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Skilled Nursing Facilities and Post Acute Care

Yahya Murad*

Geriatrics Center Clinics, University of Michigan Health System, USA

Abstract

The rapid growth in the number of the elderly has created an unprecedented challenge to the current health system. Taking care of the frail elderly continue to face significant barriers achieving the desired and optimal care. The elderly are most vulnerable for higher rate of complications in the post acute care of their illness either due to mental, physical or psychosocial impairments, requiring multiple interventions needed on many fronts. Skilled nursing facilities are an essential part of the post acute geriatric care.

Post acute care (PAC) encompasses a wide range of health care services that share the goal of restoring recently hospitalized patients to the highest level of functioning possible. Patients can access PAC services in a wide range of settings, including skilled nursing facilities (SNFs), inpatient rehabilitation facilities, long-term care hospitals, and in their own homes, with services from home health agencies [1]

In this brief review, we will focus on key elements in the skilled aspect of the post acute care as a merging factor in the long term nursing facilities.

Keywords: Elderly; skilled nursing facilities; nursing home; post acute care; subacute service

Aging Population

The health care needs for older Americans continue to be a challenge for health care providers as the number of frail elderly continues to rise. Between 2010 and 2050, the United States is projected to experience rapid growth in its older population. In 2050, the number of Americans aged 65 and older is projected to be 88.5 million, more than double its projected population of 40.2 million in 2010. The baby boomers are largely responsible for this increase in the older population, as they will begin crossing into this category in 2011 [2]. Each year, more than 10 million Medicare beneficiaries are discharged from acute care hospitals into postacute care (PAC) settings , including inpatient rehabilitation facilities, skilled nursing facilities, and homes with services from home health agencies [1]. This demographic transition will create new challenges confronting every sector of the health care system.

Increase Health Cost

Health care costs have been rising for several years. Expenditures in the United States on health care surpassed $2.3 trillion. In 2008, U.S. health care spending was about $7,681 per resident and accounted for 16.2% of the nation's Gross Domestic Product (GDP); this is among the highest of all industrialized countries. Total health care expenditures grew at an annual rate of 4.4 percent in 2008, a slower rate than recent years, yet still outpacing inflation and the growth in national income [3]. It is a widely held belief that the cost of acute hospital care increases with age among older persons [4-6] However, experts agree that aging of the population contributes minimally to the overall high growth rate of health care spending [7]. Hospital spending represents approximately one third of total national health care cost [3].

Health Risks of Hospitalization in The Elderly

Elderly individuals with long-term care are at particular risk for hospitalization . One in six nursing home (NH) residents are hospitalized within any given 6-month period [8] with almost 40% of community-dwelling elderly long term care (LTC) recipients are hospitalized each year [7].

Older patients are often diagnostically challenging, and their clinical presentations are often atypical or influenced by underlying comorbidities. As a consequence, they are admitted more often than their younger counterparts to the hospital and intensive care units [10-12], despite that hospitalization has shown to carry significant risk for this population [13,14].

The dangers of hospitalization for older patients are well recognized and include loss of independence, secondary medical problems (delirium, immobility, sepsis, pressure areas and thromboembolic disease), adverse drug effects and other iatrogenic diseases and the increased risk of institutionalization [15-18]. According to Naylor, four overlapping categories of problems have been associated with acute hospitalizations among older adults: poor communication, preventable declines in health status, inadequate discharge planning, and serious gaps in care during transfers to and from hospitals [19].

In a review of the literature on hospitalizations of the elderly from nursing homes, Castle and Mor [20] concluded that admission to an acute-care hospital can be traumatic. Frail older patients can suffer a number of iatrogenic problems while in the hospital for acute care. Indeed, after being hospitalized, many nursing home residents return to the nursing home more functionally and cognitively impaired [21]. Research has suggested that certain conditions such as pneumonia [22,23] and infections [24] can be treated at least as well (if not better) in the nursing home compared with a hospital.

Post Acute Care

Post acute care (PAC) encompasses a wide range of health care services that share the goal of restoring recently hospitalized patients to the highest level of functioning possible. Patients can access PAC

***Corresponding author:** Yahya Murad, Geriatrics Center Clinics, University of Michigan Health System, USA, Tel: 734-936-2519; Fax: 734-647-8535; E-mail: yahya@umich.edu

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services in a wide range of settings, including skilled nursing facilities (SNFs), inpatient rehabilitation facilities, long-term care hospitals, and in their own homes, with services from home health agencies [1].

