

## New Diagnostic and Therapeutic Applications of Vizualization Balloon in Patients with Active Gastro-Intestinal Bleeding.

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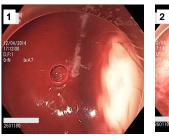
## Background

- In patients with active gastrointestinal (GI) bleeding traditional gasinsufflation endoscopy often fails to visualize the source of bleeding among blood and clots.
- A proprietary visualization balloon (Vizballoon®) was recently introduced into clinical practice in United States.
- Airless endoscopy with Vizballoon® eliminates the need for gas insufflation and facilitates advancement of the endoscope through upper and lower GI tract.

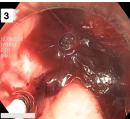


• Vizballoon® was inserted through the biopsy channel of an endoscope and filled with 5 cc of water.

• Then the endoscope was advanced into the stomach or colon to identify the cause of bleeding for endoscopic hemostasis.



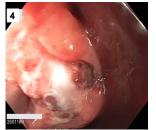
Figures 1: Active gastric bleeding



Figures 3: Thrombin application to control bleeding



Figures 2: Bleeding gastric varix is tamponated with Vizballoon



Figures 4: Endoscopic hemostasis completed

## RESULTS

- Airless endoscopies with Vizballoon® were performed in 13 patients with active GI bleeding.
- Vizballoon® kept blood and clots away from obscuring endoscopic view, facilitating navigation through GI tract and allowing identification of the bleeding source.
- In the first patient the actively bleeding hole in a gastric varix (site of prior attempted glue injection) was clearly visualized through the Vizballoon® allowing tamponade of this area by the water filled balloon for temporary hemostasis followed by a definitive endoscopic therapy with thrombin application.
- In the other 2 cases bleeding gastric ulcers were visualized through the Vizballoon<sup>TM</sup> and then cauterized using a heater probe.
- In 7 patients with bleeding post recent colonic polypectomy endoscopic hemostasis was achieved with hot biopsy forceps.
- Finally, in 3 patients with suspected colonic origin of bleeding, Vizballoon®-assisted advancement of the colonoscope through ileo-cecal valve ruled out colonic bleeding and allowed correct identification of small bowel cause of bleeding.



In patients with active bleeding precluding adequate visualization of the GI tract by traditional gas-insufflation endoscopy, use of a visualization balloon facilitates advancement of the endoscope through blood and clots inside GI tract and allows for adequate identification of the bleeding cause and successful endoscopic hemostasis.