

## Innovative approaches help sleep apnea sufferers benefit from CPAP

## December 1 2011

People with obstructive sleep apnea are more likely to stick to prescribed treatment when a partner or parent is involved with their treatment, according to a team of sleep researchers.

Obstructive <u>sleep apnea</u> occurs when the upper airway collapses during sleep. It is the most common type of sleep-disordered breathing, and chances of it occurring become more elevated in obese people.

The first line of treatment for sleep apnea is a non-invasive in-home treatment called CPAP, continuous positive <u>airway pressure</u> therapy. However, if patients do not use the equipment properly, or at all, it cannot help.

Amy M. Sawyer, assistant professor of nursing, Penn State, and her team are looking for the best ways to encourage patients to adhere to the CPAP treatment.

"There is <u>inconsistency</u> in how people use and adhere to CPAP," said Sawyer. "Patients are expected to use CPAP for the eight hours or so that they are asleep. Unfortunately, most patients do not use CPAP for the duration of their <u>sleep time</u>."

A CPAP machine is connected to a nasal, oral or full-face mask. The CPAP machine delivers positive pressure by air, which keeps the upper airway open and unable to collapse -- a definitive problem of obstructive sleep apnea sufferers. Keeping the airway open prevents drops in <u>oxygen</u>



<u>levels</u> during sleep and reduces sleep disturbance. As a result, people treated with CPAP have less daytime sleepiness, better cognitive function and generally feel more refreshed. Treating obstructive sleep apnea also lessens other <u>health risks</u>, including <u>cardiovascular disease</u> and diabetes.

The researchers were looking at different types of interventions to promote CPAP use, the team reports in the current issue of <u>Sleep Medicine</u> *Reviews*. Sawyer and her team looked at 80 studies to determine what works and what factors are important to consider when helping obstructive sleep apnea people start CPAP therapy.

"Collectively, these studies suggest that patients who experience difficulties and proactively seek solutions to resolve problems (active coping) are more likely to be adherent than those who use passive coping styles," the researchers noted.

Many different factors can affect whether or not patients follow through on their prescribed treatment -- disease and patient characteristics, treatment requirements, technological device factors and side effects, and psychological and social factors. One of the studies that the researchers reviewed showed that about half of newly diagnosed sleep apnea patients would not use CPAP if it made them feel claustrophobic.

Several intervention studies use telecommunications to help patients adhere to their treatment. This method can involve weekly phone calls or wireless telemonitoring of patients.

The researchers determined that CPAP adherence intervention should be done on a case-by-case basis. If social support is involved -- such as a parent or partner -- patients are likely to continue their treatment. With social support sources providing insight, CPAP users are more readily able to identify their own improvements with treatment. If patients do



not have social support available to them, then telecommunications may be a good option for them.

"This study highlights the need for individualized considerations for initiating and managing CPAP treatment with diverse patient groups," said Sawyer.

## Provided by Pennsylvania State University

Citation: Innovative approaches help sleep apnea sufferers benefit from CPAP (2011, December 1) retrieved 19 April 2024 from <a href="https://medicalxpress.com/news/2011-12-approaches-apnea-benefit-cpap.html">https://medicalxpress.com/news/2011-12-approaches-apnea-benefit-cpap.html</a>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.