

REFERENCES AND/OR ACKNOWLEDGEMENTS

- Makihara K, Fukui R, Uchiyama H, *et al.* Decreased percentage of neutrophil is a prediction factor for the efficacy of TAS102 for pretreated metastatic colorectal cancer. *J Gastrointest Oncol* 2019;**10**(5):878–885.

Conflict of interest No conflict of interest

5PSQ-026

CLINICAL IMPORTANCE OF GENETIC VARIANTS IN CAPECITABINE BIOACTIVATION PATHWAY FOR THE PREDICTION OF RESPONSE IN COLORECTAL CANCER PATIENTS

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Background and importance Colorectal cancer (CRC) is one of the most prevalent neoplasms worldwide. Capecitabine (Xeloda), an oral prodrug of 5-fluorouracil, is one of the standard treatments for patients with advanced CRC (stages III-IV). In clinical practice, capecitabine response shows high interindividual variability. This variability may be due to the presence of polymorphisms in genes related to the bioactivation of capecitabine to fluorouracil (*CES1*, *CES2*, *CDA*, *TYMP*) that may alter drug bioavailability.

Aim and objectives To assess treatment response and evaluate the influence of genetic polymorphisms in *CES1* (rs71647871, rs71647871), *CES1P1* (rs rs7187684, rs11861118), *CES2* (rs11075646), *CDA* (rs532545, rs602950, rs2072671), *TYMP* (rs11479) as predictive biomarkers in CRC patients treated with capecitabine.

Material and methods A prospective cohort study was carried out in CRC patients under adjuvant capecitabine treatment. DNA was extracted from buccal swabs. Genetic polymorphisms were determined by real-time polymerase chain reaction (PCR) with TaqMan probes. Treatment response was assessed using the RECIST criteria v1.1 for complete response (CR), partial response (PR), stable disease (SD) and progressive disease (PD). Patients were grouped into response (CR+PR) and no response (SD+PD).

Results 53 CRC patients were included; 43.4% (23/53) were woman; mean age was 63±11 years; 54.72% (29/53) had family history of cancer; 84.62% (44/52) had adenocarcinoma, major cancer stage was IIIB 57.69% (30/52), the principal primary tumour location was rectum 37.74 (20/53) and main histological grade was G2 54.72% (29/53). Main treatment regimens were XELOX 58.49% (31/53) and capecitabine monotherapy 37.74% (20/53). 88.68% used capecitabine-based regimens as first line of treatment. Response could be evaluated in 50 patients. RECIST response was 76% CR (38/50), 4% SD (2/50) and 20% PD (10/50). Overall, 78% (39/50) patients responded to treatment. An association between tumour grade and response was observed ($p=0.03$), OR 2.71; 95% CI 1.82 to 189.39 for G1 vs G3 and OR 2.17; 95% CI 1.35 to 78.39 for G2 vs G3. No significant association was found between treatment response and the analysed polymorphisms ($p>0.05$).

Conclusion and relevance CRC patients with lower histological grades are associated with capecitabine-positive response. No

significant association was found between response and genetic variants in *CES1*, *CES2*, *CDA* and *TYMP*.

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5PSQ-027

MISUSE ASSESSMENT AND RISKS OF NSAIDS PRESCRIPTIONS FOR ELDERLY PATIENTS IN SURGICAL UNITS

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Background and importance Non-steroidal anti-inflammatory drugs (NSAIDs) should be used with caution for elderly patients due to the high risk of gastrointestinal and renal adverse effects (AE). However, this drug class is widely used in the perioperative period for their analgesic properties, to spare using opioids. Due to serious AE imputed by pharmacovigilance in Orthopedic Surgery Departments (OSD), a study of NSAIDs prescriptions was conducted in this care unit. Clinical pharmacy development in OSD highlighted dysfunctions in prescribing NSAIDs for patients aged over 75 years who are at high risk of AE.

Aim and objectives To quantify how commonly postoperative prescription of NSAIDs are used and to assess the risks associated for patients aged over 75 years in OSD.

Material and methods We performed a retrospective, observational study between January and October 2021 on all NSAIDs prescriptions for patients aged over 75 years in OSD. Treatments which may cause renal failure in elderly patients (angiotensin-converting enzyme inhibitors (ACE inhibitors), angiotensin receptor blockers (ARB), diuretics) were noted. Specific attention was given to patients having presented a serious AE including a declaration to pharmacovigilance.

Results In total, 584 patients received NSAIDs in the OSD. 80 patients were aged over 75 years (13.7%), of which 21 patients were taking ACE inhibitors (26%) at the same time, 17 patients an ARB (21%) and 13 patients diuretics (16%). A combination of three nephrotoxic drugs was found for 2 patients and a combination of two for 20 patients. The median creatinine before surgery was 69 μ M (40–141 μ M) and median renal clearance was 78 mL/min. Serious renal AE were identified in 5 patients (6.25%) leading to prolonged hospitalisation and haemodialysis for one patient. AE were present within 48 hours of taking NSAIDs. No other AE were detected.

Conclusion and relevance The inappropriate prescriptions of NSAIDs observed in elderly patient and their association with other potentially nephrotoxic drugs increases the risk of renal AE. The actions implemented initially were setting analgesic protocols adapted to the patient's age according to the latest recommendations. Secondly, both pharmaceutical and medical prescriptions were being monitored daily. Since surgery involves several prescribers (anaesthesiologists, surgeons, doctors), harmonising prescription practices is currently being considered.

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