

Graduate Medical Education

## Gurvits Syndrome in Setting of Uncontrolled Diabetes and Acute Gastrointestinal Bleeding Successfully Treated with Extended Duration PPI Despite Continuing DOAC

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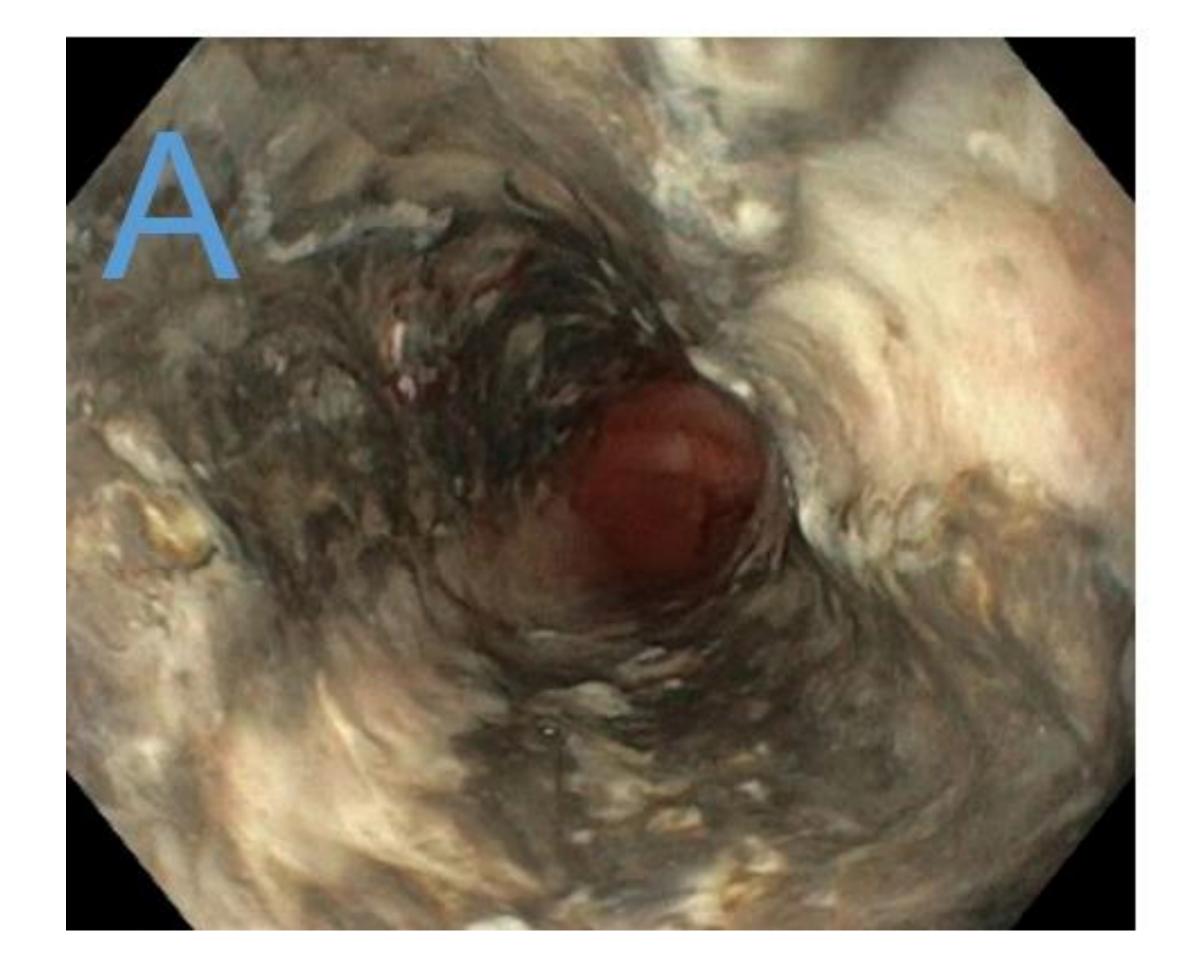


