

P/A-Soft,NT,No lump palpable

INV-Total and direct bilirubin were normal,GGT-200,ALP-170,Other liver enzymes normal. MRCP- Choledocholithiasis leading to dilated proximal CBD (2.5mm).

Management- Rt subcostal laparotomy done and Choledochal cyst found, Roux-en-y Hepaticojejunostomy done

2. Purushottam Kumar 18 yr male

C/O- Pain Rt upper abdomen for 2 months(dull aching, gradually increasing in intensity for 1 month),Jaundice for 1 month,Itching for 1 month

H/O one episode of fever with chills 2months back,No history of jaundice earlier.

G/E-Icterus present, scratch marks all over body

P/A-Soft,NT,No lump palpable

INV -T.Bil- 18.2, D.Bil- 13.9, ALP- 326, other liver enzymes normal, MRCP-a large well defined tubular cystic lesion in the right hypochondrium and lumbar region involving porta hepatis with inferior extension up to head and neck region of pancreas.

Management-Exploratory laparotomy +Choledochal cyst excision +Roux-en-y Hepaticojejunostomy + cholecystectomy.



Figure 1. MRCP of choledochal cyst (patient-Purushottam Kumar).



Figure 2. Type 1 Choledochal Cyst



Figure 3. Choledochal Cyst

3 Mahi Kumari 10/F

C/O-Pain Rt upper abdomen for 10 days(similar one episode 10 days back), Jaundice for 10 days, fever for 4 days

G/E-Icterus present

P/A-soft, mild tenderness over epigastrium, fullness in Rt hypochondrium (No obvious lump palpable).

INV- T.Bil- 8.76, D.Bil- 5.76, ALP- 375, other liver enzymes normal, MRCP-

Diffuse saccular dilatation of CBD.

Management-Exploratory laparotomy+cyst excision+ Hepaticojejunostomy

4. Pintu Kumar Rawat, 28 yr/M C/O Pain Rt upper abdomen for 1 month, no history of jaundice

G/E -No positive findings

P/A-Soft ,NT,No lump palpable

INV- IFT normal, MRCP- Tubular cystic dilatation of extrahepatic bile duct.

Management- Exploratory laparotomy + Cyst excision + Hepaticojejunostomy

RESULT

Total number of cases of Choledochal cyst-4

S.no.	Presentation	No. of cases
1 Pain Rt upper abdomen		4
2 Lump Rt hypochondrium		1
3	Jaundice	2
S.no.	Age of presentation	cases
1	1-10	1
2	10-20	1
3	21-30	1
4	>30	1

In one year from July 2021 to July 2022 out of 142 cases of biliary diseases only 4 were Choledochal cyst, presenting in young, adult and elderly age group with different manifestations with pain Rt upper abdomen being the common one and only 50% cases having obstructive features.All underwent Hepaticojejunostomy.

CONCLUSION

Choledochal cyst should be considered in the differential diagnosis in all patients with history of Rt upper quadrant pain, intrabiliary calculosis, mechanical jaundice and a high index of suspicion is required if there is marked dilatation of CBD.

REFERENCES:

- ALONSO-LEJ F, REVER WB, PESSAGNO DJ. Congenital choledochal cyst, with a report of 2, and an analysis of 94, cases. Int Abstr Surg. 1959 Jan;108(1):1-30. [PubMed]
- 2. Z. Todani T, Watanabe Y, Narusue M, Tabuchi K, Okajima K. Congenital bile duct cysts: Classification, operative procedures, and review of thirty-seven cases including cancer arising from choledochal cyst. Am J Surg. 1977 Aug;134(2):263-9. [PubMed]
- Bhavsar MS, Vora HB, Giriyappa VH. Choledochal cysts : a review of literature. Saudi J Gastroenterol. 2012 Jul-Aug;18(4):230-6. [PMC free article] [PubMed]
- Babbitt DP. [Congenital choledochal cysts: new etiological concept based on anomalous relationships of the common bile duct and pancreatic bulb]. Ann Radiol (Paris). 1969;12(3):231-40. [PubMed]
- Sugiyama M, Haradome H, Takahara T, Izumisato Y, Abe N, Masaki T, Mori T, Hachiya J, Atomi Y. Biliopancreatic reflux via anomalous pancreaticobiliary junction. Surgery. 2004 Apr; 135(4):457-9. [PubMed]
- Okada A, Hasegawa T, Oguchi Y, Nakamura T. Recent advances in pathophysiology and surgical treatment of congenital dilatation of the bile duct. J Hepatobiliary Pancreat Surg. 2002;9(3):342-51. [PubMed]