Letters to the Editor

Avoiding incomplete conventional colonoscopies: PillCam™ COLON capsule endoscopy

Key words: Capsule endoscopy. Colonoscopy. Diverticular disease.

Dear Editor,

Conventional colonoscopy is currently the preferred method to examine the colon. However, in some cases, cecal intubation is not possible due to technical problems. In fact, incomplete colonoscopy occurs from 5% to 25% in reported series (1-4). In these cases, to date, barium enema or CT-colonography were usually recommended to complete the colon examination. Whether emerging techniques, such as colon capsule endoscopy, could be useful in these situations has not been widely studied.

Case report

A 75-year-old woman with personal history of several abdominal surgeries (cholecystectomy, hysterectomy and even-troplasty) and colonic polyps was referred to our hospital because of recent changes in her bowel habit. Colonic examination revealed a diverticular short-angled segment in the sigmoid colon which made the progression of the endoscope impossible (Fig. 1). No other lesions were found. Therefore, we decided to perform a colon capsule endoscopy which showed

ular disease (Figs. 2 and 3). No polyps were found. In spite of all these handicaps the procedure was complete and the colon capsule was naturally excreted before batteries expiration (< 10 h).

Discussion

The capsule endoscopy has been demonstrated to be an accurate, painless and safe procedure for the patient. In fact, more than 1,000,000 procedures have been performed worldwide. Recently, new prototypes of capsule endoscopy, such as the PillCam™ ESO and the PillCam™ COLON, have been developed (5,6). Therefore, the examination areas are currently not limited only to the small bowel. As demonstrated by a recent meta-analysis including 7 studies that provided data on 626 patients, the colon capsule endoscopy is a valuable tool for the visualization

Fig. 1. Short-angled segment in the sigmoid colon with diverticular disease seen by conventional colonoscopy.

Fig. 2. Capsule endoscopy showing mild diverticular disease.

Fig. 3. Stenotic and poorly distended segment of the colon as seen by capsule endoscopy. This area cannot be evaluated by conventional colonoscopy.

of the colon (7). In fact, its sensitivity and specificity for polyps of any size and significant findings was 73% and 69%, and 89% and 86%, respectively (7). Moreover, a study published in 2009 by Van Gossum et al. (8), showed that the colon capsule endoscopy is complete, which means natural excretion, in more than 90% of the cases. The PillCam™ COLON capsule measures 11 X 31 mm, takes images from both ends and offers a battery-life that lasts 9-10 hours on average. These characteristics give the endoscopist the possibility to use the colon capsule in different scenarios rather than colo-rectal screening. Although, to date, there are not enough studies that strongly support this affirmation, the capsule colonoscopy should be taken into account after an incomplete colonoscopy.

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