

fatigue scales. Global quality of life was correlated substantially with most of the scales but cognitive functioning. The coefficients for the correlation between the items differed between 0.12 and 0.97 and all the subscales were strongly correlated with the scales those they formed. The highest correlation between the EORTC QLQ-C30 and KPS was for the physical functioning ( $r=0.62$ ,  $p<0.05$ ). The Turkish version of the EORTC QLQ-C30 is a valid and reliable instrument for the Turkish lung cancer patients and can be used in clinical study.

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POSTER

### Final results of a randomized phase II study evaluating the role of erythropoietin during radiochemotherapy for pelvic tumors

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**Background:** Anemia is a poor prognostic factor for patients undergoing radiochemotherapy (RCT) for pelvic tumors. The purpose of this randomized clinical trial was to test the efficacy and safety of the administration of human recombinant erythropoietin (EPO) in patients undergoing concurrent RCT.

**Material and Methods:** Patients with previously untreated FIGO stage IB -IIIB carcinoma of the cervix or stage B2 -C carcinoma of the bladder and Hb between 10.0-13.0 g/dl were randomized to treatment with RCT alone or with EPO (10,000 U Sc 5 days/week) starting on Day 1 of RCT. EPO administration was stopped whenever Hb level > 14g/dL. RCT consisted of 90mg/m<sup>2</sup> carboplatin once weekly during the 5-6 week course of external beam radiotherapy (2 Gy qd) to the pelvis. Cervix cancer patients underwent intracavitary brachytherapy following RCT. Patients were given supplemental iron only if blood serum iron was less than 60mg. Complete blood counts were measured weekly during RCT. Blood transfusion was given for Hb < 9 g/dl.

**Results:** Between October 1998 and July 1999, 55 patients were enrolled in this study, of whom 54 (28 in the EPO group and 26 in the control) were evaluable; the other patient died of intercurrent disease during treatment. The groups did not differ significantly in patient age, gender, baseline Hb level, tumor stage or primary site. Blood transfusion was necessary for 10 patients (38.5%) in the RCT alone group compared to 2 patients (7.1%) in the EPO group ( $p=0.008$ ). The change in Hb during therapy was -0.5 g/dl in the RCT group despite the blood transfusions versus 1.0 g/dl in the EPO group ( $p<0.001$ ). Treatment interruption was necessary in 9 patients (36%) in the RCT group mostly due to transfusion requirements versus 1 patient (4%) in the EPO group ( $p=0.01$ ). There were no complications attributable to EPO other than deep vein thrombosis in one patient. 18 patients (69.2%) had a complete response to RCT in the RCT only group versus 22 (78.6%) in the EPO group. 8 patients (30.8%) had a partial response in the RCT only group versus 6 (21.4%) in the EPO group ( $p=0.540$ ). Time to progression at 3 years did not differ significantly between the two groups ( $p=0.809$ ) as well as overall survival ( $p=0.961$ ).

**Conclusion:** Administration of EPO during concurrent RCT significantly decreased the need for red blood cell transfusion and treatment interruption and increased Hb levels in this randomized trial.

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POSTER

### Prevention of chemotherapy-related episodes of febrile neutropenia (FN) in small-cell-lung-cancer (SCLC) patients: in practice not theory.

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**Background:** Use of G-CSF to prevent chemotherapy-related FN, although subject to (inter)national guidelines, is still associated with wide variations in use and uncertainty about when they are clinically indicated. Also antibiotics (AB) prove to be an effective, less expensive, prophylactic strategy. Within the framework of an ongoing randomised multicenter prospective trial in the Netherlands, comparing the clinical and economical effects of primary prophylactic AB versus AB in combination with G-CSF in SCLC patients at risk of FN, a survey was carried out to assess current daily practice.

