

## Gastroenterología y Hepatología



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## 212 - PREDICTIVE VALUE OF CARCINOEMBRYONIC ANTIGEN IN SYMPTOMATIC PATIENTS WITHOUT COLORECTAL CANCER. POST-HOC ANALYSIS WITHIN COLONPREDICT COHORT

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## Resumen

Objectives: Serum carcinoembryonic antigen (CEA) is mainly used as a prognostic biomarker for monitoring recurrence of colorectal cancer (CRC) following curative resection. The clinical value of CEA for the assessment of patients presenting abdominal symptoms is unknown. We aim to assess the incidence of various types of cancer and its related death in symptomatic patients without CRC in a complete baseline colonoscopy.

Methods: Post-hoc retrospective cohort analysis performed within COLONPREDICT study, a diagnostic accuracy study evaluating faecal immunochemical test in symptomatic patients. Symptomatic patients without CRC in a complete basal colonoscopy were divided into two groups (CEA ?/> 3 ng/dl) and data from follow-up were retrieved from electronic medical records. For all patients, cancer diagnoses of any aetiology and death were recorded. Hazard rates (HR) were calculated adjusting by age, sex and presence of advanced adenoma. Finally, we analysed which variables were independently associated with the detection of any malignancy during the first year.

Results: We analysed 1,431 patients, 238 (16.6%) with CEA > 3 ng/dl. Patients with CEA > 3 ng/dl were older (64.7 vs 67.4 years old; p 0.005). There were no differences (p > 0.05) between both cohorts in gender, prevalence of abdominal symptoms or basal colonoscopy findings (significant colonic lesion). Over 3 6.5 ± 8.4 months, 30 (2.1%) developed gastrointestinal cancer (GIC) (upper GIC: 22, CRC: 8) and 85 patients (5.9%) were diagnosed with cancer located outside from the gastrointestinal (GI) tract. Subjects with high CEA levels showed higher CRC (HR 4.4, 95% confidence interval-CI 1.1-17.7) and non GIC risk (HR 1.7, 95%CI 1.0-2.8) with no differences in upper GIC risk (HR 2.2, 95%CI 0.9-5.4). One hundred (7.0%) patients died during the follow up. 41 (2.9%) due to non-cancer causes. Twenty-one (1.5%) patients died from GIC. Of these, 6 (0.4%) were CRC related. Thirty-eight (2.7%) patients died from cancer located outside the GI tract. Subjects with high CEA levels showed higher risk of death due to CRC (HR 8.8, 95%CI 1.6-48.5) and

non-gastrointestinal cancer (HR 3.5, 95%CI 1.8-6.7). Again, there were no differences in upper GIC risk (HR 2.3, 95%CI 0.8-6.8). A new malignancy was detected in 51 (3.6%) patients during the first year. Three variables were independently associated: anaemia (OR 2.8, 95%CI 1.3-5.8), rectal bleeding (OR 0.3, 95%CI 0.1-0.7) and CEA level > 3 ng/dl (OR 3.4, 95%CI 1.7-7.1).

Conclusions: Symptomatic patients without CRC in a complete basal colonoscopy and CEA level > 3 ng/dl have a moderate increase in the risk of cancer detection for the first year. Anaemia and lack of rectal bleeding independently increase this risk in our cohort.