

A Prospective Study of Upper Gastrointestinal Endoscopic Findings in Patients Presenting with Dyspepsia

*Dr. P. Sundareswari¹, Dr. Vinodh G kumar ²

¹Assistant Professor, Department Of General Surgery, Madurai Medical College, Madurai, Tamilnadu, India.

²Postgraduate, Department Of General Surgery, Madurai Medical College, Madurai, Tamilnadu, India.

Corresponding Author: *Dr. P. Sundareswari

Abstract: Dyspepsia is affecting about 25% of general population in developed nations and it is a major cause for medical visits. New patients comprise about 10% of population every year. Dyspepsia majorly affects quality of life and it is a major burden in view of social costs. Directly the expenses are for laboratory tests, medical consultation and drugs and indirectly by absence from work. Eventhough alarm features provides a roadmap in guiding endoscopic investigation, the complexity of those symptoms comprising dyspepsia makes it difficult

Keywords: dyspepsia, gastric ulcer ,malignancy,gastritis,

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I. Introduction

Dyspepsia refers to spectrum of diseases and heterogeneous group of symptoms confined to upper abdomen. Dyspepsia is a vague term used to explain upper abdominal collection of symptoms like indigestion, fullness, early satiety (not able to complete the meals), bloating, belching, nausea, epigastric discomfort or pain and anorexia. Indigestion is very common in general population; almost all have had indigestion at some time in their lifetime. Sometimes patients will include constipation and undigested food particles in the stool.

II. Aim Of The Study

To evaluate the upper gastrointestinal endoscopic findings in patients with dyspepsia.

III. Objectives Of The Study

1. To evaluate the upper gastro intestinal endoscopic findings in patients presenting with dyspepsia and to compare with previous studies.
2. To detect esophago gastroduodenal carcinoma at an earlier stage
3. To study the age and sex prevalence in patients presenting with dyspepsia.

Eligibility Criteria

A. Inclusion criteria:

1. Patients above 18 years of age.
2. Patients showing symptoms of dyspepsia .
3. Patients who have consented for the study

B. Exclusion criteria:

1. Patients below 18 years of age.
2. Patients with chronic liver disease
3. Patients who has not consented for the study

IV. Materials And Methods

A prospective clinical study was undertaken at Madurai medical college hospital, Madurai to know the various upper gastro-intestinal endoscopic findings in patients presenting with dyspepsia The study was conducted from March 2016 to August 2016. The patient selection was by convenience sampling. Dyspeptic patients were included in this study with their informed consent. A detailed clinically history was elucidated, followed by careful clinical examination. All the patients included in the study underwent upper gastrointestinal endoscopy and the findings were noted.

V. Observation Of The Study

A prospective clinico-pathological study entitled “A Prospective study of upper gastrointestinal endoscopy findings in patients presenting with dyspepsia” was undertaken in Madurai medical college hospital to study the endoscopic findings of dyspepsia and to detect esophagogastrroduodenal carcinoma at early stages. After informed consent 110 cases of dyspepsia were included in the study and were studied clinically from March 2016 to August 2016. All the patients underwent upper gastro-intestinal endoscopy and various findings were noted.

