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Considering frailty and meaningful outcomes in geriatric emergency care

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Considering frailty and meaningful outcomes in geriatric emergency care

Dear Editor,

Geriatric emergency medicine (GeriEM) uses holistic principles to deliver person-centred, goal-oriented care to acutely unwell or injured older people living with frailty. Professionals should adopt an inquisitive and pragmatic approach to complex decision-making [1]. GeriEM has not been shown to improve current common acute care quality measures such as emergency department (ED) lengths of stay, but may enhance patients' attainment of personal health goals and quality of life outcomes [2].

GeriEM and quality of life go hand-in-hand, as management plans for those older people living with frailty focus on improving quality rather than necessarily longevity of life. Since the personalised impact of geriatric emergency care cannot be evaluated using just service metrics, patient-reported outcome measures (PROMs) have been proposed as additional means to support research, service improvement, and clinical care. PROMs are questionnaire instruments with psychometric reliability and validity for defined conditions.

We recently reported the validation of a novel PROM for older people living with frailty receiving acute care. PROM-OPAC is an eight-item measure of *enablement* under categories of *self-determination* and *security* [3]. The study recruited people aged 65+ with Clinical Frailty Scale (CFS) 5-8, corresponding to mild to very severe frailty. CFS quantifies frailty using clinician judgement of activity, independence, and prognosis and has consistently been associated with mortality during and up to one year following acute care attendance, as well as acute hospital lengths of stay and readmission rates [4, 5]. Lower CFS scores might help identify older people for whom restorative treatment should be considered, while higher scores indicate potential benefit from holistic, person-centred care paradigms [1].

While designing PROM-OPAC construct validity analyses, we made the incorrect hypothesis that scores would worsen with more severe frailty, having assumed that people would lose agency or certainty of their situation. Ultimately no such relationship was evident [3]. Here, we reflect upon the reasons for and implications of this finding, aiming to better understand relationships between frailty, outcome goals, and outcomes.

We had previously reported a study administering the EuroQol EQ-5D-5L to older people living with frailty who were receiving acute care [6]. This considers mobility, ability to self-care and conduct usual activities, pain and discomfort, and anxiety and depression. More severe frailty was associated with more severe problems in all domains except pain and discomfort. Why, then, was there no such association with the PROM-OPAC administered to the same patient sample?

The EQ-5D and CFS are both weighted towards physical function. The former requires self-report of physical performance, while the latter demands clinician judgement of the person's baseline fitness and need for assistance, and these might reasonably be expected to correlate. EQ-5D could be expected to be responsive to certain healthcare presentations such as severe illness or injury causing immobility or loss of independence. As we found, though, the domains would also be largely determined by respondents' premorbid situations and frailty. This seems to raise the question whether the EQ-5D is an appropriate measure in the geriatric emergency care setting, as collinearity with pre-existing frailty might limit sensitivity in response to acute insults.

The PROM-OPAC, meanwhile, assesses situational rather than physical autonomy. In the validation study, attainment of agency-related goals appeared to be unrelated to respondents' degree of frailty and our hypothesis was proven incorrect. Other researchers have since found no differences between CFS categories in people's health outcome goals such as extending life, staying independent, and preventing nursing home admission [7]. PROM-OPAC constructs were elicited through qualitative enquiry and now seem generic to all older people (and even perhaps all adults) rather than being important just to those living with frailty. The scores are largely determined by the quality of healthcare intervention delivered rather than the healthcare situation prompting that intervention, explaining the absence of association with frailty.

So, while we found correlation between frailty and self-reported functional quality of life, these did not appear to determine the patient-reported outcomes from acute care. The PROM constructs are therefore distinct from those outcomes represented in current service metrics. This finding would reinforce the principle underlying geriatric emergency care, that excellent person-centred care attending to agency and security can and should be provided for all.

Where does this leave the Clinical Frailty Scale, if frailty does not predict important person-reported outcomes? Despite ongoing conundrums around appropriate thresholds and limitations of prognostic value at the individual level, there is so far little evidence disputing that the CFS is a valid predictor of cohort mortality and morbidity. The CFS remains an important tool for risk stratifying older people attending acute and emergency care settings. Indeed, it is widely recommended and, in many settings, mandated for use as a screening tool to identify those older people with increased vulnerability to healthcare harms and poorer service metrics. Are such screening interventions still fit for purpose? Wilson & Jungner's principles of screening are now recalled with regards to frailty (Table 1) [8].

Table 1: Wilson and Jungner's screening principles and their observation in acute frailty care

Screening principle	Observation in current acute care screening
1. The condition should be an important health problem.	Yes. It is widely accepted that people living with frailty have poorer outcomes in acute care
2. There should be an accepted treatment for patients with recognised disease.	Questionable. Comprehensive geriatric assessment is recommended and improves

	meaningful outcomes, but this may not 'treat' or reverse the condition
3. Facilities for diagnosis and treatment should be available.	No. European emergency care settings typically do not cater for the assessment and management of older people living with frailty
4. There should be a recognisable latent or early symptomatic phase.	Yes. Condition definitions and screening tools include categories such as 'pre-frailty' or 'very mild frailty'
5. There should be a suitable test or examination.	Questionable. Frailty is typically measured using the Fried phenotype or a Frailty Index approach in studies, neither of which are used widely in clinical practice. The CFS approximates to but is not synonymous with the Frailty Index.
6. The test should be acceptable to the population.	Yes. Qualitative studies have found older people to appreciate comprehensive assessment and intervention
7. The natural history of the condition, including development from latent to declared disease, should be adequately understood.	Questionable. The frailty phenotype and its progression are widely recognised, but the underlying pathophysiology is poorly understood
8. There should be an agreed policy on whom to treat as patients.	Yes. Healthcare systems using the Clinical Frailty Scale use level 4 or 5 as the threshold to prompt geriatric emergency care
9. The cost of case-finding (including a diagnosis and treatment of patients diagnosed) should be economically balanced in relation to possible expenditure on medical care as a whole.	Questionable. Person-centred care probably reduces hospital investigations and shortens admissions, but wider system healthcare economics have not been definitively evaluated
10. Case-finding should be a continuous process and not a "once and for all" project.	Questionable. Post-implementation concordance with acute care frailty screening programmes represents only around 50% attenders and disproportionately excludes people from minority groups

There is no point screening for frailty if no action is taken based on the results, and indeed poor professional concordance with post-implementation screening might be expected if there is no observable purpose. What should this action comprise, and what should it aim to achieve, given that the gold standard intervention has not been shown to reverse the mortality or lengths of stay which the CFS is used to predict? With growing evidence that outcome goals are independent of frailty, it seems that CFS thresholds should serve to initiate clinical conversations rather than as care planning triggers to prompt or restrict certain interventions.

Perhaps the CFS might serve as a common language among acute professionals across settings, supporting identification of those people for whom a care paradigm based on person-centredness might be particularly appropriate. Those older people with less severe frailty will be functionally similar to younger people and, when resources are pressured, will often be appropriately cared for using condition-specific emergency care protocols which support prompt management of well-defined problems. Meanwhile those with more severe frailty, who characteristically have multiple

problems, should have attention assigned to eliciting and orienting management around their personal outcome goals.

Frailty and function alone appear not to determine individuals' preferred or attained meaningful outcomes. Geriatric emergency care must therefore extend beyond these criteria to comprehensively consider and address goals using person-centredness. Broadening outcome measurement using a tool such as the PROM-OPAC may help achieve this ambition.

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