# Oncological Treatment of Head & Neck Cancer

## Pathway of Care

**Kent & Medway Cancer Collaborative**

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# 1.0 Introduction

## 1.1 Overview

This document has been written to provide guidance on the treatment of head and neck cancer in the Kent & Medway Cancer Collaborative.

Radiotherapy schedules are as defined in the Kent Oncology Centre Quality System Clinical Protocols (Disease Management and Radiotherapy Protocols).

See network chemotherapy prescribing proformas for details of chemotherapy / anti-cancer regimens.

All patients will be considered for entry into a clinical trial (see appendix A).

All patients should be discussed within a multidisciplinary team meeting before commencing initial treatment.

For skin cancers and sarcomas arising in the head and neck area, reference should be made to skin cancer and sarcoma treatment guidelines.

Please note, some of the drugs/doses recommended within this document are outside of the U.K. licensed marketing authorisation.

# 2.0 Squamous carcinomas of the lip and oral cavity

This group includes cancers of the lip, anterior two-thirds of the tongue, floor of mouth, gum (alveolus) and hard palate.

## 2.1 Radical Treatment

Surgery is the preferred initial treatment.

Those with disease beyond the scope of surgery or those not sufficiently fit for surgery may be considered for radical radiotherapy.

## 2.2 Adjuvant Treatment

Histology is reviewed in the H&N Multidisciplinary Meeting with emphasis on risk stratification. On this basis, patients may be grouped into those at high, intermediate or low risk of locoregional recurrence.

High risk features are:

- the presence of primary tumour at the resection margin
- nodal involvement with extracapsular spread.

Intermediate risk features are:

- resection margins <5mm
- perineural infiltration
- discohesive invasion front
- vascular invasion

- nodal involvement without extracapsular spread
- adenoid cystic carcinoma

Those in the high risk category are considered for postoperative chemoradiotherapy.

- cisplatin 100mg/m$^2$ every 3 weeks during radiotherapy (2-3 cycles)
  *or*
- cisplatin 40mg/m$^2$ weekly during radiotherapy

Those in the intermediate risk category may be considered for postoperative radiotherapy (or occasionally chemoradiotherapy) depending on the number of risk features which are present.

## 2.3 Palliative Treatment

Palliative radiotherapy may be considered as initial treatment for those with locally advanced disease and poor performance status.

Radiotherapy may be beneficial to those with metastatic disease, particularly in bones or brain.

Chemotherapy may be considered for selected patients with metastatic disease and/or locally advanced locoregional disease beyond the scope of surgery and radiotherapy. First line treatment should be with platinum based chemotherapy.

- cisplatin 100mg/m$^2$ *plus*
  5-fluorouracil 1000mg/m$^2$/day for 4 days every 3 weeks (up to 6 cycles)

  Treatment can commence at 25% dose reduction for patients with co-morbidities (i.e 75mg/m2 and 750mg/m2)

Carboplatin should be substituted for cisplatin in those unlikely to tolerate a large fluid load or those with borderline renal function, borderline performance status or ototoxicity from cisplatin:

- carboplatin AUC=5 *plus*
  5-fluorouracil 1000mg/m$^2$/day for 4 days every 3 weeks (up to 6 cycles)
  (5FU can commence at 750mg/m2 for patients with co-morbidities)

Cetuximab in combination with platinum based chemotherapy (funding approval required) followed by cetuximab as maintenance therapy until disease progression (funding approval required), can be considered for patients with patients with metastatic or recurrent oral cavity carcinomas in line with current funding approval as of August 2017.

Other palliative chemotherapy regimens which can be considered:

Gemcitabine 1250mg/m$^2$ D1 and D8 on a 21 day cycle (up to 6 cycles)

Paclitaxel 80mg/m$^2$ D1, D8, D15 on a 28 day cycle (up to 6 cycles)

Gemcitabine 1200mg/m$^2$ on days 1 and 8 and Carboplatin AUC 5 on day 1 repeated every 21 days (up to 6 cycles)

Nivolumab as monotherapy for recurrent or metastatic squamous cell carcinoma after platinum based chemotherapy. The patients' disease must have progressed or recurred during or within six months of the last dose of previously received platinum based chemotherapy.

Small cell tumours should be treated with carboplatin & etoposide first line and ACE as second line treatment.

## 3.0 Squamous carcinomas of the pharynx, larynx

This group includes cancers of the nasopharynx, oropharynx (soft palate, tonsil and tongue base), hypopharynx (pharyngeal wall, pyriform fossa and postcricoid) and larynx (including epiglottis).

### 3.1 Radical Treatment

Radiotherapy with concurrent chemotherapy in selected cases, according to tumour site, stage and performance status. In general, chemoradiotherapy is recommended for those with cancers which are $T_3$, $T_4$ or node-positive and those of good performance status (WHO PS 0-1) and age 75 or less. A selected subset of $T_2$ cancers of the larynx (those exhibiting reduced cord movement or with subglottic extension) should also be considered for chemoradiotherapy.

