

Sedation assisted by an endoscopist (SAE) for complex endoscopic procedures. Is it time to change the current guidelines?

Key words: Sedation. Endoscopy. ERCP. Propofol.

Dear Editor,

In recent years, we have witnessed profound changes in sedation for endoscopic procedures. Currently, there is no doubt about the safety, effectiveness and efficiency of sedation assisted by an endoscopist (SAE) in conventional endoscopic procedures (1) and this is included in clinical guidelines. However, this is not the case for complex endoscopic procedures.

For complex endoscopic procedures, the European Society for Gastrointestinal Endoscopy (ESGE) recommends sedation assisted by an anesthesiologist (SAA). However, this recommendation is based on scarce scientific evidence. Recently, several studies in a large volume of patients with a high anesthetic risk have shown that SAE and sedation by a properly trained nurse is safe and effective (2,3), with similar rates of adverse events (AE) to sedation assisted by an anesthesiologist.

ERCP is the paradigm of a complex exploration, both from the endoscopic and anesthetic point of view, therefore the results of the study are particularly important. The prospective study by Luzón Solanas et al. (2) which included a significant number of patients (661), is also interesting in this regard.

The results are consistent with those previously reported, with an AE rate similar to SAA (9.7%). Mild desaturations that were resolved without the need for instrumentation, spontaneously resolved bradycardia and mild hypotension are included as AE, even though these are not included in many of the studies performed by anesthesiologists. No serious complications were recorded which could have been prevented by the presence of an anesthesiologist. Only one death was recorded in a very high risk patient, secondary to an unpredictable event of ventricular fibrillation.

However, these promising results do not allow us to conclude that the presence of an anesthesiologist in the procedure is not necessary in any case. The determination of AE predictors (4) is essential in order to select these patients. In this article, a high anesthetic risk (ASA > 3), advanced age, body mass index (BMI), duration of exploration and induction dose of propofol are established independent predictors of EA.

Several important issues that are not addressed in the study include the influence of the SAE on the success of the procedure, the satisfaction of the patient and even the endoscopist with the sedation model. ERCP is a technically demanding procedure and the responsibility for sedation could influence the outcome.

According to the evidence accumulated in recent years (5), there are no reasons either regarding safety, efficacy or economics that justify the need to perform all complex endoscopic procedures with SAA. Therefore, it seems necessary to update the guidelines and endoscopic sedation protocols to protect our clinical practice. Fluid communication with anesthesiologists is essential to improve the quality of our procedures and results.

Pablo Hernán Ocaña
Digestive Diseases Service. Digestive Endoscopy Unit. Hospital 12 de Octubre.
Madrid, Spain

DOI: 10.17235/reed.2018.5537/2018

References

1. Rex DK, Deenaadyalu VP, Eid E, et al. Endoscopist-directed administration of propofol: a worldwide safety experience. *J Gastroenterol* 2009;137(4):1229-37. DOI: 10.1016/j.tgie.2009.09.003
2. Riphaut A, Stergiou N, Wehrmann T. Sedation with propofol for routine ERCP in high-risk octogenarians: a randomized, controlled study. *Am J Gastroenterol* 2005;100(9):1957-63.
3. Pérez-Cuadrado Robles E, González-Ramírez A, Lancho-Seco A, et al. Safety and risk factors for difficult endoscopist-directed ERCP sedation in daily practice: a hospital based case-control study. *Rev Esp Enferm Dig* 2016;108:240-5. DOI: 10.17235/reed.2016.4206/2016
4. Wehrman T, Riphaut A. Sedation with propofol for interventional endoscopic procedures: a risk factor analysis. *Scan J Gastroenterol* 2009;43(3):368-74.
5. Vargo JJ, Bramley T, Meyer K, et al. Practice efficiency and economics: the case for rapid recovery sedation agents for colonoscopy in a screening population. *J Clin Gastroenterol* 2007;41:591-8. DOI: 10.1097/01.mcg.0000225634.52780.0e