





Cause specific mortality in people with head and neck cancer treated with curative and palliative intent

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Scientific Outline

Summary

Head and Neck cancers (HNC) are associated with high morbidity and mortality worldwide but the literature identifying the causes of death for these people is limited. We will report cause of death in people with HNC as recorded by death certification and survival with regard to clinical features and treatment factors, using data from the multi-centred cohort study Head and Neck 5000.

We will examine survival time, measuring from study enrolment until either death or the end of the most recent follow-up period. Those who died within the peri-treatment period will be identified and the association between cause of death and tumour site will be examined. We aim to answer the research questions:

What are the immediate and later causes of death for people with HNC?

2 What are the main predictors of early and all-cause mortality?

² How does cause of death vary by demographics, health behaviour, tumour, and treatment factors?

The primary outcome is HNC mortality at six months; 1-year, 2 year and 3 year, with HNC related deaths defined as deaths that were due to the HNC or its treatment. Secondary outcomes include death within peri-treatment period, the rates of disease progression, metastases, and all-cause deaths.

We will focus on the role of smoking, alcohol, co-morbidities, and socio-economic status in predicting disease specific survival alongside stage, treatment intent, and sub-site.

This work will contribute to understanding the predictors of cause of death in HNC and further development of intervention care packages, especially palliative and end of life care.

KEYWORDS: survival analysis; predictors of death; prognosis; head and neck cancer