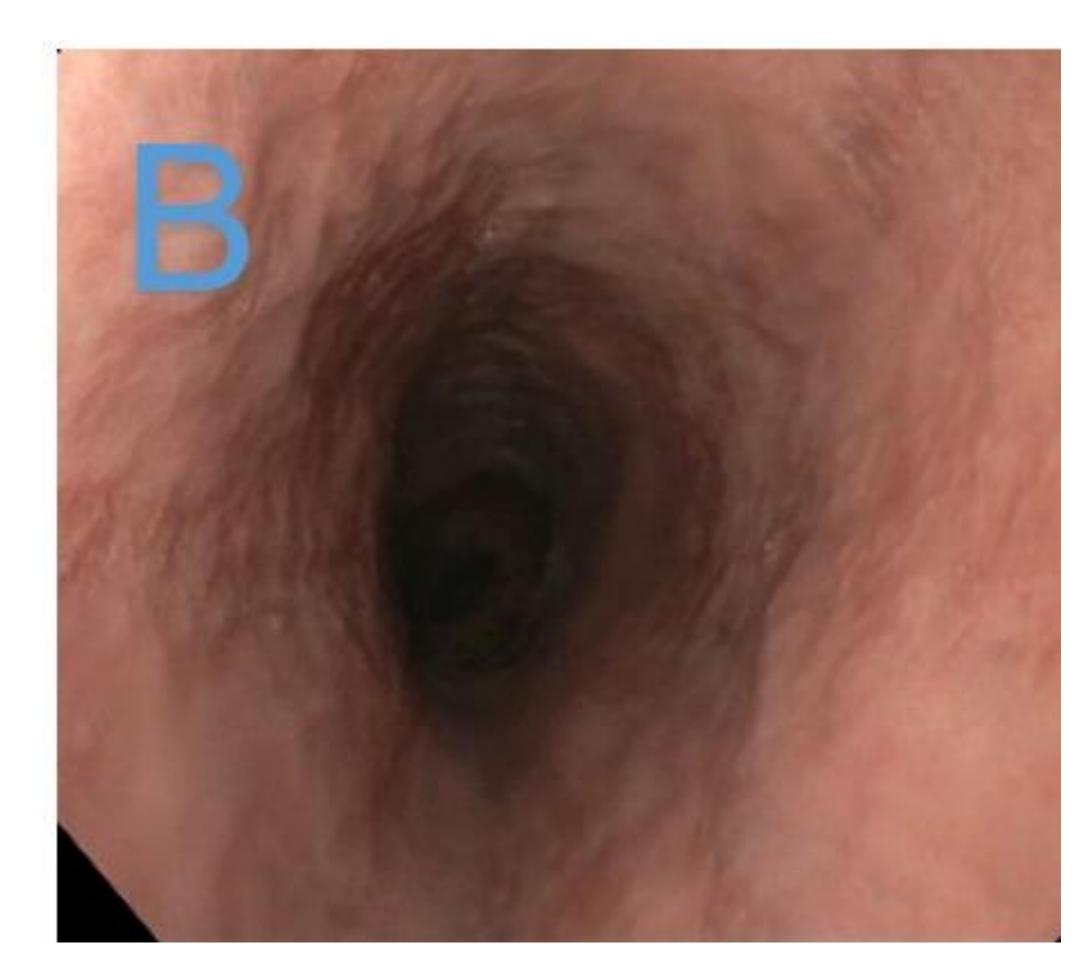
## Introduction

- Acute Esophageal Necrosis (AEN), also called Gurvits Syndrome is a rare syndrome disproportionately reported in men which is characterized by circumferential black esophageal mucosa in the distal two thirds of the esophagus, abruptly ceasing at the GEJ.
- Ischemia is postulated to be an inciting event.
- We present a case of AEN which developed during a prolonged hospitalization in a young male with past medical history (PMH) of severely uncontrolled non-insulin dependent diabetes mellitus (NIDDM) with recurrent admissions for diabetic ketoacidosis (DKA) and hypertriglyceridemia-induced pancreatitis, both secondary to medication non-adherence.
- He was successfully treated with extended duration of proton pump inhibitor (PPI) therapy and control of underlying risk factors despite being continued on anticoagulation as indicated for deep vein thrombosis (DVT) developed during the stay.

## **Case Presentation**

- A 39 year old male with PMH of severely uncontrolled NIDDM was found unresponsive by emergency medical services (EMS) and admitted for acute respiratory failure secondary to DKA and pneumonia.
- He was intubated and admitted to the intensive care unit (ICU), while continued on DKA protocol including antibiotics.
- GI was consulted for hematemesis and melena two weeks into his hospitalization, at which point he had already been initiated on anticoagulation with direct oral anticoagulation (DOAC) for DVT which had developed during the prolonged ICU stay.
- EGD revealed circumferential black esophageal mucosa in the distal esophagus abruptly ending at the gastroesophageal junction (GEJ) and hiatal hernia.
- Recommendations included Intravenous (IV) proton pump inhibitor (PPI) and strict avoidance of naso/orogastric (NG/OG) tube.
- He was discharged with oral PPI regimen as well as DOAC employing shared decisionmaking.
- Follow up EGD few months after discharge showed remarkable improvement of mucosa as noted in Figures A and B, despite continuation of DOAC.





**Figure A.** Acute esophageal necrosis discovered on endoscopy while undergoing EGD for acute GI bleeding during ICU admission for DKA and acute respiratory failure requiring mechanical ventilation **Figure B.** Resolution of acute esophageal necrosis with grossly normal mucosa on follow up endoscopy conducted after extended duration PPI therapy and relatively controlled diabetes.

## Discussion

- AEN is a rare syndrome which is characterized by circumferential black esophageal mucosa in the distal two thirds of the esophagus, abruptly ceasing at the GEJ.
- Ischemia is postulated to be an inciting event.
- Conditions associated with AEN are antibiotics, sepsis, gastric volvulus, hernia, DKA, malignancy, and prolonged vomiting.
- Symptoms of upper gastrointestinal bleeding (UGIB) and shock are common presentations.
- Although biopsy establishes diagnosis and rules out other causes,
  EGD finding is generally sufficient.
- Initial management consists of IV fluids and treatment of the underlying cause. IV PPI and *nil per os* (NPO) is recommended.
- NG/OG tubes are avoided unless vomiting or obstruction is present.
- Mortality is largely due to underlying disease rather than directly from AEN, hence supportive care results in resolution in most cases, as seen in our patient.
- Our case demonstrates the importance of addressing underlying causes, as well as PPI therapy, which can overcome continued anticoagulation.