

**Original article**

## Upper Gastro Intestinal Endoscopy Findings In Patients with Dyspeptic symptoms in Basrah

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### **Abstract**

**Objective:** To analyze the findings of upper GI endoscopic examination carried out in the endoscopy unit at Basrah teaching hospital in order to estimate the prevalence of upper GI diseases in the examined patients.

### **Methods**

A total of three thousands four hundred and twenty two endoscopic examinations of the upper GI tract were recorded and analyzed during the period between January 1995 and December 1999.

### **Results**

The most common lesions

encountered were duodenal 71.44% followed by esophageal and gastric lesions 18.04% and 10.52% respectively. Duodenal ulcer was found in 22.8%, reflux esophagitis in 5.3%, and benign gastric ulcer in 0.8%. 41% of endoscopic findings were normal.

### **Conclusion**

Upper gastro intestinal endoscopy has a high diagnostic values in the investigations of upper gastric intestinal symptoms.

**Key words:** Peptic ulcer. Upper G.I endoscopy.

### **Introduction:-**

Endoscopy of the upper gastric intestinal (GI) tract is a safe and easily carried out procedure of high diagnostic value and also a therapeutic value in certain cases, is not costly and has a remarkable low incidence of morbidity.

Since the era of endoscopy began, important information about the prevalence and incidence of upper GI tract disease has been gained in various regions of different countries<sup>(1-5)</sup>.

Gastro intestinal disorders are considered to be frequent, the number of patients attending endoscopy unit for various dyspeptic symptoms are increasing. Diagnostic and therapeutic upper GI endoscopy which is now performed as the first

initial examination instead of barium meal is of high values in evaluation and to explore these symptoms<sup>(6-8)</sup>.

The aim of this study is to analyze the findings of upper GI endoscopic examinations carried out in the endoscopy unit at Basrah teaching hospital during the period between January 1995-December 1999 to estimate the prevalence of upper GI diseases in the examined patients.

### **Patients and methods**

During the period between January 1995 and December 1999, 3422 endoscopic examinations of the upper GI tract were recorded and analyzed, patients were referred from out patient department, private clinics, medical and

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surgical wards. The procedure was carried on an overnight fasting patients using Lignocaine spray or jelly. Rarely in excited patients Diazepam 5-10 mg was used. After proceeding the endoscope (olympus GIFK2. GIQ<sup>(1)</sup>) into the distal second part of the duodenum and after the inversion of the scope in the stomach, careful evaluation of the mucosa of the upper (GI) tract was done.

Biopsies were taken from suspected malignant lesions and from second part of duodenum for suspected malabsorptions. 174 antral biopsies were obtained for helicobacter pylori detection for two other separate studies.

Criteria for endoscopic diagnosis, clinical and demographic characteristics were recorded by one endoscopist.

Gastritis and duodenitis are diagnosed by endoscopy whenever the mucosa is red, edematous with or without petechial bleeding. Erosions (pepper salt) are recorded whenever multiple small superficial ulcers are seen.

### **Results**

Out of the 3422 cases endoscoped, 1785 (52.2%) were males and 1637 (47.8%) were females. 1410 (41%) had no visible endoscopic abnormalities.

#### **Duodenum**

Endoscopic findings in the duodenum are shown in Table (1). The most common abnormality was duodenal ulcers seen in 783 patients (22.8%). If

was duodenal ulcers seen in 783 patients (22.8%). If duodenal erosions (pepper salt ulcers) are considered with duodenal ulcers the number will increase to 1177 (34.3%), most of the ulcers were of acute type. Only one patient (female) had malignant post bulbar ulcer proved by histology. Bleeding ulcer was seen in 18 patients (0.5%). The occurrence of duodenal ulcers were more frequent in males (591) than females (192), with males to females ratio 3:1. The peak age group was in the third and fourth decade (30-49y). duodenitis was seen in 232 (6.7%) patients.

