Acute hospital care for frail older people

Community-based alternatives can provide safe and effective ways of managing the demand for inpatient hospital care for older people [1–3]. Patients and carers prefer home treatment where possible. However, the diversion of less severe or less complex acute care into the community can only increase the average levels of illness severity and complexity among those admitted to hospital. Therefore, as the population demography and community-based acute care processes change and develop, the provision of effective inpatient care for frail older people is becoming a key issue.

In NHS hospitals in England in 2004–05, of 2.5 million episodes of care in which the main specialty was General Medicine, 77% were emergency admissions, and 63% of admitted patients were >60 years [4]. Among this majority of older inpatients in acute hospital care lie the frail older inpatients who are at high risk of adverse clinical outcomes [5]. The precise prevalence of frailty in the acute hospital setting will depend on the definition used [6], but as an example, depending on the setting and age group, the prevalence of cognitive dysfunction (which is a key marker of frailty) [7] is estimated at between 15% and in excess of 50% of older inpatients [8,9].

The concept of frailty is now relatively well defined in multiple domains, and practical tools exist to detect and measure it in the clinical setting [10]. The presence of frailty associates with key clinical syndromes in disease presentation [11]. These clinical syndromes are recognised by geriatricians as the bread and butter of geriatric medicine, namely loss of mobility, falls, confusion, incontinence and polypharmacy. Measures of frailty in some populations have been shown to be more effective predictors of outcome (principally mortality) than conventional clinical measures such as diagnosis, specific disease severity or age [12,13]. Therefore, among older hospital inpatients, those showing signs of frailty are at particular risk of adverse outcomes such as death and institutionalisation and stand in need of specific and effective intervention.

The modern general hospital may contribute to the incidence of adverse outcomes for frail older people. For example, the rapid pace and technological focus of modern medicine, attitudes towards the elderly, inappropriate drug use and clinician skill mix may all conspire against the early recognition and the appropriate management of frailty factors such as delirium [14].

If acute hospital admission is unavoidable, the fabric, processes and personnel can be adjusted to lessen the impact on the frail elderly. Older hospital inpatients need a more broad-based diagnostic/therapeutic approach to care than younger patients. Comprehensive geriatric assessment (CGA) is a set of approaches that can be used in hospital inpatients [15–17], ambulatory and nursing home care [18–20]. In CGA programmes, the multidisciplinary, multidimensional nature of the assessment of health, rehabilitation and social care needs is formalised. These assessments are then used to inform or prompt treatment and management recommendations which may be carried out in dedicated inpatient units, provided as recommendations to the referring physician or team, or delivered in the patient’s home or other ambulatory care setting such as the day hospital or outpatient clinic.

For older hospital inpatients, dedicated units in various forms have been shown [21] to be effective ways to deliver CGA and are associated with benefit in immediate functional outcome and subsequent mortality. The concept of the inpatient unit for frail older people has developed to include stroke and hip units [22], nurse-led units [23], geriatric assessment and acute care for elders (ACE) units [24,25]. A particular issue in the management of frail older inpatients is the high prevalence of delirium and its association with adverse outcomes [5,14]. Recently, the ACE unit concept has been expanded to include a specific delirium care environment [26], and multicomponent intervention to prevent delirium in older hospitalised inpatients has been described and evaluated [27].

Key features of these acute care processes for frail older people include a defined physical environment, admission processes which identify the problem and target the appropriate assessment processes, assessments which incorporate the principles of CGA, management to avoid unnecessary environmental or physiological stresses which may precipitate delirium and discharge arrangements which function across the hospital/community interface [14,21,24,25,28].

An appropriate physical environment includes the provision of safe flooring, safe wandering space and orientation cues such as large clocks and calendars. Aids to mobility and self-care, such as handrails, raised toilet seats and large handles are also recommended.

Admission processes include the facility to augment home care and avoid hospital admission where feasible, medical, functional and nutritional assessments, the early identification of patients with delirium or dementia (or both) and processes for early assessment and transfer to an appropriate physical environment.

Assessment and management processes are structured and multifactorial [21], including daily review of physical, cognitive and psychosocial function and the use of protocols to improve self-care, continence, nutrition, mobility, sleep, skin care, mood and cognition. An essential element of good practice in this area appears to be the multidisciplinary team rounds, which happen often (up to five times per week in published studies).

Nursing processes that emphasise non-pharmacological approaches to challenging behaviour, the absolute avoidance of physical restraint and catheterisation are key elements of
the processes of potential benefit to frail older people, particularly those with dementia or at high risk of delirium.

Discharge arrangements support effective and sustained transfer back into the community and where they are effectively organised across the hospital/community interface can improve readmission rates. Good discharge practice therefore implies effective working across institutional boundaries and may require innovative solutions and specific local working arrangements.

Although older people remain the major consumers of inpatient hospital services, there is a strong imperative to ensure that acute hospital facilities are designed to meet their needs. This means targeting specific health technologies as outlined above, ideally in our view, in a specialised and dedicated location.

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References