- cisplatin 100mg/m$^2$ every 3 weeks during radiotherapy (2-3 cycles)
  *or*
- cisplatin 40mg/m$^2$ weekly during radiotherapy

Patients of borderline performance status or age may be treated with cisplatin at a reduced dose.

As an alternative, patients receiving chemoradiotherapy for oropharynx cancer may be treated with:

- cisplatin 75mg/m$^2$ *plus*
  5-fluorouracil 750mg/m$^2$/day for 4 days every 3 weeks (weeks 1 and 5 of radiotherapy).

Carboplatin should be substituted for cisplatin in those unlikely to tolerate a large fluid load or those with borderline renal function, borderline performance status or ototoxicity from cisplatin:

- carboplatin AUC=5-6 every 3 weeks during radiotherapy (2-3 cycles)
  *or*
- carboplatin AUC=5 *plus*
  5-fluorouracil 750mg/m$^2$/day for 4 days (weeks 1 and 5 of radiotherapy).
  or
- carboplatin AUC 1.5-2 every week during radiotherapy

Cetuximab given concurrently with radiotherapy may be considered for those of good performance status (WHO PS 0-1) for whom platinum-based therapy is not appropriate. Cetuximab commences two weeks prior to the start of radiotherapy.

- cetuximab 400mg/m$^2$ loading dose followed by 250mg/m$^2$ weekly (8-9 weeks)

Surgery may be preferable for a selected group of advanced ($T_4$) cancers of the larynx and hypopharynx, including those with a poor response to induction chemotherapy (see below).

## 3.2 Neo-adjuvant treatment

Induction (neo-adjuvant) chemotherapy (TPF or alternatively TCarboF if clinically appropriate) is recommended for locally advanced squamous cancers of the oropharynx, larynx and hypopharynx (T4 , bulky T3 or bulky nodal disease) prior to chemoradiotherapy. Patients should generally be of good performance status (WHO PS 0) and aged 70 or less.

- docetaxel 75mg/$m^2$
  *plus* cisplatin 75mg/$m^2$
  *plus*
  5-fluorouracil 750mg/$m^2$/day for 5 days every 3 weeks (2-4 cycles)

Induction (neo-adjuvant) chemotherapy (TP or alternatively TCarbo if clinically appropriate) is recommended for locally advanced cancers of the nasopharynx and paranasal sinuses (T4, bulky T3 or bulky nodal disease) prior to chemoradiotherapy. Patients should generally be of good performance status (WHO PS 0) and aged 70 or less.

- docetaxel 75mg/$m^2$ *plus*
  cisplatin 75mg/$m^2$ or carboplatin AUC 5 every 3 weeks (2-4 cycles)

Those not sufficiently fit for TPF or TP (WHO PS 1 or age over 70) may be considered for neo-adjuvant cisplatin and 5FU.

- cisplatin 100mg/$m^2$ *plus*
  5-fluorouracil 1000mg/$m^2$/day for 4 days every 3 weeks (up to 6 cycles)

## 3.3 Adjuvant Treatment

Postoperative radiotherapy or chemoradiotherapy may be considered for patients with carcinomas of the larynx or hypopharynx undergoing primary surgery.

- cisplatin 100mg/$m^2$ every 3 weeks during radiotherapy (2-3 cycles)
  *or*
- cisplatin 40mg/$m^2$ weekly during radiotherapy

## 3.4 Palliative Treatment

As section 2.3.

# 4.0 Malignant salivary gland tumours

This group includes cancers of the parotid and submandibular glands and of minor salivary glands located within the oral cavity and pharynx.

## 4.1 Radical Treatment

Surgery is the preferred initial treatment.

Those with disease beyond the scope of surgery or those not sufficiently fit for surgery may be considered for radical radiotherapy. There is no established role for concurrent chemoradiotherapy.

## 4.2 Adjuvant Treatment

Postoperative radiotherapy should be considered for those with high grade tumours or with tumour present at or close to resection margins.

## 4.3 Palliative Treatment

Palliative radiotherapy may be considered as initial treatment for those with locally advanced disease and poor performance status.

Radiotherapy may be beneficial to those with metastatic disease, particularly in bones or brain.

Chemotherapy may be considered for selected patients with metastatic disease and/or locally advanced locoregional disease beyond the scope of surgery and radiotherapy (excluding those with adenoid cystic carcinoma).

- carboplatin AUC=5 *plus*
- paclitaxel 175mg/m$^2$ every 3 weeks (up to 6 cycles).
- ECF/ECX/ECarboF/ECarboX

Adenoid cystic carcinomas:

- cisplatin 75mg/m$^2$ day 1 with the option of giving as a split dose (25mg/m$^2$) on days 1,8, and 15 of a 3 week cycle
  ***plus***
- vinorelbine 25mg/m$^2$ IV days 1 and 8 of a 3-week cycle (funding approval required) (up to 6 cycles)

Where appropriate patients should be considered for clinical trials.

# 5.0 Sinonasal and ear cancers

This group includes cancers of the nasal cavity, maxillary or ethmoid sinuses (rarely frontal or sphenoidal sinuses), auditory canal and middle ear. Cancers of the pinna and nasal ala are considered as skin cancers (see skin cancer treatment guidelines).