Inpatient rehabilitation facilities are certified as hospitals oriented toward rehabilitation and run by physicians specialized in physical medicine and rehabilitation. They must provide at least 3 hours of multidisciplinary therapy a day. While, skilled nursing facilities (SNFs) or subacute care units are medical rehabilitation services provided for patients who are not in the acute phase of their illness but require higher level of care than can be provided in a long term care setting. Although there is no clear definition of subacute service term in the literature, it is commonly used for care that falls between acute-hospital and long-term rehabilitative care. There is wide spectrum of medical and surgical patients who are stabilized that no longer require acute care services but are too complex for treatment in a conventional nursing center.

Skilled Nursing Facilities

The role of long term care facilities has changed significantly over time. In the 1970s and early 1980s, nursing homes provided mainly custodial care to long term residents. Many of those residents are cognitively impaired and have significant impairment in their functional status. Over time, a series of policy and market changes has affected the postacute aspect of the nursing home sector [25].

Currently, many nursing facilities provide skilled care to medically complex patients that often require a high level of medical needs. SNFs provide a wide range of services to patients, including nursing care, physical, occupational, respiratory, speech therapy, and medical social services. It covers different clinical conditions varying from brain injury rehabilitation, high intensity stroke, and orthopedic programs with post surgical recovery, complex wound care and specialized infusion therapy. To qualify for Medicare skilled nursing facility services, a beneficiary must require daily skilled nursing or rehabilitative therapy services, generally within thirty days of a hospital stay lasting at least three days and must be admitted to the nursing home because of a condition related to that hospitalization [26].

Medicare offers full coverage on the first 20 days and partial coverage for days 21-100 based on the Minimum Data Set mandated by the Centers for Medicare and Medicaid Services (CMS). SNFs must follow a physician's plan of care, provide physician oversight within 30 days, have nurses on staff 8 hours a day, and have nurses on call 24 hours each day. Most programs utilize a team approach and focus on multi medical and surgical conditions.

According to the 2010 Data book providing information on the national health care and Medicare spending, the number of inpatient rehabilitation facilities declined slightly in 2009, while the total number of SNFs has remained about the same for the last four years. The mix of facilities continues to shift from hospital- based to freestanding facilities. Hospital based facilities make up 7% of all facilities, down from almost 11% in 2001. Freestanding SNFs made up 93% of facilities in 2008 [27]. The most common diagnoses for a SNF admission in 2007 was a major joint and limb reattachment procedure of the lower extremity, typically a hip or knee replacement. The number of SNFs that admitted medically complex patients continued to decline.

Advancing the Post Acute Care

The rising trend toward rapid hospital discharge following acute hospital admission drove many skilled nursing care facilities to expand their post-acute care and rehabilitation services. This pressure to decrease the length of acute hospital stay has resulted in many patients (especially the elderly) being discharged prior to full functional recovery [28] making them susceptible not only to a decline in physical health, but also to a decline in psychosocial well-being [29]. Most residents admitted to the Post acute care service in SNFs following an acute hospital stay may not be medically stable. They mostly require further initial medical management either related to their primary diagnosis, psychosocial care or even complications of recent hospitalization.

Historically, post acute care delivered in long term facilities has been fragmented, with relatively limited interdisciplinary input or active involvement of the physician as the primary care provider of the subacute service [30,31]. As a result, these patients often experience potentially avoidable increased SNF lengths of stay, increased rehospitalizations, decreased discharges to home, and increased visits to the emergency department upon returning home [32].

Geriatric Focus

These adverse impacts can be successfully prevented by creating a comprehensive geriatric assessment (CGA) program, [33,34] or geriatric evaluation and management process. Familiarity and proficiency of the common geriatric syndromes allow for the implementation of preventive treatment strategies early on, which can reduce cost and optimize outcome. Interdisciplinary approach in this process is essential to the delivery of quality care [35]. Recent literatures suggest that quality of care in various settings, including skilled nursing facilities, is related to physician involvement and physician staffing patterns [36-39]. Physicians should be prepared to be available to see residents as often as the medical conditions require. They must have the knowledge and understanding of the regulatory requirements about the unique environment of nursing home setting while able to identify best practices and evidence based medicine for elderly frail medical and surgical patients in the post acute care phase of their illness. In a retrospective observational pilot study by Kauh et al. [40] a multi team approach headed by a geriatrician in a Geriatric Rehabilitation Unit (GRU) within the skilled nursing facility showed much better outcome in comparison to usual care (UC) provided in the skilled nursing facility. At discharge from the skilled nursing facility, GRU patients showed greater improvement in activities of daily living (ADLs), mobility and shorter length of stay. At 1 year, GRU patients had significantly fewer hospital readmissions and fewer emergency department (ED) visits. Further studies using a randomized design are still needed to support those findings.

