Acute hospital care for frail older people – front door through to the back door.

Emergency department – evidence

Professor Simon Conroy
Outline

- Why this is an issue
- What is the issue
- What is the evidence
- What if it does not work
Why?

- Older people keep coming to hospitals
  - Admissions in the United Kingdom rose by 47% from 1998 to 2013, from 3.6 million to 5.3 million, costing the NHS £12.5bn

- Not easy to prevent ED attendances
  - Out of hours services: GP and wider urgent care system
  - Proactive multidisciplinary admission avoidance teams
  - Senior review in emergency departments
  - Increase service integration

- ED attendance → admissions
Waiting ≈ flow

Figure 2: Drivers of the decline in A&E performance against the four-hour target in Q3 2014/15
What is the issue? Evidence for the clinical mismatch

- Older people don’t ‘fit’ the current care models

- Delirium
  - Frequently missed
  - Worsened by waiting in ED
  - Complicates diagnosis and treatment
Frailty identification

- **Limited precision**


- **Use to prompt search for geriatric syndromes & signal change in approach**
What approach?

Why focus on the frail + Meet the MDT
Evidence for CGA in acute care

- 6839 patients in 13 controlled trials
- Less delirium RR 0.73, 95% CI 0.61–0.88
- Fewer falls RR 0.51, 95% CI 0.29–0.88
- Less functional decline RR 0.87, 95% CI 0.78–0.97
- Shorter LoS WMD −0.61, 95% CI −1.16 to −0.05
- More discharges home RR 1.05, 95% CI 1.01–1.10
- Fewer discharges to NH RR 0.82, 95% CI 0.68–0.99
- Lower costs WMD −$245, 95% CI −$446 to −$45

Comprehensive Geriatric Assessment

‘a multidimensional, interdisciplinary diagnostic process to determine the medical, psychological, and functional capabilities of a frail older person in order to develop a coordinated and integrated plan for treatment and long-term follow-up’
<table>
<thead>
<tr>
<th>Trial</th>
<th>Population</th>
<th>Intervention</th>
<th>RIP</th>
<th>Readmission</th>
<th>Functional decline</th>
<th>Admission to LTC</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yim, 2011 RCT</td>
<td>High risk older people (HK-ISAR)</td>
<td>Nurse led CGA and referral onwards</td>
<td>↔</td>
<td>↔</td>
<td>N/A</td>
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<tr>
<td>Caplan 2004, RCT</td>
<td>75+ discharged home (excluding NH residents)</td>
<td>Nurse led CGA and referral onwards</td>
<td>↔</td>
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<tr>
<td>McCusker 2003, RCT</td>
<td>Older people ISAR &gt;1</td>
<td>Nurse led CGA and referral onwards</td>
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<tr>
<td>Mion 2003, RCT</td>
<td>65+ discharged from ED</td>
<td>Nurse led CGA and referral onwards</td>
<td>↔</td>
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<td>N/A</td>
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<td>Miller 1996, CCT</td>
<td>65+ discharged from ED</td>
<td>Nurse led CGA and referral onwards</td>
<td>↔</td>
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<td>N/A</td>
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Interventions affecting disposition…

<table>
<thead>
<tr>
<th>Trial</th>
<th>Population</th>
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<th>Admission/ readmission</th>
<th>Functional decline</th>
<th>LTC</th>
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</thead>
<tbody>
<tr>
<td>Aldeen, 2014</td>
<td>ISAR ≥2</td>
<td>GEDI – nurse-led CGA (SW, pharmacist) &amp; phone FU</td>
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<td>Wright, 2013 CCT</td>
<td>70+</td>
<td>Full CGA and referral onwards</td>
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<td>Pareja-Sierra, 2013</td>
<td>Older people</td>
<td>Full CGA and referral onwards</td>
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<tr>
<td>Conroy, 2013 CCT</td>
<td>Frail older people</td>
<td>Full CGA and referral onwards</td>
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How strong is the evidence?

‘Although there is a large body of evidence on relevant interventions, much of it is weak, with only very small numbers of randomised controlled trials identified. Evidence is dominated by single-site studies, many of which were uncontrolled.’

**Frailty Screening**
We are assessing for frailty at every encounter with an older person using a recognised tool.

**Medical**
We are able to undertake a medication review. You are aware of tools that can be used to help medication reviews.

We are aware of the positive and negative predictive values of urine dips in older people, with and without lower urinary tract symptoms.

**Mental health**
We can identify cognitive impairment. We can differentiate delirium from dementia. We can identify delirium in the presence of dementia.

We routinely screen for depression.

**Functional**
We use a framework for assessing people who have fallen. We differentiate between syncopal and non-syncopal falls.

We are confident in the assessment and treatment to patients with reduced mobility, and can call on our therapists to help if needed within 30 minutes.

**Social**
Staff are aware if the patient has an End of Life plan (where applicable) and advanced directives plan (all).

We have strong links with community and social services to enable effective complex discharge planning/adjustment to care packages to offer appropriate support to patient's on discharge.

**Environment**
We assess the patient's home environment to ensure it is suitably adapted to support their needs.

The patient has access to engagement with their local community to prevent social isolation.

**Multidisciplinary Care Co-ordination**
We construct a problem list that describes the specific factors leading to a non-syncopal fall.

We are able to organise real-time MDT discussions for older people going home from ED identified as being at risk of readmission.

**Overarching person-centred care**
We know what is most important to the patient (person centred care)?
<table>
<thead>
<tr>
<th>DEMENTIA FRIENDLY DESIGN PRINCIPLES</th>
<th>Acoustics</th>
<th>Artwork</th>
<th>Ceilings</th>
<th>Colour</th>
<th>Decoration</th>
<th>Doors</th>
<th>Fixtures</th>
<th>Flooring</th>
<th>Furniture and fittings</th>
<th>Lighting</th>
<th>Reminiscence hardware and software</th>
<th>Signage</th>
<th>Walls</th>
<th>Windows and transparent panels</th>
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</thead>
<tbody>
<tr>
<td>1. Promote a safe environment</td>
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<td>2. Provide optimum levels of stimulation</td>
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<td>3. Provide optimum lighting and contrast</td>
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<td>4. Provide a non-institutional scale and environment</td>
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<td>5. Support orientation</td>
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<td>6. Support way-finding and navigation</td>
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<td>7. Provide access to nature and the outdoors</td>
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<td>8. Promote engagement with friends, relatives and staff</td>
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<td>9. Provide good visibility and visual access</td>
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<td>10. Promote privacy, dignity and independence</td>
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What if - challenges

- CGA takes some time…
  - It needs coordination
  - It needs communication
  - It needs some expertise
  - Geriatricians are too few and too expensive
  - Process > structure

- Need to develop GER MED competencies in ED context…
- Geriatric Emergency Medicine