written informed consent. Patients from the intervention group received additionally to standard treatment, the SCION-HSCT program consisting of three modules: (a) Mobility/activity enhancement, (b) prevention of oral mucositis as well as (c) nutritional support. The program is emphasized on counseling and practical training for patients to collaborate actively within their treatment process. Patients in the controlgroup received standard care.

Primary endpoint is global HRQoL which is measured at discharge subjectively by patients with EORTC QLQ C30. Secondary enpoints are physical complaints like mobility deficits, mucositis and appetite loss. They are evaluated by CTCAE scale (Common Terminology Criteria for Adverse Events) version 3.0 by nurses. Futhermore we assess physical, social, emotional and role function of cancer patients (EORTC QLQ C30 subscales), physcial performance (GCOR-E-R and HFV), fatigue (FSI-D) subjectively rated by patients and resources consumption (e.g. hospital stay).

Results: The study will determine if SCION-HSCT program improves the self management skills of the patients during the period of hospitalization. It is hypothesized that patients who receive the multi-modular somatic-psycho-social care intervention will have better health related quality of life (HRQoL).

4155 ORAL

Using the Patient Generated Index (PGI) to elicit quality of life priorities in patients following curative treatment for colorectal cancer: experience from two lifestyle intervention development studies

M. Wells[1], A.S. Anderson[2], S. Caswell[2], K. Craig[2], J. Connaghan[3], S. MacAskill[4], R.J.C. Steele[5]. [1]*University of Dundee, School of Nursing and Midwifery, Dundee, United Kingdom;* [2]*University of Dundee, Department of Nutrition and Public Health, Dundee, United Kingdom;* [3]*University of Dundee/University of St Andrews, Social Dimensions of Health Institute, Dundee, United Kingdom;* [4]*University of Stirling, Department of Social Marketing, Stirling, United Kingdom;* [5]*University of Dundee, Surgery and Molecular Oncology, Dundee, United Kingdom*

Background: Unmet needs at the end of treatment are known to influence longer term distress, therefore it is extremely important that oncology nurses are able to identify the concerns and priorities of individuals at this time. A number of screening tools have recently been developed for use in practice, in order to elicit patients' supportive care needs. These are based on pre-specified questionnaire items, so could be criticised for lacking the scope to address the diversity of patients' individual priorities and concerns. The PGI was originally designed to focus on the impact of a specific health condition on the individual's quality of life. Although not widely used in the cancer context, its validity and responsiveness for the colorectal cancer population has been demonstrated. This paper presents PGI data from two recent lifestyle intervention studies with this patient group, in order to illustrate the potential usefulness of this tool for practice.

Material and Methods: The PGI was used to collect quality of life data from the participants (n = 100) of two lifestyle intervention studies: ENJOY and LIVEWELL. Both aimed to improve diet and physical activity in patients who had recently completed curative treatment for colorectal cancer. Data was collected at baseline and at the end of the intervention.

The PGI asks patients to nominate the five areas of their life most affected by their cancer, and to rate and prioritise these, so as to elicit issues of most concern to them. Individual items and single index scores were analysed with the Statistical Package for Social Sciences (Versions 11 & 14), using a combination of descriptive statistics and non-parametric tests.

Results: In both studies, significant improvements in quality of life were seen between end of treatment and follow-up, adding strength to the validity of the PGI as an evaluation tool in this patient group. Patients' most prominent concerns included the impact of cancer on the family, being able to socialise and work, and living with a stoma. The PGI illustrated sensitivity to changes over time and was found to stimulate dialogue between patients and practitioners/researchers about key issues of importance to quality of life.

Conclusions: The PGI is an innovative and useful tool for eliciting the concerns of patients with cancer and assessing their relative importance. Understanding priorities and needs from the individual's point of view is an essential basis for supportive care in practice and in research.

