

REBOUND PHENOMENON OF PROTON PUMP INHIBITOR THERAPY

*Daniela Benedeto Stojanov¹, Goran Koraćević¹, Dragan Stojanov¹, Maja Koraćević¹,
Nebojša Ignjatović¹*

¹University of Niš, Faculty of Medicine, Niš, Serbia

Contact: Daniela Benedeto Stojanov
6/6 Todora Milovanovića St., 18000 Niš, Serbia
E-mail: dbenedetostojanov@gmail.com

Proton pump inhibitors (PPIs) are the most potent drugs for suppressing gastric acid secretion. They are used in the treatment of acid-peptic disorders, including peptic ulcer disease, gastroesophageal reflux disease, Zollinger Ellison syndrome, in the eradication of *Helicobacter pylori* infection and ulcer prophylaxis. In the pharmacotherapy of these disorders, they have significantly suppressed the use of H₂ blockers, like other, older groups of antisecretory drugs.

Long-term PPI therapy leads to moderate hypergastrinemia (increased gastrin secretion) in 20-25% of patients. This hypergastrinemia results in rebound acid hypersecretion (RAHS) in 30-40% patients, who abruptly discontinue PPI. Most patients who abruptly discontinue PPI have symptoms of dyspepsia and gastroesophageal reflux, most commonly heartburn and a burning sensation in the esophagus.

Therefore, care should be taken to properly discontinue PPI and reduce the dose of the drug before complete discontinuation. A less effective acid blocker (H₂ blocker) can be switched, since H₂ receptor blockers cause less pronounced hypergastrinemia and hyperplasia of enterochromaffin-like cells (ECL cells) compared to PPI.

Acta Medica Medianae 2021;60(2):64-68.

Key words: *pump inhibitor, rebound, hypergastrinemia, gastric acid hypersecretion*