improved diagnostic and treatment capabilities. Understanding HD epidemiology is crucial for effective resource allocation and improved clinical outcomes.

Keywords: Epidemiology, Hodgkin's disease, Hodgkin's lymphoma, Oncohematology.

https://doi.org/10.1016/j.htct.2024.04.068

ASSOCIATION BETWEEN BODY COMPOSITION AND SURVIVAL IN LOCALLY ADVANCED HEAD AND NECK CANCER TREATED WITH RADIOTHERAPY

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Introduction/Justification: Malnutrition is a frequent condition in patients with head and neck cancer (HNC) due to the location of the tumor, treatment, and difficulty in food intake. Body composition is recognized as a prognostic factor in cancer patients, independently of nutritional status. Low muscularity (LM) is related to decreased survival in patients with HNC, however, the adipose tissue (AT) impacts in prognosis is unclear. **Objectives:** This study evaluates the association between body composition parameters and survival in patients with locally advanced HNC. **Materials and Methods:** A retrospective study was conducted on patients diagnosed with locally advanced HNC who received radiotherapy as the first-line treatment at the University of Campinas Hospital between January 2010 and December 2018. The total adipose tissue (TAT) area and the skeletal muscle area were measured by analyzing computed tomography (CT) images at the level of the third cervical vertebra (C3) using the SliceOMatic V. 5.0 software. The muscle cross-sectional area (CSA) at C3 was used to estimate the CSA muscle area at L3, using a specific formula.Cox proportional hazard models were used for survival analysis. Model A was adjusted for age, while model B was adjusted for age, ECOG score, diabetes, hypertension, concomitant chemotherapy, and tumor stage. Model C maintained the variables of model B plus muscularity. The statistical analysis was performed using Stata software version 17.0, and a significance level of 5% was established. The study was approved by the Research Ethics Committee of UNICAMP (CAAE: 42743120.5.0000.5404). **Results:** Our sample included 132 patients that comprised mostly males (87.9%) aged between 55 and 70 years (60.6%) and considered eutrophic by the Body Mass Index (BMI) (52.3%). Patients in the highest tertile of TAT had a lower risk of death than those in the lowest tertile in model A [HR: 0.49 (CI 95%: 0.30–0.79); ptrend = 0.007], model B [HR: 0.56 (CI 95%: 0.32–0.96); ptrend = 0.039], and model C [HR: 0.51 (CI 95%: 0.29–0.89); ptrend = 0.017]. The highest tertile of TAT presented higher caloric intake (p = 0.030) and energy expenditure (p = 0.004). Low muscularity was associated with lower overall survival [HR = 1.77, 95%CI (1.01 - 3.07), p = 0.044)], but not with progression free survival. There was no statistical difference for NLR values between groups (p = 0.47). **Conclusion:** Higher adiposity was a protective factor for overall survival in locally advanced HNC treated with radiotherapy. Low muscularity was associated with reduced overall survival. The assessment of body composition, added to an early nutritional intervention, and the preservation of muscle mass and adipose tissue may play a role in improving the outcomes of locally advanced HNC patients undergoing radiotherapy.

Keywords: Adipose tissue, Computed tomography, Malnutrition, Mortality, Muscularity.

https://doi.org/10.1016/j.htct.2024.04.069

LOW MUSCULARITY IMPACTS SURVIVAL IN PATIENTS WITH METASTATIC OR RECURRENT HEAD AND NECK CANCER

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Introduction/Justification: The prognosis of patients with head and neck cancer (HNC) is determined by factors extrinsic and intrinsic to the patient and the disease, such as age, smoking, alcoholism, HPV infection, tumor staging, and performance status and facts involving low muscularity, which is an independent adverse prognostic factor in some types of cancer, such as HNC. However, the impact of muscularity in the scenario of metastatic or recurrent HNC (mHNC) patients has still been little explored, especially when evaluated at the level of the third