Oral presentations (Mon, 21 Sep, 16:15–18:00)
Symptoms

4160 ORAL

A survey of joint aches, pains and muscle stiffness comparing women with and without breast cancer

D. Fenlon[1], A.C. O'Callaghan[1], P. Simmonds[2], C. Sheppard[3], P. Gordon[4], J. Addington-Hall[1]. [1]*University of Southampton, School of Health Sciences, Southampton, United Kingdom;* [2]*Southampton University Hospitals Trust, Oncology, Southampton, United Kingdom;* [3]*Portsmouth Hospitals NHS Trust, Nursing, Portsmouth, United Kingdom;* [4]*Portsmouth Hospitals NHS Trust, Radiology, Portsmouth, United Kingdom*

Background: Joint aches, pains and muscle stiffness (JAPaMS) have been reported to be a problem for some women after adjuvant treatment for breast cancer, however the extent and impact of this problem is unknown and the causes unclear. The purpose of this study was to determine the prevalence of JAPaMS in women following treatment for breast cancer in comparison with women of a similar age without breast cancer and to explore associations with cancer treatment.

Materials and Methods: Women attending the breast cancer follow up clinic over a period of 6 months and who had completed primary treatment completed the Nordic Musculoskeletal Questionnaire (NMQ), the Brief Pain Inventory (BPI), the SF-36 and demographic details. A comparison group were drawn from women attending a benign breast clinic and a mobile breast cancer screening unit.

Results: 274 women without cancer and 247 with cancer were recruited. The women with cancer were a mean of 27 months from diagnosis. 62% had wide local excision and 38% had mastectomy; 79% radiotherapy; 42% chemotherapy and 81% hormone therapy. The most common chemotherapy regimen was E-CMF and 7% were treated with taxanes. 68% had been treated with tamoxifen and 25% with aromatase inhibitors (AIs).

On the BPI 62% of women with breast cancer reported that they were experiencing pain '*today*' compared to 49% of women without breast cancer ($p < 0.005$). Furthermore, significantly more women with cancer also reported '*pain right now*' ($p < 0.006$).

Logistic regression analysis of the dataset showed that cancer ($p = 0.00$ odds ratio 1.9; CI 1.26, 2.87), age ($p = 0.03$ odds ratio 0.98; CI 0.96–1.00) and pre-existing arthritic conditions ($p = 0.00$ odds ratio 4.17; CI 2.49, 6.98) were predictive of pain. Marital status, BMI, prior surgery on joints or bones, educational level, other illnesses and menopausal status were found not to be predictors of pain.

In the cancer data set logistic regression analysis showed predictors of pain were taxane chemotherapy ($p = 0.03$ odds ratio 6.01; CI 1.21–29.90), aromatase inhibitors ($p = 0.02$ odds ratio 2.75; CI 1.21–6.26), tamoxifen ($p = 0.01$; odds ratio 2.47; CI 1.20–5.07) and lymphoedema ($p = 0.04$ odds ratio 2.03; CI 1.04–3.94).

Conclusions: This research shows that women who have been treated for breast cancer may experience significant problems due to JAPaMS and that there appears to be an association between the use of taxane chemotherapy, aromatase inhibitors or tamoxifen and pain.

4161 ORAL

Malignant fungating wounds: a survey of nurses' clinical practice in Switzerland

S. Probst[1], A. Arber[1], S. Faithfull[1]. [1]*University of Surrey, Faculty of Health and Medical Science, Guildford, United Kingdom*

Background: The care of individuals with a fungating malignant wound represents challenging cancer management not only for patients and their families but also for health care professionals. Understanding the difficulties faced by nurses when they care for patients with such a wound can help guide practice and service development. Little is known about this condition in terms of incidence or current clinical management. The aim of the study was to investigate how many patients with a malignant fungating wounds did nurses see and hat kind of difficulties in caring for patients with a malignant fungating wound did nurses experience.

Material and Method: A survey was conducted in three different geographical regions of Switzerland over a 6 month period.

