Reviewer's report

Title: The Efficacy of Intraoperative Methylene Blue Enemas to Assess the Integrity of a Colonic Anastomosis

Version: 1 Date: 16 May 2007
Reviewer: Jan Kulig

Reviewer's report:

The manuscript focuses on the important problem in gastrointestinal surgery, such as anastomotic leaks and the resulting life threatening septic complications. The authors worked out and tested diagnostic efficiency of a very simple and cheap method of methylene blue enema as an intraoperative test for identification of colonic anastomotic leaks. The main aim has been clearly formulated and the methodology well described and clear. The value of the method in the control and prevention of intraoperative leaks is very well described in a large group of 229 patients and adequately supported by the data. Statistical analyses of the data are well done using appropriate tests. The design of the manuscript is appropriate and clear. The discussion part with conclusions clearly reflects good knowledge of current literature on the topic and show considerable experience of the authors in colon surgery. The title is accurately formulated, and abstract appropriately handles most relevant results in a concise way.

The authors have demonstrated clinical efficiency of methylene blue enema with high specificity of 95% and NPV of 97% in the intraoperative identifying of anastomotic leaks as a result of colon surgery. The detection of anastomotic leaks and their immediate repair is extremely important as it lowers the rate of the postoperative complications and ensures successful treatment result. The manuscript is acceptable for publication in the BMC Surgery.

What next?: Accept without revision

Level of interest: An article whose findings are important to those with closely related research interests

Quality of written English: Acceptable

Statistical review: No, the manuscript does not need to be seen by a statistician.