

# Audit of the outpatient use of Non Invasive Ventilation in a District General Hospital

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## Background

Domiciliary Non-Invasive Ventilation (NIV) was first introduced in Altnagelvin Area Hospital in 2001. The aim of this study was to assess the numbers of patients on domiciliary NIV, the reasons for commencing NIV and duration of NIV therapy. Results were compared with data from a similar audit in 2009.

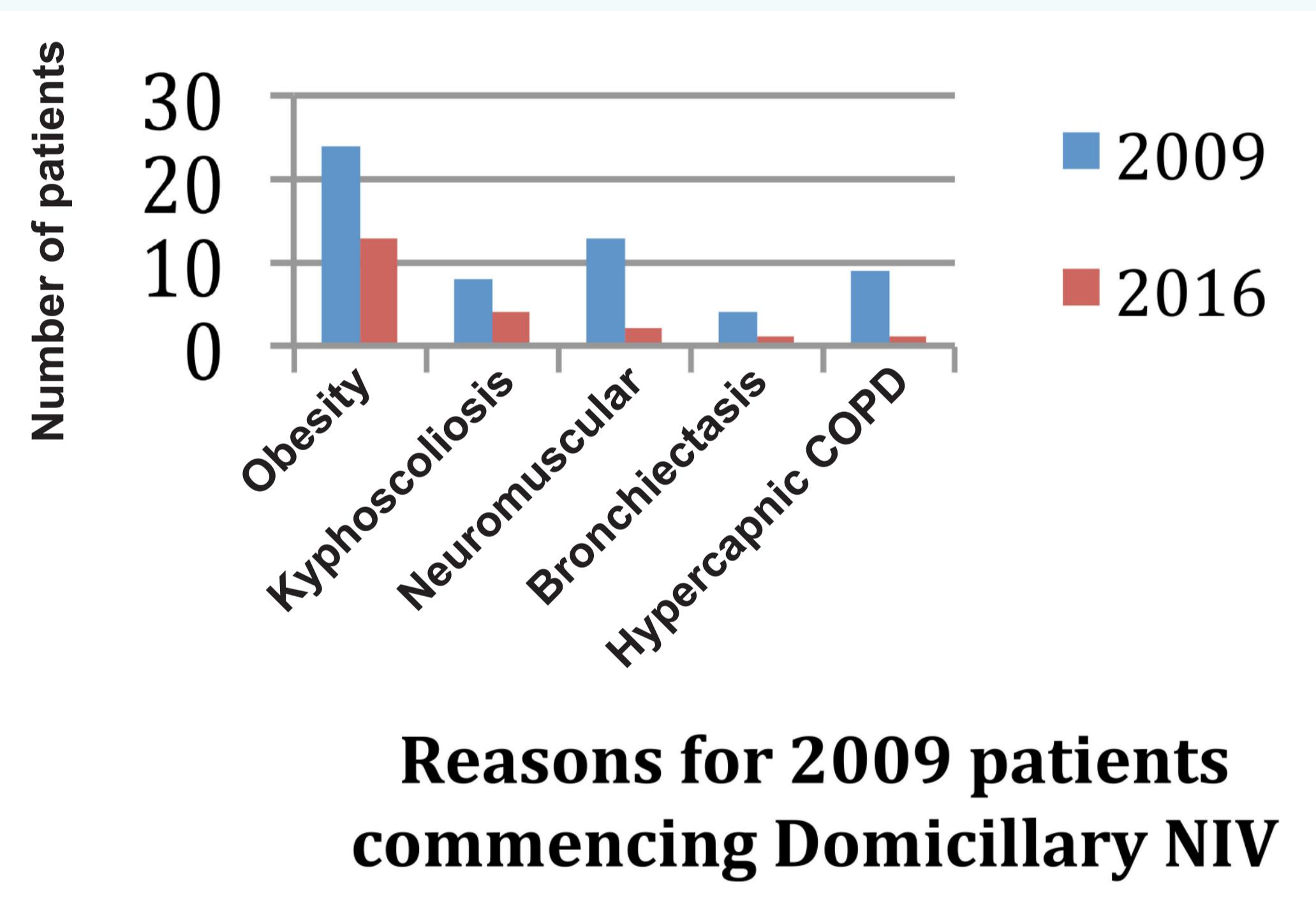
## Methods

This was a retrospective chart audit. All patients on domiciliary NIV on the 1st of August 2016 were included. Their age, year of commencement of NIV and reason for commencement were assessed. The findings were compared to 2009.

## Results

Ninety-one patients are currently on domiciliary NIV compared with 36 in August 2009.

