Real-World Treatment Patterns among Newly Diagnosed Patients with Erosive Esophagitis in the US

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INTRODUCTION

Approximately 30% of patients with gastroesophageal reflux disease (GERD) are affected by erosive esophagitis (EE), also referred to as erosive GERD. According to the American College of Gastroenterology (ACG) guidelines, when a patient is not responding to a proton pump inhibitor (PPI), no more than one switch to another PPI can be supported. This study assessed variation in treatment patterns with PPIs in the United States following index diagnosis of EE.

METHODS

- Commercial and Medicare Advantage enrollees aged 18 years or older were identified using the Optum Research Database.
- Patients with newly-diagnosed EE from 01Oct2016 through 31Dec2020 were included in the study.
 - Not all patients with a diagnosis code for EE on a non-diagnostic medical claim had an endoscopy.
- Patients were required to have continuous enrollment for 12 months before (baseline) and ≥12 months following the index date (follow-up).
 The index date was defined as earliest diagnosis of EE.
- Patients with diagnosis of EE, Barrett's esophagus, or esophageal adenocarcinoma during the 12-month baseline period were excluded.
- Follow-up ended at the earlier of disenrollment from the health plan or 31Dec2021.
- With respect to providers' treatment algorithms following their patient's EE diagnosis, lines of therapy (LOTs) were defined as initiation, switching, or discontinuation of prescription PPI medications. Patients could have resumed the same PPI or switched to a different PPI after 30 days, which would constitute a new LOT. Receipt of adjunctive therapy (H2 receptor antagonists [H2RAs], prokinetic agents, antacids, baclofen, sucralfate, and alginate) was identified.

RESULTS

- A total of 281,087 newly-diagnosed EE patients were identified. Mean age was 61.6 years, 58.4% or patients were female, and mean follow-up time was 2.7 years (Table 1).
- Approximately half of patients had a pharmacy fill for PPI 12 months prior to EE diagnosis with omeprazole (26.6%) and pantoprazole (20.4%) being the most common.

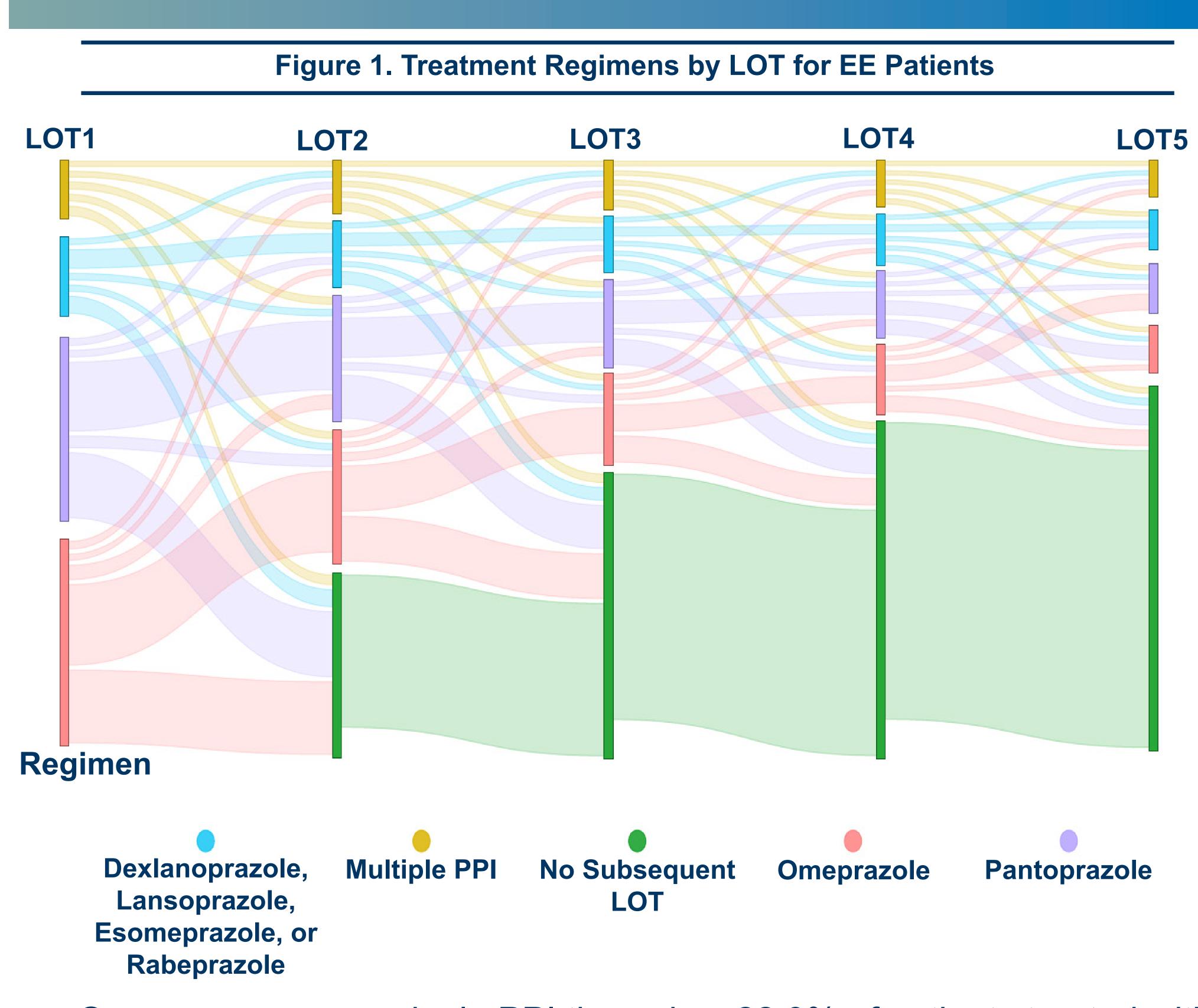
RESULTS (cont.)

