Single Incision Laparoscopic Cholecystectomy

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Abstract

Background: As surgeons embrace the concept of increasingly less invasive surgery, techniques using only a single small incision have begun to gain traction. Multiple case series managed by a single-incision laparoscopic cholecystectomy (SILC) have been published. The objective of this study is to describe the short-term outcomes of SILC in our institution.

Methods: A retrospective review was done for 51 patients who underwent SILC between 2009-2012. The operative time, surgical technique, conversion rate, and postoperative complications were reported.

Results: SILC was performed for 51 patients, all women, with a mean age of 35.6 years (range=19-62). Their body mass index (BMI) ranged from 16.8-35.6 kg/m² with a mean of 20.4. Twelve patients (23.52 %) had acute cholecystitis. The mean operating time was 58.6 minutes (range=45-95 min). Incidents were encountered in 6 patients (11.76%) and were related to intraoperative bleeding. There was a single conversion to the standard laparoscopic procedure (1.9%) and in 5 cases an accessory needle grasp was used (9.8%). Two patients (3.9%) presented postoperative complications (wound infections) and the mean hospital stay was 1.6 days.

Conclusions: SILC is feasible and provides a promising alternative to natural orifice transluminal endoscopic surgery for scarless laparoscopic cholecystectomy. However, routine application of this novel technique requires an evaluation of its safety and cost effectiveness in larger studies.

Key words: laparoscopic, cholecystectomy, single incision

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