

# Policy for the use of non-invasive ventilation for obstructive sleep apnoea hypopnea syndrome at home

**Category: Restricted**

## What is Non-invasive ventilation?

Non-invasive ventilation (NIV) is an external treatment used to help people with severe problems with breathing. It involves wearing a mask connected to a machine (ventilator) which makes breathing in and out easier. It supports the muscles in the lungs to work properly, especially during the night.

## Why is it used?

Everyone breathes in oxygen from the air to stay alive. The oxygen goes into the blood through the lungs. When the body has used the oxygen, it produces carbon dioxide which is breathed out. This is called ventilation.

Some people with severe lung problems are unable to breathe in enough oxygen and breathe out carbon dioxide which can lead to the lungs not working properly (hypoventilation and hypercapnia), a high heart rate and a possible heart attack.

## Hypoventilation and hypercapnia

This is when breathing becomes very slow that a low amount of oxygen is taken into the body (hypoventilation) resulting in a high amount of carbon dioxide in the blood (hypercapnia).

## What is NIV used to treat?

NIV is mainly used to treat a range of long-term breathing problems as a result of the lungs not working properly, muscle weakness or chest wall disorders.

## Obstructive Sleep Apnoea Hypopnea Syndrome

Obstructive sleep apnoea (OSAHS) is a condition where the walls of the throat relax and narrow during sleep which affects normal breathing and causes the airflow to be blocked for a few seconds or more. In some patients it can affect daily life and being able to sleep, eat, walk or drive on their own.

## Apnoea

Apnoea is where the walls of the throat relax and narrow, usually during sleep, which affects normal breathing. It causes the airflow to be blocked for 10 or more seconds.

## Hypopnea

This is a partial blockage of the airway that results in an airflow reduction of greater than 50% for 10 seconds or more.

## Treatment

The type of NIV most commonly used to help manage sleep apnoea is continuous positive airway pressure (CPAP).

Other treatments include lifestyle management such as losing weight, eating healthier and not taking sleep medicines. Specially made dental devices similar to a gum shield may be given to someone with mild sleep apnoea. Surgery to remove the tonsils or adenoids may be suggested; however, it is not considered to be very effective to help with obstructed sleep apnoea.

### Continuous positive airway pressure

Continuous positive airway pressure (CPAP) is a small machine that pumps a non-stop supply of compressed air through a mask. The mask may either cover the nose or the nose and mouth. The compressed air helps to stop the throat from closing. It is considered the most effective therapy for treating severe cases of obstructed sleep apnoea/hypopnea syndrome and must always be worn when sleeping.

## Eligibility Criteria

NIV for the use of CPAP at home is restricted. Patients with moderate or severe symptoms of obstructive sleep apnoea/hypopnoea syndrome must meet the following criteria to be approved:

- severe inability to function properly during the day which is impacting on the patient's ability to carry out activities of daily living  
AND
- lifestyle changes have not helped  
AND
- other relevant treatment options have not worked or are considered unsuitable  
AND
- have an Apnoea–Hypopnoea Index level between 15 to 30 or over.

This means the patient's NHS commissioning organisation (CCG), who is responsible for buying healthcare services on behalf of patients, will **only** fund the treatment if an Individual Funding Request (IFR) application has shown exceptional clinical need and the CCG supports this.