DELIRIUM EPIDEMIOLOGY AND OUTCOMES: IS THERE VALUE IN A DELIRIUM BEST PRACTICE TARIFF?

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Introduction

Delirium is a common neuropsychiatric condition with acute onset and fluctuating alteration in cognitive function that complicates around 10% of all admissions.

Delayed diagnosis and management lead to prolonged delirium, increasing the risk of permanent cognitive decline, care home placement and mortality.

The Watford delirium liaison service receives fewer referrals than expected from higher-risk areas, including ITU and surgical wards.

Methods

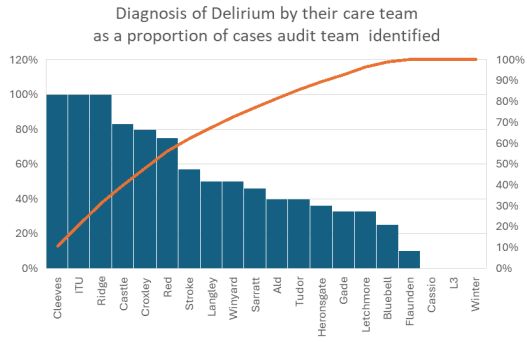
A spot audit was conducted of all >75-year-old inpatients, reviewing: location; delirium risk factors (frailty, care home resident, dementia); 4AT screening, documented delirium diagnosis; evidence of delirium in notes; presence of multifactorial management plans for those diagnosed with delirium.

At 90 days, outcomes were reviewed: mortality; place of discharge (institutionalisation); readmission (at 7/30/90 days), **with subgroup analyses of frail and orthogeriatric patients.**

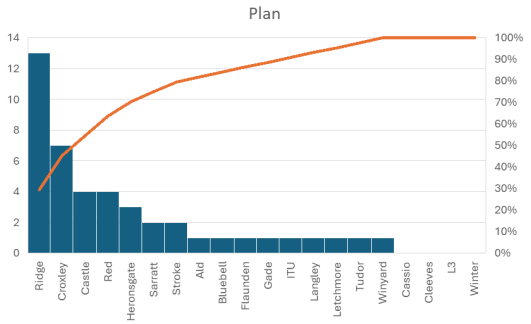
Results: delirium cases

216 patients were reviewed: 102 on CoE (care of the elderly) wards and 114 on other wards (3 ITU, 19 surgical, 66 medical, 26 orthogeriatric).

- 44% patients had evidence of delirium.
- 50% of all >75-year-olds and 50% of cases of delirium identified by the audit team were on the same 4 wards.
- The proportion of missed cases of delirium was high (40%).



- Frailty was the most common delirium risk factor (94%).
- Only 13% had a 4AT screen; no CoE patients had a 4AT.
- Few patients had a multifaceted plan.



Aims:

- Identify rates and distribution of delirium in all adults >75.
- Compare this to the rates of recorded diagnosis.
- Identify rates of appropriate multifaceted delirium management plans.
- Review outcomes for those with and without delirium, including mortality, institutionalisation and readmission.

Results: 90 day outcomes

- Significantly higher mortality in the delirium group (OR 2.28).
- Longer length of stay in delirium cases (+3 days), further prolonged if not diagnosed (average 28.5 days).
- Frailty is a significant risk factor for delirium (OR 3.26), mortality (OR 2.50) and longer length of stay.
- Orthogeriatric patients with delirium have lower mortality (OR 0.55), comparable LOS and fewer readmissions compared to other geriatric medicine wards:

	Orthogeriatric ward	3 CoE wards
Total patients	26	67
Delirium	13 (50%)	34 (51%)
Diagnosis Rate	**13 (100%)**	18 (53%)
Care Home	7 (27%)	6 (9%)
Frailty Score	5 (4.6)	6 (5.6)
Dementia	8 (31%)	12 (18%)
Management Plan	**13 (100%)**	12 (35%)
90 day mortality	**5 (19%)**	20 (30%)
Discharge destination escalation	6 (23%)	16 (24%)
Days of stay	27 (22)	26 (22.3)
Readmission rate:	**6 (23%)**	35 (52%)
7 days	**1**	7
30 days	**4**	23
90 days	**6**	35

Conclusions

- Delirium is concentrated on fewer medical and orthopaedic wards than expected.
- Orthogeriatric patients have significantly higher rates of diagnosis, delirium-focused plans and lower mortality and readmission rates.
- This suggests that a Best Practice Tariff, akin to that for hip fractures, mandating delirium screening for at risk, especially frail, patients on high risk wards may help improve outcomes, and that outcomes could be improved by focused interventions on a small number of wards.

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