Phenotyping of peripheral blood mononuclear cells of patients with advanced heavily pre-treated adenocarcinoma of the stomach and gastro-esophageal junction.

Abstract:
Immunotherapeutic approaches are emerging as promising new treatment options for patients with solid cancers. The host immune system in cancer patients is dysfunctional due to a number of reasons. The level of immunosuppression is variable at the time of diagnosis and depends on the particular cancer entity, stage, and prior anti-cancer therapies. For many cancer entities, the immune alterations of the respective patient population have not been further characterized even though a patient's immunophenotype may be prognostic for the course of the disease or predictive for clinical/biological response to immunotherapy. In this study, we used flow cytometry to determine the phenotype of peripheral blood mononuclear cells (PBMCs) from 30 patients with heavily pre-treated, advanced adenocarcinoma of the stomach and gastro-esophageal junction. The frequencies and activation status of relevant immune effector populations were determined in PBMCs and compared to those of healthy individuals. This report provides comprehensive immune phenotyping data of a patient population with a high medical need.