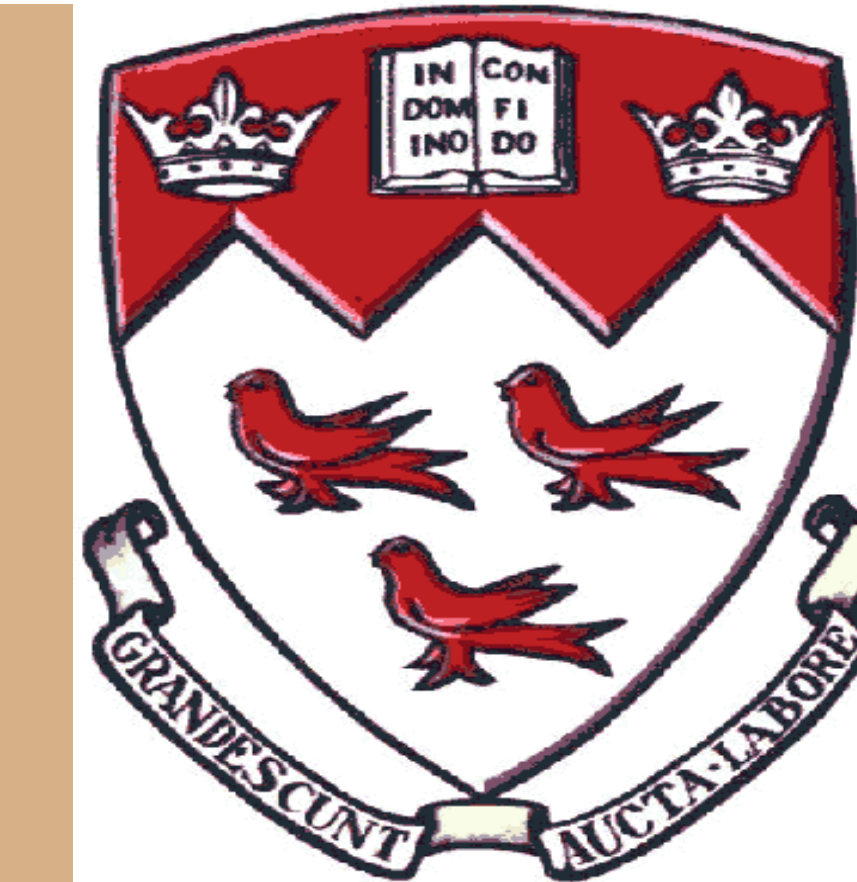




Assessment of Dyspepsia in Advanced Cancer Patients

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Background

About half of patients with advanced cancer experience distressing gastrointestinal (GI) symptoms which impair their function and worsen their quality of life.

These symptoms are often a result of underlying disease or medication side effects.

The presence of abdominal and/or pelvic disease and their impact on the severity of upper GI symptoms in patients with advanced cancer remains unknown.

Objective

The goals of the study were to determine the prevalence and severity of dyspepsia symptoms, and to assess their association with abdominal and /or pelvic disease in patients with advanced cancer.

Methods

Population

The patient population was derived from 362 patients with cancer who were consecutively evaluated at the Cancer-Nutrition Rehabilitation (CNR) clinic of the McGill University Health Centre between May 15, 2007 and September 30, 2010.

All patients were included in the study, except patients with brain cancer or brain metastases.

Methods cont

Procedures

Baseline upper gastrointestinal symptoms were assessed using the Dyspepsia Symptom Severity Index (DSSI).

The DSSI asks patients to rate the severity of 19 symptoms, as well as their overall stomach problem (Global DSSI score) over the past 2 weeks on a 5-point Likert scale²

