

# headandneck 5000

**A UK multi-centre prospective cohort study assessing the relationship between dietary behaviours and survival in head and neck cancer**

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## **Scientific Outline**

Head and neck cancer is an important diagnosis, with 650,000 cases and 350,000 deaths globally each year [1]. Dietary behaviours including low fruit and vegetable intake and high fried food intake have been associated with an increased risk of head and neck cancer [2, 3]. Regarding dietary behaviours and overall survival in people diagnosed with head and neck cancer the literature is conflicting for both fruit and vegetable intake [4-6]. The studies undertaken are small and do not account for other health behaviours. Furthermore, we found no studies of fried food intake and survival in people with head and neck cancer.

For this study, we propose to use data from the Head and Neck 5000 study to assess in a large UK cohort whether fruit and vegetable intake, and fried food intake at diagnosis are associated with overall survival. We also intend to investigate whether post-diagnosis dietary behaviour is associated with survival. We will use Kaplan Meier plots and Cox proportional hazards regression models, adjusting for clinical factors and other health behaviours.

Overall, this will be the largest study of the role of fruit and vegetable, and fried food intake on head and neck cancer overall survival. The results of this study may contribute to the nutritional advice given to patients with head and neck cancer at the time of their diagnosis.