#### **Stomach**

The most common abnormality was gastritis seen in 92 (2.6%) patients Table (2). Benign gastric ulcer was seen in 29 (0.8%). The most common site for these ulcers was in the lesser curve, all the malignant tumours 11(0.30) were adeno carcinoma except one which was gastric lymphoma, males to females ratio for all gastric lesions was 1:3.65.

#### **Esophagus**

The most common abnormality was reflux esophagitis seen in 183 (5.3%) patients. Grade IV esophagitis was seen in 59 (2.0) of patients. Hiatus hernia was observed in 133 patient (3.8%). Drug induced ulcers were seen in 6(0.17%) patients. Males to females ratio for esophageal lesions was 2:1 and other findings are shown in Table (3).

#### **Discussion**

This study has shown that 2012 (58.7%) of the examined patient had visible endoscopic

**Table 1:Endoscopic findings of the duodenum**

<b>Findings</b>	<b>No. of patients</b>	<b>(%)</b>
Total duodenal ulcers	783	(22.8 %)
Anterior ulcers	394	(11.5%)
Post ulcers	338	(9.8 %)
Kissing ulcers	47	(1.3%)
Multiple	4	(0.1 %)
Duodenitis	232	(6.7 %)
Erosions (pepper salt)	394	(11.5%)
Deformity	278	(8.1 %)
Diverticula	41	(1.1 %)
Duodenal polyp	6	(0.17%)
Vascular lesion	0	(0 %)

**Table 2:Endoscopic findings of the stomach**

Findings	No. of patients	(%)
Gastritis	92	(2.6 %)
Gastric erosions	69	(2.0 %)
Benign ulcers	29	(0.8 %)
Malignant tumour	11	(0.3 %)
Polyps	11	(0.3 %)
Gastro jejunostomy	11	(0.3 %)
Pyloroplasty	40	(1.16%)

**Table 3:Endoscopic findings of the esophagus**

Findings	No. of patients	(%)
Reflux esophagitis	183	(5.3 %)
(Mild form)	124	(3.6 %)
(Severe grade IV)	159	(2.8 %)
Hiatus hernia	133	(3.8 %)
Esophageal varices	25	(0.7 %)
Moniliasis	7	(0.2 %)
Malignant tumour	5	(0.14%)
Achalasia	2	(0.05 %)
External compresion	2	(0.05 %)

## Discussion

This study has shown that 2012 (58.7%) of the examined patient had visible endoscopic findings. The most common lesions observed was duodenal (71.4%) followed by esophagel and gastric, (18%) and (105%) respectively. The commonest lesion was duodenal ulcer (22.8%). This is higher than what was found in Sudan (17%)<sup>(4)</sup> and Saudi Arabia (14%)<sup>(9)</sup>.

The only female patient who had malignant post bulbar ulcer by histology proved to be an invading carcinoma of the pancreas after surgery. Duodenal ulcer was found predominantly in males with males to females ratio of 3:1 as compared to the study from Sudan 4,5:1 and northern Iraq 3,8:1.

Benign gastric ulcer was uncommon finding (0.8%) when compared with duodenal ulcer (22.8%).

ulcer (22.8%). The ratio of duodenal to gastric ulcer was 28,5:1. The result was higher than a study carried in Southern Iraq in 1993, 14: 1<sup>(5)</sup> And in Kuwait in 1981, 2.8:1<sup>(11)</sup>. But is similar to study from Sudan 25:1<sup>(4)</sup>.

It has been noted that 6(50%) of the malignant gastric tumours were discovered in the last 6 month of this study which clearly indicates an increasing prevalence of malignant tumours in our region.

The common esophageal diseases were reflux esophagitis. Six of the esophageal ulcers were Tetracycline (doxycycline) induced, these ulcers were usually multiple of large sizes and involving the mid esophagus.

It is concluded that upper gastro intestinal endoscopy has a high diagnostic value in the investigations of upper gastro intestinal symptoms

investigations of upper gastro intestinal symptoms and since the procedure is easy and not a costly, it is recommended as a procedure of choice to investigate upper GI symptoms.

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