## 5.1 Radical Treatment

Surgery is the preferred initial treatment.

Those with disease beyond the scope of surgery or those not sufficiently fit for surgery may be considered for radical radiotherapy.

Concurrent chemoradiotherapy may be considered for those with locally advanced squamous sinonasal cancer and a good response to induction chemotherapy.

- cisplatin 100mg/m$^2$ every 3 weeks during radiotherapy (2-3 cycles) *or*
- cisplatin 40mg/m$^2$ weekly during radiotherapy

## 5.2 Neo-adjuvant Treatment

Induction (neo-adjuvant) chemotherapy (TP or alternatively TCarbo if clinically appropriate) is recommended for locally advanced cancers of the nasopharynx and paranasal sinuses ($T_4$ , bulky $T_3$ or bulky nodal disease) prior to chemoradiotherapy. Patients should generally be of good performance status (WHO PS 0) and aged 70 or less.

- docetaxel 75mg/$m^2$ *plus*
  cisplatin 75mg/$m^2$ or carboplatin AUC 5 every 3 weeks (2-4 cycles)

Those not sufficiently fit for TP (WHO PS 1 or age over 70) may be considered for neo-adjuvant cisplatin & 5FU.

- cisplatin 100mg/$m^2$ *plus*
- 5-fluorouracil 1000mg/$m^2$/day for 4 days every 3 weeks (2-4 cycles)

Induction (neo-adjuvant) chemotherapy may be considered for those of good performance status with neuroendocrine carcinoma or extrapulmonary small cell carcinoma:

- carboplatin AUC=5 *plus*
- etoposide 100mg/$m^2$ iv day 1 and 200mg/m2 orally days 2 & 3 of a 3-week cycle (2-4 cycles)

Carboplatin should be substituted for cisplatin in those unlikely to tolerate a large fluid load or those with borderline renal function, borderline performance status or ototoxicity from cisplatin:

- carboplatin AUC=5 *plus*
- 5-fluorouracil 1000mg/$m^2$/day for 4 days every 3 weeks (2-4 cycles)

## 5.3 Adjuvant Treatment

Postoperative radiotherapy should be considered for those with high grade tumours or with tumour present at or close to resection margins.

## 5.4 Palliative Treatment

As section 2.3 (except for adenoid cystic carcinomas, see section 4.3).

## 6.0 Appendix A: Clinical Trials

Refer to the local research team who will provide on request an orientation handbook, list of current trials and associated trial protocols and summaries.

**Contact numbers**

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|---|---|
| **MTW – Clinical Trials Office** | 01622 225 033 |
| **Darent Valley Hospital – Clinical Trials Office** | 01322 428 100 ext 4810 |
| **Medway Hospital – Clinical Trials Office** | 01634 825 094 |
| **East Kent Hospitals – Clinical Trials Office:** | |
| Solid Tumours (excluding Gynae) | 01227 866 393 |

# 7.0 Personnel and Contact Information

A comprehensive, up to date list of MDM contact details can be found on the KMCC website via the following link: http://www.KMCC.nhs.uk/resource-library/

# 8.0 Glossary

Acronyms in common usage throughout KMCC documentation

| | |
|---|---|
| CNB | Cancer Network Board |
| CYP | Children & Young People (in relation to the IOG) |
| DCCAG | Diagnostic Cross Cutting Advisory Group |
| DOG | Disease Orientated Group (NSSG/TSSG/TWG) |
| DVH | Darent Valley Hospital |
| EK | East Kent |
| EKHUFT | East Kent Hospitals University Foundation Trust |
| HoP | High Level Operational Policy |
| IOSC | Improving Outcomes: A Strategy for Cancer |
| K&C | Kent & Canterbury Hospital, Canterbury, (EKHUFT) |
| KMCC | Kent & Medway Cancer Collaborative |
| KMCRN | Kent & Medway Cancer Research Network |
| LSESN | London & South East Sarcoma Network |
| MFT | Medway Foundation Trust |
| MTW | Maidstone & Tunbridge Wells NHS Trust |
| NOG | Non Surgical Oncology Group<br>*(Permanent oncologist sub group of the DOGs with a specific responsibility for chemo/rad pathways and advice to the DOG, Network and GEOGRAPHICAL LOCATIONs on new drugs)* |
| PoC | Pathway of Care<br>*(Network agreed disease site specific clinical guidelines)* |
| QEQM | Queen Elizabeth the Queen Mother Hospital, Margate (EKHUFT) |
| QoL | Quality of life |
| RAT | Research and Trial Group<br>*(Permanent sub-group of the DOGs with a specific responsibility for taking forward the clinical trials agenda)* |
| RMH | Royal Marsden Hospital |
| RNOH | Royal National Orthopaedic Hospital |
| QVH | Queen Victoria Foundation Trust Hospital East Grinstead |
| UCLH | University College Hospital London |
| WHH | William Harvey Hospital, Ashford (EKHUFT) |
| WK | West Kent |

## 9.0 Document Administration

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