

P311**SELF-REPORTED TASTE AND SMELL ALTERATIONS IN PATIENTS WITH CANCER RECEIVING SYSTEMIC ANTI-CANCER TREATMENT**

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Rationale: Taste and smell alterations (TSAs) are a common side effect in patients with cancer undergoing systemic anti-cancer therapy (affecting up to 70% of patients)¹ and can negatively impact on food intake and quality of life. This study aimed to characterize TSAs in patients with cancer, and investigate the impact of TSAs on overall liking of oral nutritional supplements (ONS) prototype flavours with warming and cooling sensations.

Methods: Patients with cancer undergoing systemic therapy were recruited. Patients completed a questionnaire on TSAs and evaluated overall liking of 5 prototype flavours of Nutridrink® Compact Protein on a 10-point scale via a sip test.

Results: Fifty patients with various types of cancer and treatments were included. Thirty patients (60%) reported taste alterations (TAs) and 13 (26%) experienced smell alterations (SAs). In patients with TAs, the severity was reported as moderate-severe by 40% (n=12) of patients with an impact on daily life rated as moderate-severe by 33% (n=10) of patients. Compared to before treatment, 32% (n=16) of patients experienced dysgeusia and 26% (n=13) reported hypogeusia. In patients who experienced a bad taste (n=21), chemical (57%, n=12) and metallic (48%, n=10) tastes were common. Larger variation in liking scores of ONS flavours were observed in patients with TAs (±SAs) (4.9-7.1) vs. patients without TSAs (5.9-6.5). In patients with TAs(±SAs), 3 flavours were rated with a liking score >6 by 67% (hot tropical ginger), 73% (neutral) and 93% (cool red fruits) of patients.

Conclusion: TSAs are common in patients with cancer undergoing systemic anti-cancer therapy and adversely impact on patients daily life. Liking of ONS flavours may vary with TSAs, however, in patients with TSAs sensory adapted flavours appear to be appreciated. In daily clinical practice, TSAs in patients with cancer should be evaluated and considered when selecting ONS flavours.

References: 1. Spotten et al. 2017 *Annals of Oncology* **28**:969-984

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