Table 1: Age And Sex Prevalence In Patients Presenting With Dyspepsia

AGE/SEX	MALE	FEMALE	TOTAL
<19	1	4	5
20–29	8	7	15
30–39	21	8	29
40–49	12	9	21
50–59	12	7	19
>60	12	9	21
TOTAL	66	44	110

AGE AND SEX DISTRIBUTION

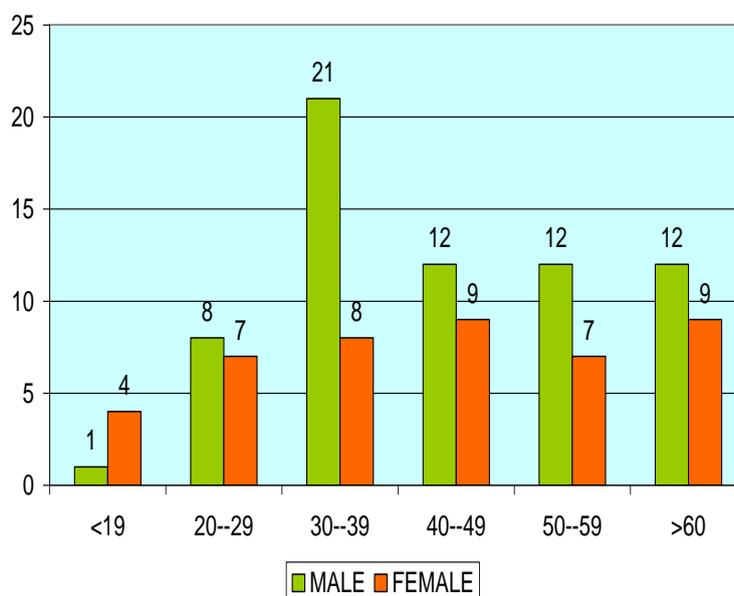


Table: 2 endoscopic Finding In Patients With Dyspepsia

Findings	Male	Female	Total
Normal Study	23	26	49
Oesophagitis	5	2	7
Gastritis	17	10	27
Duodenitis	7	1	8
Gastric Ulcer	8	0	8
Duodenal Ulcer	2	2	4
Growth/Malignancy	3	3	6
Hiatus Hernia	1	0	1
Total	66	44	110

