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## Journal club

### Oxygen therapy is equivalent to room air for alleviating refractory dyspnoea

Palliative oxygen is commonly used for the treatment of dyspnoea in individuals with life-limiting illness who are ineligible for long-term oxygen therapy despite insufficient evidence for symptomatic benefit. This multicentre study investigated the effectiveness of oxygen compared with room air in this population group.

Between 2006 and 2008, 239 patients from Australia, the USA and the UK were randomly assigned to receive at least 15 h of oxygen (n=120) or room air (n=119) for 7 days. The primary outcome measured was 'breathlessness' using a 0–10 numerical rating scale recorded by the patient twice daily.

There was no significant difference in breathlessness between the two groups. Symptomatic improvement was appreciable in the first 72 h of intervention. A greater response was seen in the morning with oxygen therapy than with room air, but the response remained the same in the evening for both groups. The side effects of treatment and change in quality of life were similar in the two groups.

The authors conclude that oxygen is not superior to room air in palliative treatment of breathlessness; however, this study is limited by the lack of representation of the sickest patients in palliative care as only outpatients were recruited. In ineffective cases, alternative measures should be sought as medical gas therapy is restricted by cost, availability and logistic burdens.

► **Abernethy AP**, McDonald CF, Frith PA, *et al*. Effects of palliative oxygen versus room air in relief of breathlessness in patients with refractory dyspnoea: a double-blinded, randomised controlled trial. *Lancet* 2010;**376**:784–93.

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