Results

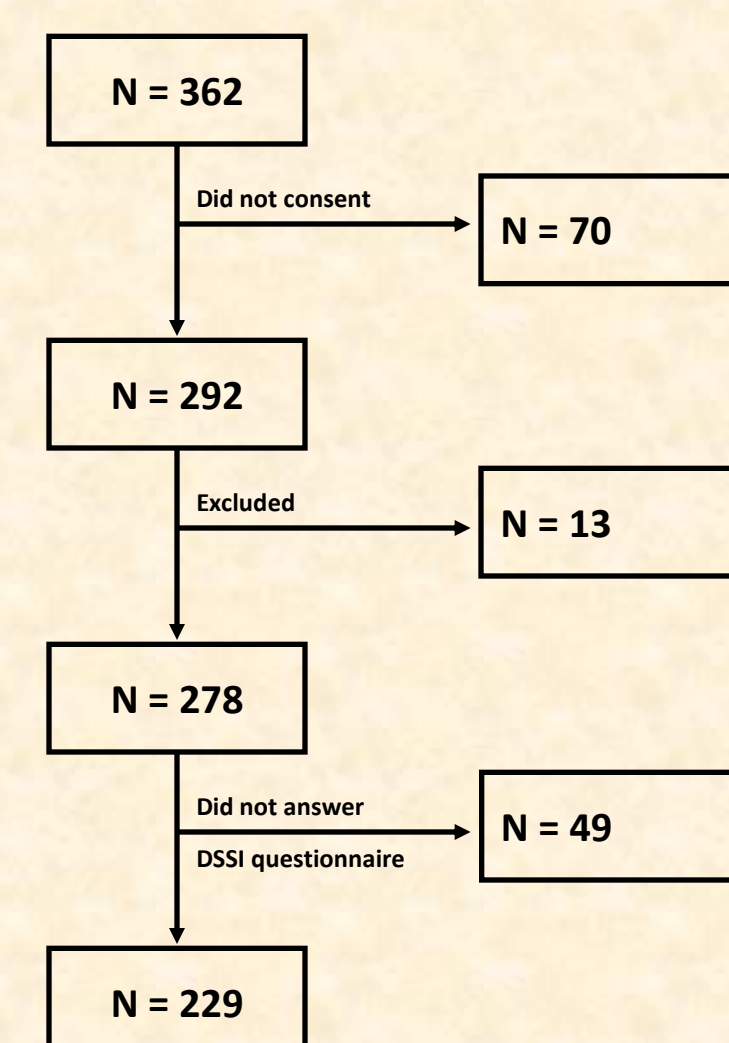


FIGURE 1. Study Inclusion Diagram

Table 1. Patient Characteristics (N = 229)

Age: Mean (SD)	59 (14)
Sex (male): n (%)	107 (46.7)
Cancer Diagnosis: n (%)	
Head & Neck	26 (11.4)
Breast	32 (14.0)
Lung	13 (5.7)
Colorectal	28 (12.2)
Kidney-Bladder	5 (2.2)
Prostate	9 (3.9)
Uterine-Cervical	10 (4.4)
Ovarian	10 (4.4)
Upper Gastrointestinal	18 (7.9)
Hepato-biliary and Pancreatic	28 (12.2)
Hematological	36 (15.7)
Other	14 (6.1)
Stage: n (%) *	
I-II	49 (21.6)
III-IV	142 (62.6)
N/A ^b	36 (15.9)
Liver Metastases: n (%)	29 (12.7)
Abdominal Cancer-related Surgery: n (%)	137 (59.8)
PEG ^c Feeding: n (%)	13 (5.7)
Receiving Chemotherapy: n (%)	47 (20.5)
ECOG ^d Performance Status: n (%) *	
0	19 (9.1)
1	121 (58.2)
2	50 (24.0)
3	18 (8.7)

Results cont

The overall prevalence of dyspepsia (Global DSSI score > 0) was 56.4%.

Figure 2 shows that proportionately more patients with abdominal and/or pelvic disease reported full feelings after meals, stomach ache or pain right after meals, or stomach pain at night than patients without abdominal and/or pelvic disease