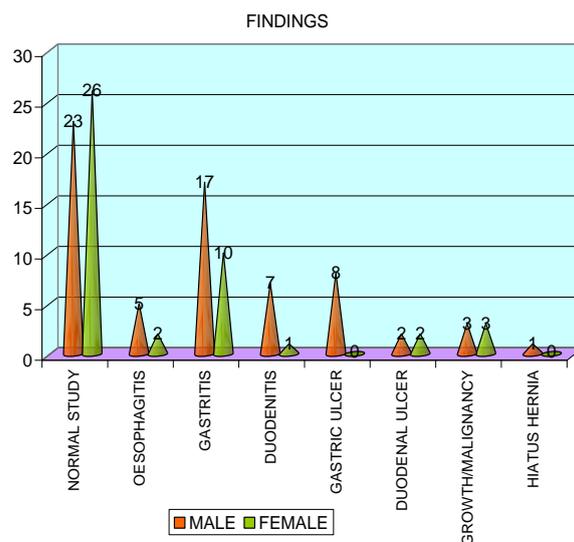


Table:3 Site Of Lesion In Endoscopy Presenting With Dyspepsia

SITE	MALE	FEMALE	TOTAL
NORMAL STUDY	23	26	49
OESOPHAGUS	6	2	8
STOMACH	30	19	49
DUODENUM	12	4	16

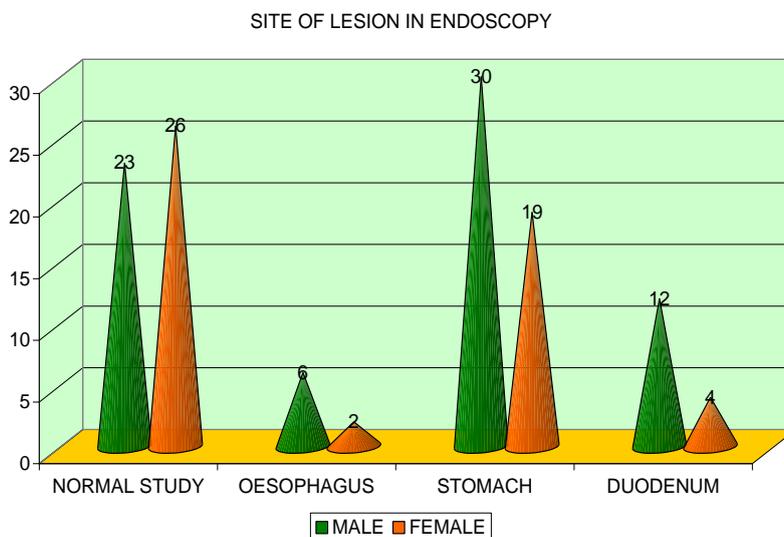
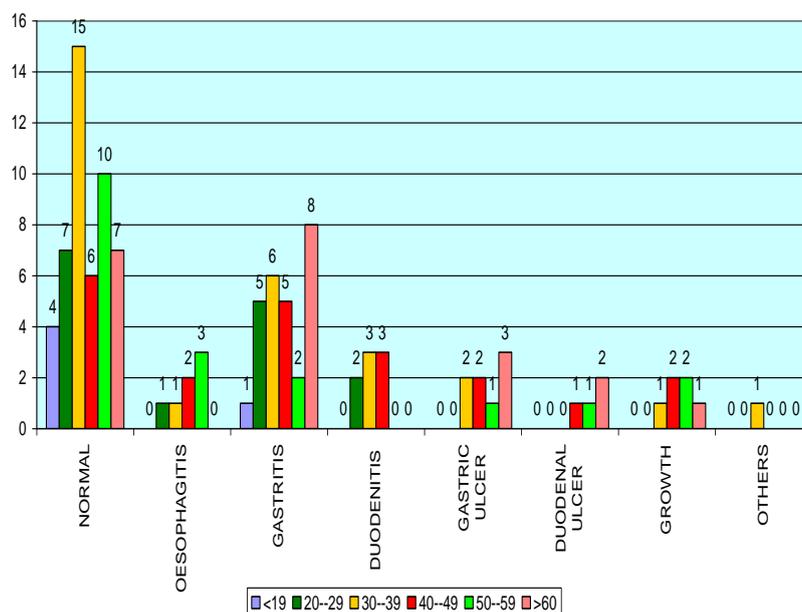


Table: 4 age Wise Presentation Of Dyspepsia

FINDINGS	<19	20--29	30--39	40--49	50--59	>60	Total
NORMAL	4	7	15	6	10	7	49
OESOPHAGITIS	0	1	1	2	3	0	7
GASTRITIS	1	5	6	5	2	8	27
DUODENITIS	0	2	3	3	0	0	8
GASTRIC ULCER	0	0	2	2	1	3	8
DUODENAL ULCER	0	0	0	1	1	2	4
GROWTH	0	0	1	2	2	1	6
OTHERS	0	0	1	0	0	0	1
Total	5	15	29	21	19	21	110

FINDINGS VS AGE



Clinical presentation:

Out of 110 patients, 86 (78.1%) patients had epigastric pain and discomfort as their chief complaint where as nausea and vomiting was present in 74 (67.27%) patients. The other complaints were heart burn 67 (60.9%), food intolerance 50(45.4%), indigestion 52(47.27%) and loss of appetite and weight 35(31.81%). Similar study was conducted by Thomson A B R et al, in which the common presenting complaints were upper abdominal pain (34.3%), heart burn (24.5%) and acid regurgitation (13.3%), the observations were comparable with that of the present study.

Comparison Of Gender Distribution

In this study 66% were male patients, 44% were female patients. The incidence of different presentations of dyspepsia were common in males compared to females. The male / female ratio in the studies conducted by Khan N et al – 2.3:1, Ziauddin- 1.6:1, Mustapha SK et al- 1.1:1 respectively. In these studies also the majority of patients were males as observed in our study. In a population based study in Australia, female adults significantly out numbered males in most functional gastrointestinal disorders includes functional dyspepsia.

Comparison of various endoscopic findings:

In the present study, clinically significant endoscopic findings were observed in 61 patients accounting for 55.45%. Gastritis was by far the most common finding (24.54%). The next common findings were duodenitis, and gastric ulcer accounting for 7.2% each. The percentage of cases with gastritis in this study was higher than that observed in studies by Sarwar et al and Ziauddin. The percentage of patients with GERD was nearly equal to that observed by Sarwar et al.

