# Meeting abstract

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**Perforation of colonic cancer in old patients** Domenico Spoletini, Fabio Giorgiano, Aldo Nunziale, Saverio Coiro, Elena Manna, Francesca De Lucia and Giuseppe Pappalardo\*

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#### Background

Perforation is the second most frequent complication of colonic cancer (c.c.). It represents 0.8%–3.7% of all c.c. surgically treated and 10%–26% of those operated on in emergency. The resection rate of c.c. perforations is increased in the last decade reaching 95% or more. Hinchey classification, Mannheim Peritonitis Index (M.P.I.) (5) and Acute Physiology and Chronic Health Evaluation (Apache II) are employed to evaluate the severity of peritonitis and the performance status of the patients.

## Materials and methods

Between 1980 and 2007 we treated 924 c.c.: 842 in elective surgery and 82 in emergency; of these, 23 (2.5%) patients had c.c. perforation. Among these 17 (73.9%) were more than 65 years old (average: 75 yrs; range: 65-86 yrs); 9 were females and 8 were males. The perforation was at the level of the neoplasm in 14 (82.3%) patients (9 cecum, 1 transverse colon, 4 sigmoid colon). In two patients (11.8%) the perforation was in the cecum and the cancer was in the left colon. One patient (5.9%) had a perforation of a cecal cancer with a synchronous stenosing neoplasm in the sigmoid colon. Three patients (17.6%) were classified as Hinchey I, 6 as Hinchey II (35.4%), 5 (29.6%) as Hinchey III and 3 (17.6%) as Hinchey IV. MPI was between 22 and 29 in 9 patients (52.9%) and more than 29 in 8 patients (47.1%). Apache II was equal or less than 30 in 15 patients (88.2%) and more than 30 in 2 patients (11.8%). We performed 15 (88.2%) resections with anastomosis, protected by a derivative stoma in 11

(73.3%). Two patients (11.8%) had a Hartmann procedure.

#### Results

The pathologic examinations showed 5 (29.4%) Dukes B, 8 (47.1%) Dukes C and 4 (23.5%) Dukes D. Neoplastic cells were present in peritoneal liquid in 13 (76.4%). Four (23.5%) patients died in the post-operative period. Fourteen (82.3%) patients had severe post-operative complications. We had only one (6.6%) anastomotic leak cured conservatively.

## Conclusion

Perforation of c.c. is a rare but severe complication. All patients can be treated by a resection; in most of them an anastomosis can be performed, protected by a stoma in advanced Hinchey stages and high MPI and Apache II. The mortality and morbidity rates remain high.