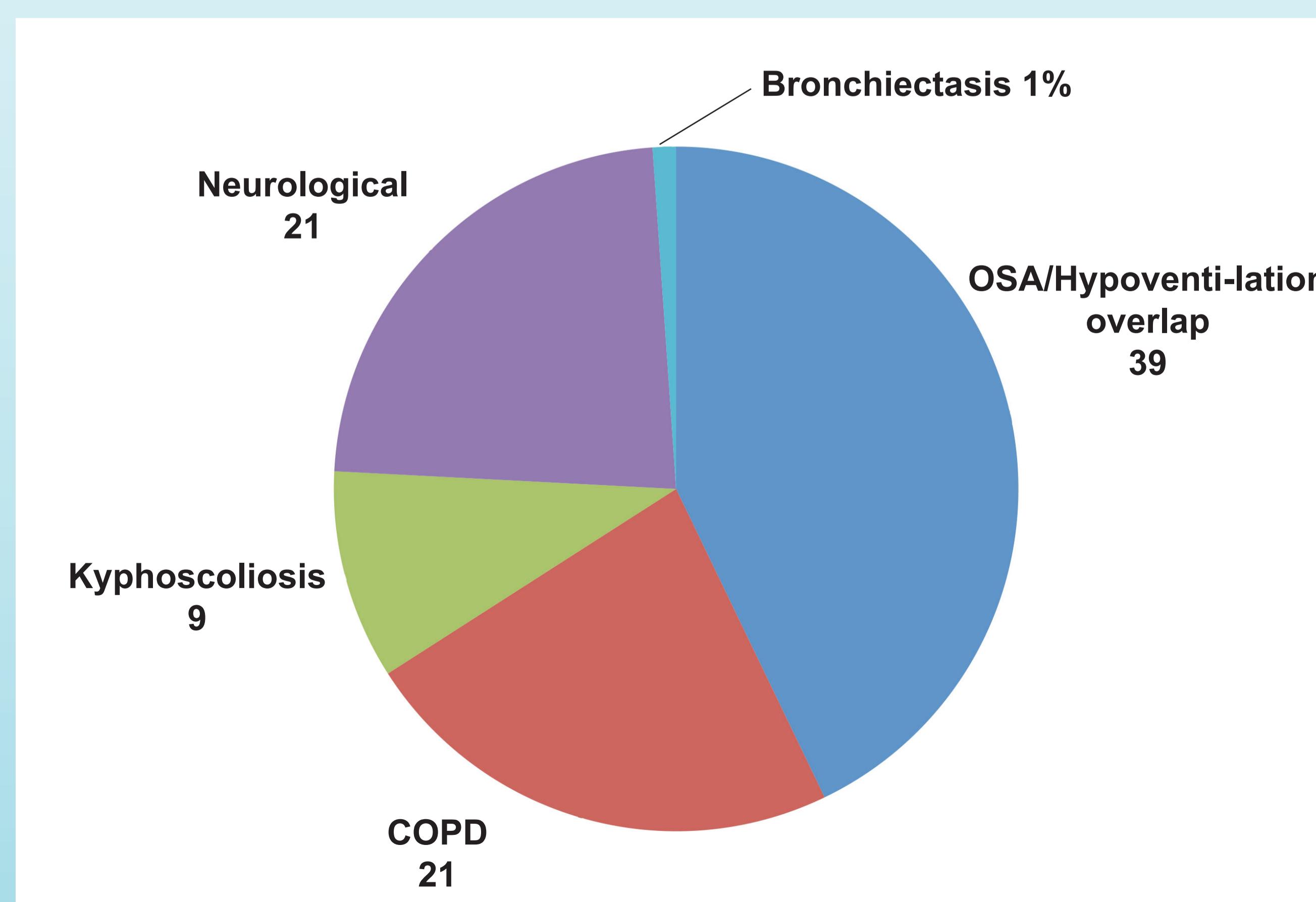
*21 of the 36 patients on NIV in 2009 have remained on NIV*



**Reasons for 2009 patients commencing Domiciliary NIV**

The reasons for commencing domiciliary NIV are varied but Obesity Hypoventilation/Obstructive Sleep Apnoea Overlap (OHS/OSA) remains the most common reason.