Table 5	Name of the study	Gastritis
Comparison of common endoscopic findings in various studies.No		
1	Sarwar et al.39	13%
2	Ziauddin40	18%
3	Present study	24.54%

Comparison of incidence of gastric malignancies:

In this study there were 6 patients with carcinoma stomach accounting for 5.4%, among them which 3 were male patients and 3 were female patients. Gastric malignancies were common in older age groups. Incidence of gastric malignancies observed by various authors are as follows:

Table 6. Comparison of incidence of gastric malignancies

Sl.NO	Name of study	Percentage of gastric malignancies
1	Chadwick P et al.5	1%
2	Khan N et al.6	3%
3	Ziauddin40	4%
4	Present study	5.4%

The incidence of gastric malignancy in these studies is comparable with that observed in the present study.

Summary

A prospective study was undertaken in Madurai medical college hospital to know the endoscopic findings in patients presenting with dyspepsia and early detection of oesophagogastrroduodenal malignancy in these patients.

1 10 patients presenting with dyspepsia were evaluated. The following were the observations:

1. Highest prevalence of dyspepsia in the age group of 30-39years
2. Most common presenting complaint was epigastric pain and discomfort
3. Dyspepsia was more common in males (60%) when compared to females(40%)
4. Most common endoscopic finding was normal study followed by gastritis
5. Malignancy was diagnosed in 5.4% patients with dyspepsia.
6. Stomach is the common site of lesion in patients presenting with dyspepsia
7. Gastritis, duodenitis ,gastric ulcer , and malignancy is common in males than females presenting with dyspepsia.
8. Incidence of malignancy increases as the age advances.

VI. Conclusion

From the present study of upper gastro-intestinal endoscopy in dyspeptic patients Endoscopic examination revealed gastritis, which accounted for the majority of the cases. Incidence of malignancy in the present study was observed to be 5.4% (gastric malignancies).Clinically significant endoscopic findings were observed in 55.45% of patients with uninvestigated dyspepsia. Most patients presented with a complex of three or more dyspeptic symptoms and the symptom profile was not predictive of the endoscopic findings. Hence the study emphasize the importance of endoscopic investigations in patients with dyspepsia of unknown significance, irrespective of presence or absence of alarm features. Prevalence of large number of inflammatory lesions as a result of increased acid production and low incidence of malignancy in the study group suggests that the uninvestigated patients with dyspepsia may be initially managed medically with acid suppressive therapy.

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Proforma

- [17]. Case serial number:
- [18]. Name: Age Sex: Occupation:
- [19]. Complaints: Duration: History of present illness:
- [20]. a. Pain a) Duration
- a. Nature
- b. Site
- c. Radiation
- d. Relation to food habits
- e. Aggravating / Relieving factors
- f. Periodicity
- [21]. Nausea/ Vomiting a) Number
- [22]. Contents
- [23]. Relation to food
- [24]. Relation to pain.
- [25]. Heart burn.
- [26]. Food intolerance.
- [27]. Indigestion.
- [28]. Loss of weight and appetite
- [29]. Past History:
- [30]. Treatment History: History of NSAIDs/ Corticosteroid usage
- [31]. Personal History:
- a. Diet: Vegetarian/Mixed.
- b. Appetite: Good/Reduced.
- c. Bowel habits: Frequency.
- d. H/o smoking: Yes/no, duration, number/day.
- e. H/o alcohol intake: Yes/no, duration, quantity/day.
- [32]. General physical examination:
- [33]. Built: Well built/moderately built.
- [34]. Nourishment: Well nourished/poorly nourished
- [35]. Pallor: Present/Absent Per abdomen: Tenderness.
- [36]. Deep tender spot. Lump/Mass.
- [37]. Free fluid.Organomegaly.
- [38]. Other systems:
- [39]. RS, CVS, CNS.
- [40]. Clinical Diagnosis: Endoscopic findings:
- [41]. Other investigations if any:

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