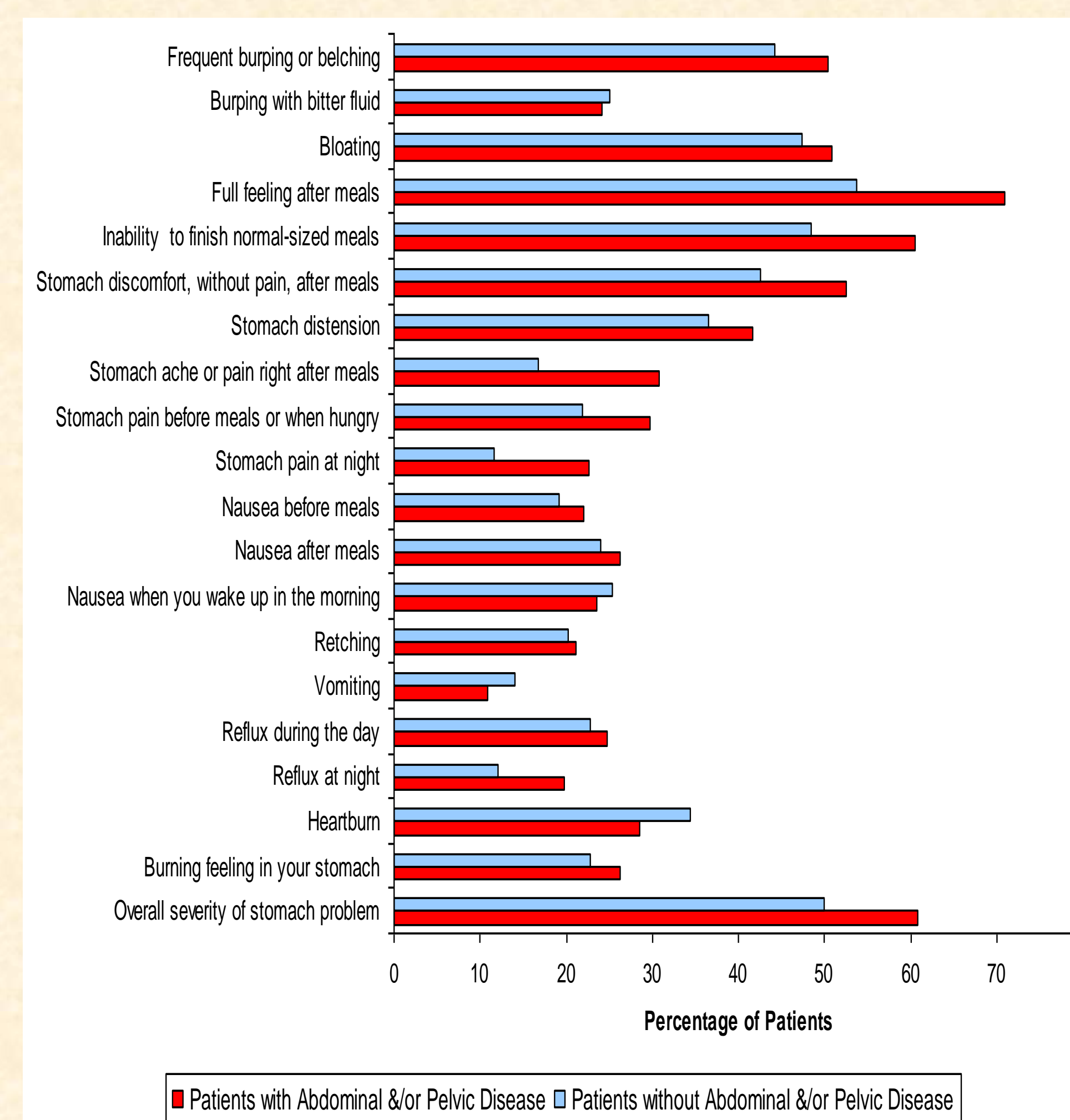


Figure 2.

Table 3 shows that when controlling for the other predictors,

patients with abdominal and/or pelvic disease reported a Global DSSI score 0.32 points greater than patients without abdominal and/or pelvic disease.

patients with an ECOG performance status of 2 or 3 reported a Global DSSI score 0.38 points greater than patients with an ECOG performance status of 0 or 1.

patients receiving anti-emetic medications reported a Global DSSI score 0.74 points greater than patients not receiving anti-emetic medications.

age, sex, stage of disease, cancer-related abdominal surgery, chemotherapy, and other medication use did not affect overall dyspepsia symptom severity.

Table 3.

Predictors	Multivariate	
	Regression coefficient (95% CI)	p-value
Abdominal &/or Pelvic Disease (Y vs. N)	0.32 (0.03 – 0.62)	0.03
Age (yrs/10)	--	--
Sex (women vs. men)	--	--
Stage (III-IV and N/A vs. I-II)	--	--
ECOG (2-3 vs. 0-1)	0.38 (0.07 – 0.69)	0.02
Surgery (Y vs. N)	--	--
Receiving Chemotherapy (Y vs. N)	--	--
Opioids (PRN only vs. N)	--	--
Opioids (Regular vs. N)	--	--
Benzodiazepine (Y vs. N)	--	--
Anti-inflammatory (Y vs. N)	--	--
Antibiotic or Antifungal (Y vs. N)	--	--
Calcium supplement (Y vs. N)	--	--
Iron supplement (Y vs. N)	--	--
Laxative (Y vs. N)	--	--
PPI and/or H2 Blocker (Y vs. N)	--	--
Prokinetic (Y vs. N)	--	--
Anti-emetic (Y vs. N)	0.74 (0.31 – 1.16)	<0.01

Discussion

Our study confirmed that dyspepsia symptoms are very common and severe among patients with advanced cancer.

Patients with abdominal and/or pelvic disease, with low performance status ECOG (2-3), or receiving anti-emetics may have experienced more severe dyspepsia symptoms as a result of gastroparesis³.

Further research is required to explore the effects of gastroparesis on dyspepsia symptoms in advanced cancer.

References

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