*Reason for patients commencing Domiciliary NIV*

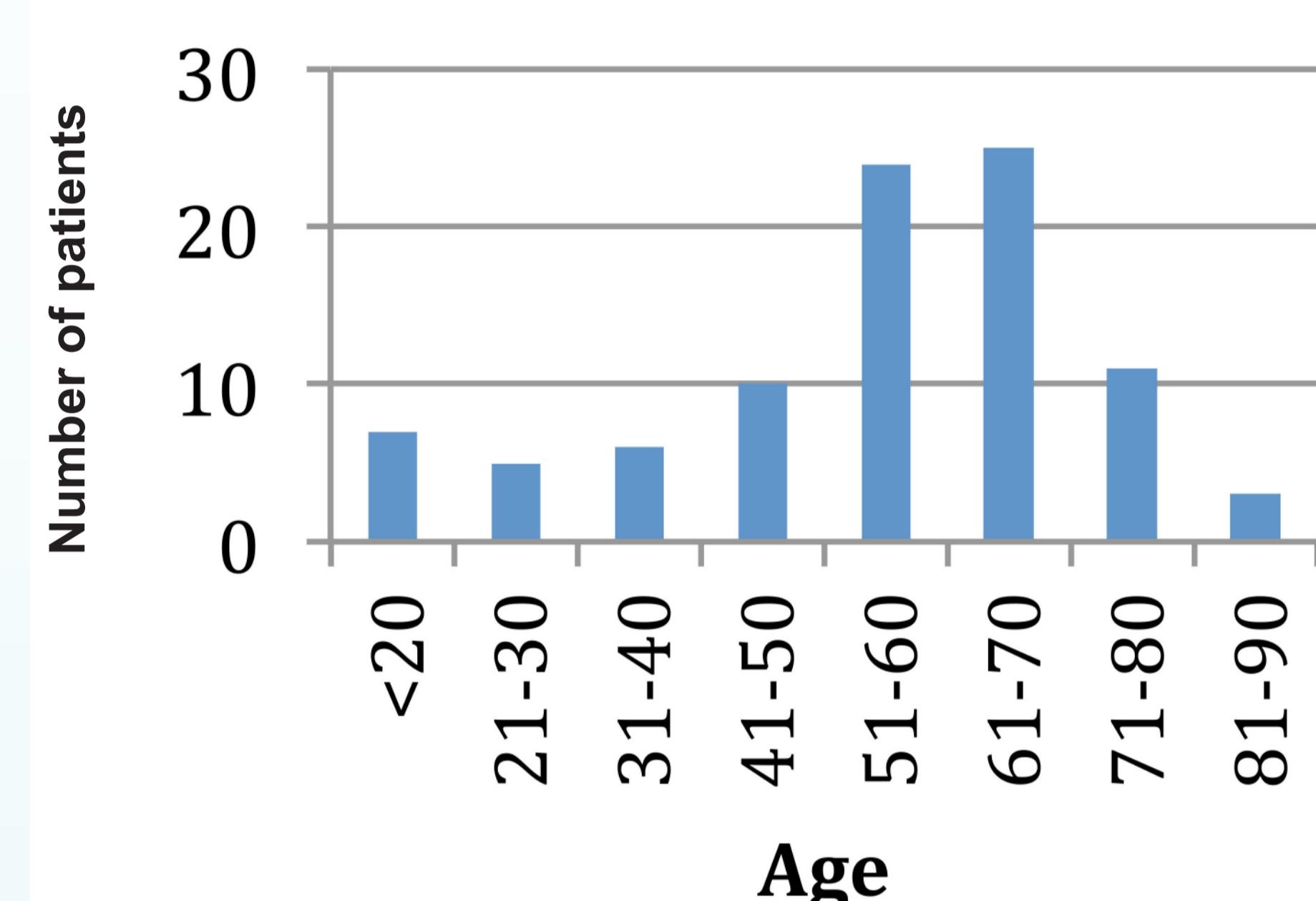


## Results (cont)

Neurological causes include motor neuron disease (7), Muscular dystrophy (6), Yunis Varon syndrome (1), Muscular myopathies (4) and Tetraplegic (3).

All patients under the age of 20 have been commenced on Domiciliary NIV for kyphoscoliosis or muscular dystrophy. In contrast to 2009 there are patients under the age of 30 on Domiciliary NIV for OSA.

*Age of patients when started on Domiciliary NIV*



Since 2009 there has been an increase in all age groups but most significantly in the 51-60 group, which has increased 5 fold.

## Conclusion

The numbers of patients on domiciliary NIV in this DGH has increased significantly over the past seven years. The reasons for starting NIV are similar to 2009. An increasing number of patients are surviving longer on NIV now compared to 2009 and this audit raises questions about the need to increase support for these individuals at home. Long term planning needs to include increased physiotherapy, respiratory nurse and palliative care support.