Results: A total of 269 nurses participated in this survey. 57% of the participating nurses had received higher nursing education. Of all participants 75% indicated that they had not received any further education in fungating malignant wounds. A prevalence rate of fungating malignant wounds of 6.6% was reported. There was a difference in the perceived prevalence between the regions. Most of the patients who had these wounds were aged between 50 and 70 years The most frequent location for such wounds was with 49% the breast in women with breast cancer followed by the neck with 21%. The appearance was mainly ulcerating. The main difficulties nurses experienced in the management of patients related to malodour (48%), pain (46%) and difficulties in applying the dressings to the wound (38%). Different dressings were used to medicate these wounds. The most frequently used dressing was an absorbent dressing with 49% followed by gauze with 35%.

Despite the increasing number of publications about the appropriate use of wound care dressings the respondents show an uncertainty of the correct use of dressings concerning the treatment of fungating malignant wounds. This appears to be due to a lack of knowledge of best practice in fungating malignant wounds and may lead to the lack of evidence based guidelines.

Conclusion and implications for the practice: Confusion about what dressing and when they should be applied is partly a result of the many dressings available. Furthermore the complexity involved in using these dressings is reflected in their lack of use and difficulties experienced by nurses in their use. Strategies need to be explored to help understand the diverse range of wound problems including physical and psychological components.

4162 ORAL

Sores lips during chemotherapy – a "Cinderella" symptom

M.M.A. Williams[1], T.J. Taylor[1], R.J. Thomas[2]. *[1] Bedford Hospital NHS Trust, Department of Oncology, Bedford, United Kingdom; [2] Addenbrooke's Hospital NHS Trust, Department of Oncology, Cambridge, United Kingdom*

Background: Chemotherapy affects the lips by damaging the rapidly dividing basal cells in the vermilion border causing drying, cracking, soreness, bleeding and secondary infection [1]. Uncomfortable and disfiguring, this side effect is rarely mentioned in patient information materials or recorded as an event within chemotherapy studies, with very little advice on how to prevent or alleviate soreness. This survey recorded the incidence and severity of sore lips during chemotherapy, and discovered which over-the-counter remedies patients found helpful.

Methods: Following Ethics approval, 105 consecutive patients receiving chemotherapy were given a study specific questionnaire between 2nd July and 31st October 2008, at the Primrose Oncology Unit, UK. They were approached by their oncology nurse who collected 100 (95%) completed questionnaires, which were subsequently evaluated independently by the research unit attached to Cranfield University.

Results: Twenty eight percent of patients reported regular sore (chapped) lips before chemotherapy, but this figure increased to 69% during chemotherapy. Sixty six percent of these used lip salves but 82% of these reported little or no benefit. Eighty three percent used petroleum-based creams, and of these, 9% reported that they were moderately or very helpful. Seventeen used non-petroleum (natural oil based) creams and of these 63% reported that they were moderately or very helpful. Ten of 19 who reported cold sores during chemotherapy, indicated their episode was worse than normal in terms of number of individual sores and length of active lesions. Patients were 2.5 times more likely to have cold sores if they had chapped lips.

Conclusion: As the incidence of chapped lips more than doubles during chemotherapy, this side effect, together with preventative lifestyle advice, has now been included in our patient information leaflets and website [2]. This survey suggested a potential association between chapping and cold sores, and a difference of effectiveness between petroleum and non-petroleum based (natural) creams. These issues are now being investigated within a double blind, randomised study comparing a specifically designed natural anti-inflammatory lip salve [3] against a standard petroleum-based salve with quality of life, severity of soreness and incidence of cold sores as it's end points.

References

[1] Kobayashi H (2004) British J Dermatol, 150:563–567.
[2] www.cancernet.co.uk, April 2009.
[3] All-nature lip salve. www.nature-medical.co.uk, April 2009.

4163 ORAL

Cancer pain management and perceived satisfaction of hospitalized Hellenic patients

E. Patiraki[1], S. Katsaragakis[2], E. Papathanassoglou[1], C. Dimoni[3], C. Tafas[4], M. Gianakopoulou[1], D. Papageorgiou[5], M. Lavdaniti[6], J. Lazaridou[7], C. Lemonidou[1]. *[1] University of Athens, Nursing, Athens, Greece; [2] Hellenic Cancer Society, Hellenic Cancer Society, Athens, Greece; [3] Sotiria General Hospital of Chest Diseases, Education, Athens, Greece; [4] University of Connecticut, Nursing, Connecticut, USA; [5] Euroclinic, Chemotherapy Dept., Athens, Greece; [6] Technological Institute of Thessaloniki, Nursing, Salonika, Greece; [7] St Savas Cancer Hospital, Outpatient Dept., Athens, Greece*

Background: The purpose was to explore hospitalized cancer patients' satisfaction with the effectiveness of pain management plans in Hellas.