Table 1. Demographics and Baseline Clinical Characteristics

	Patients with EE (N=281,087)
Age (years), mean (SD)	61.6 (15.6)
Gender, n (%)	
Female	164,244 (58.4)
Insurance type, n (%)	
Commercial	130,881 (46.6)
Medicare ¹	150,206 (53.4)
Follow-up observation time (days), mean (SD)	971.1 (425.9)
Baseline Charlson comorbidity score ² , mean (SD)	1.2 (1.7)
Top 5 most common comorbidities, n (%)	
Hypertension	164,049 (58.4)
Disorders of lipid metabolism	161,749 (57.5)
Upper gastrointestinal disorder	156,545 (55.7)
Immunizations and screening for infectious disease	134,245 (47.8)
Diseases of the heart	126,073 (44.9)
Selected comorbidities/symptoms, n (%)	
Obesity	71,178 (25.3)
Cough	58,728 (20.9)
Asthma	55,017 (19.6)
Dysphagia	41,511 (14.8)
GI bleeding	29,097 (10.4)
PPI, n (%)	
Omeprazole	74,688 (26.6)
Pantoprazole	57,308 (20.4)
Multiple PPIs	13,228 (4.7)
Esomeprazole	9,392 (3.3)
Dexlansoprazole	6,741 (2.4)
Lansoprazole	2,079 (0.7)
Rabeprazole 1 Dual eligibles are catergorized as Medicare	1,652 (0.6)

- ¹ Dual eligibles are catergorized as Medicare. ² Quan H, et al. V. Am J Epidemiology. 2011;173(6):676-82.
- During the full follow-up period, 26.9% did not have a record of PPI medication regimen, 39.9% filled omeprazole, and 37.3% filled pantoprazole.
- Most LOTs (66%-78%) ended due to discontinuation or a 30-day gap in therapy rather than change PPI therapy within 30 days of the end of a LOT.

RESULTS (cont.)



- On average across single PPI therapies, 22.9% of patients treated with single PPI in LOT1 remained on this PPI for less than 60 days. 15.8% of patients developed esophageal ulcers in the follow-up period.
- Patients with EE demonstrate high rates of medication switching among PPIs. Rates of medication restarting were high among omeprazole and pantoprazole, in addition to medication switching rates (Figure 1).

CONCLUSIONS

- Despite ACG guidelines recommendations, many patients neither receive nor maintain effective continuous PPI treatment.
- Among patients who receive PPIs, they cycle through multiple PPIs.
- Results suggest unrecommended PPI cycling is inadequately treating EE symptoms.
- The long-term complications of EE may be due to widespread variability in care, suggesting the need for ongoing healthcare professional education on the management of GERD.

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Conflicts of Interest: Murali Gopal and Rinu Jacob are employees of Phathom Pharmaceuticals. All other authors serve as consultants to Phathom Pharmaceuticals.