

## **Journal Watch**

### **Dyspnea**

#### **A Randomized, Double-Blind, Crossover Trial of the Effect of Oxygen on Dyspnea in Patients with Advanced Cancer.**

**Reference:** Philip A *et al.* *J Pain Symptom Manage* 2006; 32(6): 541-550.

**Presented by:** Michael Christie, Family Medicine Resident during rounds at the Grey Nuns Tertiary Palliative Care Unit. June 12, 2008

#### **Abstract:**

Dyspnea is a common symptom in palliative care. Despite this, there is uncertainty regarding the role of oxygen to treat the symptom in patients with advanced illness. This randomized, double-blind, crossover trial examined the effect of oxygen versus air on the relief of dyspnea in patients with advanced cancer. Following the blinded administration of air and oxygen via nasal prongs, 51 patients rated dyspnea and indicated preferences for the blinded treatments. On average, patients improved symptomatically with both air and oxygen, and there were no significant differences between the treatments. The subgroup of 17 hypoxic patients overall did not demonstrate a significant difference between air and oxygen, despite having improved oxygen saturations when administered oxygen. Hypoxia was corrected in 13 of 17 patients using the treatment dose of 4L/min of oxygen. The experience of dyspnea is a complex, multifactorial phenomenon, with oxygen tension not correlating with the subjective experience. The administration of either air or oxygen via nasal prongs on average confers improvement of the symptom.

#### **Strengths:**

A well-designed study with appropriate blinding and a moderate number of enrolled patients.

Patients were allowed to use both treatments and decide themselves which was most beneficial.

#### **Weaknesses:**

Not controlled for etiology of dyspnea although may be more representative of the general palliative care population.

Subjective VAS scoring system.

**Relevance to Palliative Care:** This article provides additional evidence that dyspnea is a complex symptom in this patient population and either oxygen or air provide some relief to patients experiencing dyspnea.