Material and Methods: The sample (N = 201) consisted of hospitalized patients in a metropolitan public cancer hospital in Athens during a 9 month period. Inclusion criteria were patients reporting pain, who had no surgical procedure the previous 30 days, with good verbal communication in Greek, consenting to participate. Eligible patients were interviewed 48 hours after admission by one of the investigators, while another one collected data from their charts. The Patient Pain Interview by Dr B. Ferrell, and the Chart Audit Form by Dr M. McCaffery, validated for use in Hellenic patients were used for data collection.

Results: Patients' mean age was 61.53 (±11.7) years and 56.2% of them were female. At a scale 0−10, patients rated their pain at the time of the interview 4.94 (±3.05), during the previous 24 hours 6.75 (±2.85) and the previous week 7.04 (±2.78). The total daily dose of analgesics in morphine equivalents collected from charts (169.17±177.95) was significantly higher than the one reported by patients (121.46±146.88, $p = 0.019$). Despite that at a scale 0−10, on the average, patients rated their satisfaction with the prescribed pain management plan as 6.23 (±3.31), 31.7% of them were taking extra analgesics on their own regularly in addition to the prescribed ones. Moreover, participants rated the effect of pain on daily activities as 7.46 (±2.9) and on quality of life as 7.66 (±2.7). The reported satisfaction with the effectiveness of pain management associated negatively with the pain intensity reported at the time of the interview (rho = −0.326, $p < 0.0001$), and the previous 24 hours (rho = −0.211, $p = 0.005$). However there was no association between the degree of satisfaction with the reported effectiveness of pain management and equanalgesic doses of medications as reported by the patients or as documented in the charts. Additionally all measures of reported pain intensity associated with the perceived degree at which pain had affected patients' daily activities, and quality of life (rho = 0.244−0.359, $p < 0.0001$). However, no significant associations were detected between the degree of satisfaction with pain management and either the effect on patients' daily activities, or the quality of life.

Conclusions: The paradox of reported patients' satisfaction from cancer pain management despite the reported high pain intensity and pain impact on quality of life and activities of daily living, needs further investigation.

4164 ORAL

Improving cancer pain management through self-care: protocol for a cluster randomized multicenter trial

P. Jahn[1], M. Kitzmantel[2], P. Renz[3], A. Thoke-Colberg[4], I. Horn[5], M. Landenberger[6]. *[1] Martin-Luther-University Halle-Wittenberg Medical Faculty, Department for Health and Nursing Science, Haale/Saale, Germany; [2] Munich Technical University, University Hospital rechts der Isar, Munich, Germany; [3] Martin-Luther-University Halle-Wittenberg Medical Faculty, Department for Health and Nursing Science, Halle/Saale, Germany; [4] Munich Technical University, University Hospital rechts der Isar, Munich, Germany; [5] University Hospital Halle (Saale), Head of Nursing Administration, Halle/Saale, Germany; [6] Martin-Luther-University Halle-Wittenberg Medical Faculty, Department for Health and Nursing Science, Halle/Saale, Germany*

Background: Pain is with more than 80% prevalence one of the most frequent and distressing symptoms in cancer patients particularly in advanced stages of disease (Cheung 2009). For up to 90% of patients, sufficient pain relief can be obtained if adequate guideline-based treatment is provided (Meuser 2001). However pain remains often under treated due to institutional, health-care professional and patient-related barriers (Jacobsen 2009). This trial protocol is aimed to test the SCION (Self care improvement through oncology nursing)-PAIN program, a multi-modular structured intervention to improve self management in oncologic patients with pain (funded by German Ministry of Education and Research (BMBF FKZ 01GT0601).