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**UPPER GI ENDOSCOPIC FINDINGS IN PATIENTS WITH GALLSTONE DISEASE**

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*Article History: Received 15<sup>th</sup> October,2015, Accepted 27<sup>th</sup> October, 2015, Published 28<sup>th</sup> October,2015*

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**ABSTRACT**

**Background:** Upper abdominal symptoms like abdominal pain, dyspepsia etc are most often attributed to biliary disease and many patients continue to complain of the same symptoms after cholecystectomy. So upper gastroin testinal (GI) endoscopy is performed for patients with gallstone disease (GSD) before cholecystectomy to exclude upper GI pathology other than GSD.**Aims:** To assess the value of preoperative upper GI endoscopy in patients with Gall Stone Disease awaiting cholecystectomy.**Patients and Methods:** This is a prospective descriptive hospital-based study. Fifty symptomatic adult patients diagnosed as having gallstone disease by ultrasound who underwent preoperative oesophago-gastroduodenoscopy (OGD) were included in this study.**Results:** OGD revealed different pathological findings in 27 (54%) out of 50 patients with GSD.**Conclusions:** OGD prior to cholecystectomy is valuable in patients with GSD for detection of associated upper GI pathology responsible for symptoms.

**.Keywords:** Gall Stone Disease, Upper Gastrointestinal Endoscopy, Reflux oesophagitis, gastritis, Dyspepsia

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**1.INTRODUCTION**

Cholelithiasis is one of the most common and costly of all digestive diseases . Common causes of upper abdominal symptoms are peptic ulcer, acute and chronic gastritis and gallstones. However, in the earlier days the role of upper GI endoscopy before doing cholecystectomy was controversial(2). Several studies showed that patients with symptomatic gallstones and negative oesophago-gastro-duodenoscopy (OGD) remain asymptomatic after cholecystectomy, while patients with positive OGD findings remain symptomatic after cholecystectomy(3). The incidence of asymptomatic gallstones has been understood recently, largely due to application of ultrasonographic scanning of people for other reasons. Many problems have been associated with cholelithiasis including old age, obesity, diabetes mellitus, alcoholism, smoking and oestrogen replacement therapy(9). The natural history of

asymptomatic gallstones suggests that a large number of affected individuals remain asymptomatic for life; only 1-4% per year will develop symptoms or complications of gallstones. Only 10% will develop symptoms in the first five years after diagnosis and 20% 20 years after diagnosis. Almost all patients will experience symptoms for a period of time before they develop complications. None of the features, like number of stones, size, shape, nature, wall thickness, gallbladder contractility, patients gender or age, were found to be predictive of symptoms or complications like acute cholecystitis, obstructive jaundice, pancreatitis or gallbladder cancer (10).

**Review of Literature**

Upper GI endoscopy was done to 1064 out of 1143 (93.1%) patients with cholelithiasis before elective cholecystectomy. Upper GI pathological findings were detected in 345 patients (30.2%)( 4)

In another study, upper GI pathology was detected in 31% of 100 patients with cholelithiasis before elective

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cholecystectomy, of whom 7 patients were excluded from doing cholecystectomy(5).

In another study, OGD was performed in 338 patients before cholecystectomy. Pathological findings were detected in 160 (47.3%); 6.8% had peptic ulcer disease, 25.7% gastritis, 3.0% oesophagitis, 4.7% hiatus hernia and 0.6% had gastric cancer. Cholecystectomy was postponed in 23 patients with ulcers and 2 patients with gastric cancer underwent gastrectomy(6).

In a study conducted between 1993 and 2002, where 2800 patients were enrolled and upper GI endoscopy was done for all patients with cholelithiasis before elective laparoscopic cholecystectomy. Preoperative endoscopy 1- 4 days before the operation showed pathologic changes in the stomach and/or duodenum in 1187 (42%) patients; gastric ulcer was found in 179(6.4%), duodenal ulcer in 127 (4.2%), gastritis in 735 (26.3%), polyps in 143 (5.1%) and gastric cancer in 3 (0.1%) patients. Cholecystectomy was not done for patients with peptic ulcer and most of them became asymptomatic after antiulcer treatment(7).

### Objectives

The purpose of this study was to assess the value of preoperative upper GI endoscopy for patients awaiting cholecystectomy, to determine the upper GI lesions by OGD in patients with GSD and to evaluate the role of non-surgical management in patients with positive endoscopic findings with GSD.

## 2.PATIENTS AND METHODS

This was a prospective descriptive hospital based study. Conducted at Raja Muthiah Medical College and Hospital during the period June 2013 to October 2015. Fifty patients were included. All patients underwent OGD after being diagnosed as having GSD proved by ultrasonographic scan.

A questionnaire prepared beforehand for this study was used for data collection which included personal information and detailed presenting symptoms .

Consent was obtained from all patients included in this study.

## 3.RESULTS

Fifty patients were included in this study . OGD was done for all patients in this study; twenty three patients (46%) had normal OGD findings while 27 (54%) had different upper GI pathologies (table 1).

FINDINGS	NUMBER OF PATIENTS	PERCENTAGE (%)
NORMAL	23	46
REFLUX	11	22
OESOPHAGITIS	4	8
GASTRITIS	2	4
GASTRIC ULCER	4	8
DUODENITIS	3	6
DUODENAL ULCER	1	2
HIATUSHERNIA		

## 4.DISCUSSION

High rates of postcholecystectomy symptoms suggest that surgery is sometimes performed inappropriately in patients whose symptoms were not related to biliary stones. In this study OGD was done for 50 adult patients with symptomatic gallstones to look for upper GI lesions other than gallstone disease. Regarding the abdominal signs in this study, most of the patients had right hypochondral and/or epigastric tenderness. Sonographic findings showed that most of those patients had multiple gallstones. OGD findings were detected in 27 patients. 11 patients had reflux oesophagitis and 4 had gastritis. Review of literature shows OGD was done for 376 patients with symptomatic gallstones, only 60 patients (16%) showed gastroscopic findings where gastric erosion, peptic ulcer and oesophagitis were seen in 15, 14 and 11 patients respectively (8).

No complications attributed to OGD were seen in this study . OGD seems to be of great value in diagnosing upper GI pathology in patients with GSD prior to cholecystectomy and hence it is recommended as a routine investigation prior to cholecystectomy.

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