Symptomatic esophageal ulceration caused by a Bravo wireless pH probe and subsequent endoscopic removal of the probe using a retrieval net



A 56-year-old woman with a history of osteoporosis and hyperlipidemia presented for evaluation of gastroesophageal reflux disease. She had undergone a normal esophagogastroduodenoscopy examination within the previous 12 months and had had an incomplete response to treatment with proton-pump inhibitors. Because of her symptoms, she was referred for wireless pH monitoring using the Bravo system (Medtronic, Minneapolis, Minnesota, USA). The patient underwent an uneventful placement of the Bravo probe.

She presented 48 hours later with severe anterior thoracic pain and esophagogastroduodenoscopy was performed. The Bravo probe was identified in the distal esophagus (Figure 1), and a small, clean-based ulcer was observed at the attachment site. It was not possible to dislodge the pH probe by applying gentle pressure from the tip of the endoscope, and a Roth Net (US Endoscopy, Mentor, Ohio, USA) was then used to grasp the probe firmly and detach it from the esophagus (Figure 2). The patient's symptoms improved after removal of the pH probe.

Chest pain is a rare, but recognized side effect of pH monitoring using the Bravo probe. At least four patients have experienced chest pain severe enough to warrant endoscopic removal of the probe [1, 2]: these probes were removed by applying gentle pressure from the tip of the endoscope or by grasping the probe with biopsy forceps. This is the first description of probe removal using a retrieval net. In addition, the esophageal ulceration noted in this case was not described in the previous cases. This case highlights a possible complication of wireless pH testing and descibes endoscopic management of this rare event.

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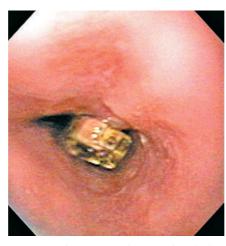


Figure **1** The Bravo probe was identified in the distal esophagus.



Figure **2** A retrieval net (Roth Net; US Endoscopy, Mentor, Ohio, USA) was used to grasp the probe firmly and detach it from the esophagus.

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