**Material and methods:** A validated survey solicited data on respondents' patterns of G-CSF and AB use through two hypothetical clinical scenarios for a 62 year old man with small cell lung cancer beginning chemotherapy (primary prophylaxis), and a 65 year old woman who is about to begin her second cycle of chemotherapy after hospitalization with FN following the

first cycle (secondary prophylaxis). Dutch pulmonologists with a specific interest in oncology were addressed.

**Results:** The response rate was 70% (47 out of 67). Physicians did not support G-CSF use for primary prophylaxis in small cell lung cancer, only 4% used G-CSF in this setting 'always', 2% 'usually', 17% 'sometimes', 32% 'rarely' and 43% 'never'. Respondents were mixed in their support for G-CSF and/or AB as secondary prophylaxis: 'Same dose-No G-CSF/ AB' in 6%, 'Reduced dose-No G-CSF/AB' 4%, 'Same dose-AB' 13%, 'Reduced dose-AB' 6%, 'Same dose-G-CSF' 40%, 'Reduced dose-G-CSF' 6%, 'Same dose-AB+G-CSF' 19% and 'Reduced dose-AB+G-CSF' 0%. Working in a non-academic setting is associated with a preference to use 'same dose-G-CSF' as secondary prophylaxis (2 out of 12 'academic' respondents (16%) versus 17 out of 32 'non-academic' (53%)). Whereas 'same dose-AB' was preferred by respondents working in an academic setting (4/12 (33%) versus 2/32 (6%)). No differences were found for other factors as year of registration (before or after 1990) or number of new SCLC-patients/ year (more or less than 10).

**Conclusion:** G-CSF use is still popular in secondary prophylaxis of FN in SCLC patients. Future efforts should focus on effectively implementing evidence resulting from randomised trials, to employ in practice a more rational, cost-effective and uniform approach to prevent FN in patients at risk.

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POSTER

### What factors predict family physician referral for palliative radiotherapy?

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**Background:** Palliative radiotherapy is an effective treatment option in the management of metastatic bone pain, tumor hemorrhage, fungation or ulceration, dyspnea, blockage of hollow viscera, and shrinkage of any tumors causing problems by virtue of space occupancy. Expert opinion suggests that while 50-60% of cancer patients can benefit from radiotherapy, only 30-35% of cancer patients receive radiotherapy in Ontario, Canada. Why this disparity? Our work set out to identify the factors influencing family physicians' referral for palliative radiotherapy. The Ottawa Model of Research Use (OMRU) was designed to provide a practical framework to systematically evaluate supports and barriers to the utilization of an evidence-based intervention, such as palliative radiotherapy. Using the OMRU framework, the factors associated with a family physician's intention to refer a patient for palliative radiotherapy were categorized into four areas related to: 1) the patient, 2) the family physician, 3) the practice environment, and 4) the intervention, i.e., radiotherapy program referral.

**Materials and methods:** A survey was designed, piloted, and sent to a random sample of 400 primary care physicians in the Eastern Ontario region.

**Results:** A response rate of 50% was obtained with 84% of physicians regularly involved in caring for patients with advanced cancer. 62% had previously referred a patient for radiotherapy. Factors determined to be significantly associated ( $p<0.05$ ) with patient referral for palliative radiotherapy include: 1) patient preference (trend,  $p=0.06$ ), 2) practice: regularly caring for patients with advanced cancer, hospital admitting privileges, and rural based, 3) family physician: their knowledge of the effectiveness of radiotherapy, and 4) radiotherapy program: accessibility of the radiation oncologist and family physician awareness of the referral process for radiotherapy.

**Conclusions:** This survey has helped identify some of the practical supports and barriers to the use of palliative radiotherapy by family physicians which will be used to guide the development and improve utilization of our palliative radiotherapy program.

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POSTER

### Antiemetic patterns of care for radiotherapy-induced nausea and vomiting

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The risk of developing RINV varies and depends on several patient- and treatment-related risk factors, such as age, gender, size and localization, dose and schedule. The impact of RINV on QoL may be considerable, particularly with prolonged symptoms associated with fractionated radiotherapy. Guidelines for the treatment of RINV recommend the 5-