Low Recovery Rate of Helicobacter Pylori from Positive CLO Test Patients Suffering from Dyspepsia

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Background: Helicobacter pylori are a well-known cause of gastrointestinal diseases particularly amongst patients suffering from dyspepsia.

Objective: To evaluate the recovery rate of Helicobacter pylori from suspected peptic ulcer patients with dyspepsia symptom.

Setting: Gastroenterology Unit, Aseer Central Hospital, Saudi Arabia.

Design: A Prospective Study.

Method: Gastroscopy and gastric biopsy were performed on 53 patients with dyspepsia from January 2012 to January 2013; all were subjected urease CLO test and culture. The CLO-positive biopsies were cultured using brain-heart infusion agar with added blood (7%), and Skirrow's supplement was used for isolating Helicobacter pylori. Inoculated plates were incubated at 37°C for 7–10 days in a microaerophilic incubation environment and examined for suspected Helicobacter pylori colonies. Helicobacter pylori cultures were confirmed by the positive urease, oxidase and rapid antigen test. Cultures of non-Helicobacter pylori bacteria were identified using few phenotypic tests then confirmed by VITEK 2 automated system.

Result: Seventeen (32.08%) Helicobacter pylori were isolated (in pure form or in mixed cultures) using Brain-Heart Infusion agar with blood and Skirrow's supplement. Nineteen (35.85%) samples revealed no growth, 5 (9.43%%) revealed the growth of Acinetobacter spp, 4 (7.55%) revealed Brucella melitensis, 2 (3.77%) revealed Pasteurella spp. and 1 (1.89%) revealed Pseudomonas aeruginosa.

Conclusion: The recovery rate of Helicobacter pylori from CLO positive biopsies was low, 17 (32.08%), but growth of other gram negative bacilli was documented.

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