

# An acute Parkinson's Therapy Pathway; bridging the gap between hospital and home.

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## Background

- People with Parkinson's can often experience long hospital admissions, and frequently not discharged to their own homes to continue rehabilitation.
- Reports from people living with Parkinson's show that the hospital environment does not replicate their own home set-up
- Home-based rehabilitation programmes shown to be effective (Ashburn et al 2007, Antonini et al 2008).
- Home-based therapy shown to have positive advantages over day hospital based rehabilitation (Parker et al 2009).

## Aim

To develop a Parkinson's Therapy Pathway for the acute hospital setting, integrating early home-based assessment and therapy sessions, with seamless transition to community services.

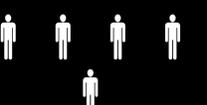
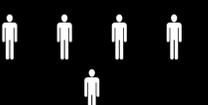
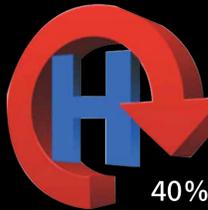
## Methodology

- Pilot study.
- Developed on PD ward (see poster #1033.00).
- Intervention group= patients on therapy pathway, control group= standard care.
- Initial data collected; length of stay, readmitted within 14 days, Lindop score on discharge, patient comments, Modified Barthel Index score on d/c and number of home visits.
- Not enough UPDRS data available to provide accurate analysis.
- Raw data then calculated to give mean average or percentage score.

## References

Ashburn A, Fazakarley L, Ballinger C, Pickering R, McLellan LD, Fitton C. (2007) A randomised controlled trial of a home based exercise programme to reduce the risk of falling among people with Parkinson's disease. *Journal of Neurology, Neurosurgery & Psychiatry* 78(7), 678-685  
 Antonini A, Miro L, Castiglioni C, Pezzoli G. (2008) The rationale for improved integration between home care and neurology hospital services in patients with advanced Parkinson's disease. *Neurological Sciences* 29(5), S392-S396  
 Parker SG, Oliver P, Pennington M, Bond J, Jagger C, Enderby PM (2009) Rehabilitation of older patients: Day hospital compared with rehabilitation at home. A randomised controlled trial. *Health Technology Assessment* 13(39)

## Results

Measure	Control Group	Interventional Group
<b>Sample Size</b> – There were 5 patients in both the control and intervention groups		
<b>Length of Stay (LoS)</b> – The mean average length of stay for patients in the interventional group was 7.2 days lower. Therefore the interventional group had an average length of stay 32.1% lower than the control group.		
<b>Readmissions</b> – Following discharge the patients in both groups were monitored for readmissions to an acute healthcare provider within 14 days. Despite the interventional group having a lower acute length of stay their readmission rate matched the control group		
<b>Modified Barthel on Discharge</b> – All patients had their performance in activities of daily living and mobility assessed on discharge using the modified Barthel index. The results indicate that despite the significantly lower hospital LoS the intervention patients had equivalent Barthel scores to the control group.		
<b>Lindop Score on Discharge</b> – All patients had their mobility assessed on discharge using the Lindop Parkinson's Assessment Scale. The scale runs between 0-30 with the mean average of the intervention group being 5.2 points (39.4%) higher.		

## Discussion

- Decrease in length of stay for intervention group
- On outcome measures, improved performance of patients through pathway increased compared to control group
- Intervention group= draw on resources
- Positive response from patients and carers
- Readmission rates remained stable in both groups

## Limitations

- Small patient population analysed; would need 178 to achieve 80% power on length of stay outcome measure.
- All patients were in the complex stage of Parkinson's- only analysing a subset of the population. Increasing the size of the group would allow greater inclusion.
- Patient population analysed from a short period of time, may be beneficial to extend the length of future studies.
- Incomplete data sets e.g. UPDRS

## Implications

- This pilot's findings suggest that a Parkinson's Therapy Pathway could reduce the length of time patient is in hospital.
- Suggests an improvement in outcome measure scores.
- This pilot has identified a future need for research into this area, analysing a larger patient population over a longer period of time.