Prevention and Early Intervention

Early intervention and prevention is another key element to avoid hospitalization and medical complications. According to the Commonwealth Fund–supported study, researchers tested a program called Interventions to Reduce Acute Care Transfers (INTERACT) II that helps nursing home staff identify, assess, communicate, and document changes in residents' status. INTERACT II comprises three main tactics: identifying, assessing, and managing conditions to prevent them from becoming severe enough to require hospitalization; managing selected conditions, such as respiratory and urinary tract infections, in the nursing home itself; and improving advance care planning and developing palliative care plans as an alternative to acute hospitalization for residents at the end of life. The intervention was evaluated in 25 nursing homes over a six-month period. The 25 nursing

homes that completed the program experienced a 17% reduction in hospitalization rated compared with the Same six-month period in the previous year [41].

Creating New Quality Measures

In today's changing healthcare environment and highly complex needs of frail elderly people, a medical care provider in the skilled nursing facility continue to face significant challenges and constrains to improve standards of care, outcomes and quality service. Yet, in the era of standardization of medical care and application of evidence-based medicine touching every aspect of our medical practice, we continue to lack the medical expertise and work to improve our quality indicators on how to care for our frail elderly patients in different settings, including the post acute care mainly in the skilled nursing facilities .

Gaps in the knowledge of the skilled geriatric care where very little research has been conducted still widely exist. We believe, however, that standardized evidence- based guidelines and quality indicators can be established for many treatment areas of the post acute care in the skilled nursing facilities.

There have been significant changes since the publication of the landmark report by the Institute of Medicine (IOM) in 1986 calling for major revisions in the way quality is monitored at nursing homes [42]. In 2002 the Centers for Medicare and Medicaid Services (CMS) released Nursing Home Compare, a Web-based guide detailing quality of care, inspection results, and staff data at more than 17,000 Medicare- and Medicaid-certified nursing homes [43]. Early evaluations of Nursing Home Compare found that many targeted quality measures improved like pain control, use of physical restraints and rates of delirium [44,45]. However, improvements were largely limited to areas of care that are directly targeted by incentives and did not extend to broader measures of quality like the level of direct involvement of care providers, number of patients visits, the level of collaboration between the facility and the hospitals for safe transitional care [44].

Creating new quality indicators and methods to measure its effectiveness should be an essential aspect of the success of any skilled nursing home facility.

In today's litigious climate, physicians should develop knowledge and expertise in the area of postacute care pertinent to their practice environment with more focus on the high risk area for litigations including pressure ulcers, nutrition and hydration in addition to falls and injuries [46].

Multidisciplinary Approach

Team work and familiarity with the staff at the facility is crucial to the practicing physician since he must rely on information provided verbally or electronically to make medical decisions related to his patients' wellbeing. The care for this clientele requires collaboration between different services and providers to achieve a common goal of quality and patient satisfaction.

Physicians must regularly communicate effectively with both patients and other health professionals for optimal care. Increased patient-physician communication is associated with improved outcomes [47]. Medico-legal case reports have associated poor interphysician communication with serious adverse outcomes [48].

Studies also demonstrated that collaboration with midlevel practitioners including nurse practitioners (NPs) and physician assistants (PAs) in the post acute care period enhanced overall patients care, reduced emergency department use and hospitalization [49-51].

Utilization of pharmacy consultants, monitoring for drug interactions, pharmacotherapy optimization and medication reconciliation during the various transfer process of the residents may also result in improvement in health care outcomes. Discussion and review of treatment goals and post discharge plan between the patient and family using an interdisciplinary team approach is crucial for success.

Introduction and usage of computerized medical systems in nursing homes clearly could improve the coordination and integration of different aspect of patient care starting from the inpatient hospital setting through the skilled care phase and home care ending in the safe hands of the community care provider.

Future Outlook

For many generations, skilled nursing facilities were considered a refuge of last resort. However, in the environment of rising pressure to curb down on acute care expense and avoid unnecessary hospital costs the skilled care arena is one key option to streamline costs for health care providers and policy makers while taking care of our aging population. Nursing home transformation to this new model of care and maintaining the humane aspect while embracing flexibility with resident self-determination is an essential part of any successful future outlook . Policy makers can also encourage this change and capitalize on its transformational power through regulation, reimbursement, public reporting and other mechanisms.

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