Gruppo di ricerca geriatrica

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La complessità dell'anamnesi

Renzo Rozzini

La complessità dell'anamnesi

In medicina, l'anamnesi è la raccolta dalla voce diretta del paziente e/o dei suoi familiari (per esempio i genitori nel caso di un lattante o di un bambino), di tutte quelle informazioni, notizie e sensazioni che possono aiutare il medico a indirizzarsi verso una diagnosi.

Insieme all'esame obiettivo del malato, è di fondamentale ausilio nella formulazione della diagnosi poiché ricostruisce le modalità di insorgenza ed il decorso della patologia in atto, investigando inoltre sulle possibili inclinazioni genetiche (predisposizione alle malattie genetiche) del gruppo familiare verso l'insorgenza di determinati tipi di malattie (anamnesi familiare). In questo senso è anche utilizzata per l'avvio di programmi di sorveglianza per i soggetti a rischio.

"Anamnesi, mezza diagnosi".

La complessità dell'anamnesi

Origine del termine

La parola anamnesi deriva dal greco ἀνά-μνησις, "ricordo". Nell'antichità il primo lavoro svolto sull'anamnesi che è giunto ai tempi nostri è stato ad opera di Rufus Ephesius (negli anni 80-150) Il lavoro fu poi reso pubblico una volta tradotto in francese da Daremberg e Ruelle, soltanto nel diciannovesimo secolo.

Il termine 'anamnesi' veniva utilizzato inizialmente nei soli paesi che parlavano tedesco, oltre all'Olanda.

La complessità dell'anamnesi

In tempi moderni Tumulty volendo descrivere cosa fosse un'anamnesi ha usato paragonarla ad una partita a scacchi:

«Il paziente fa una dichiarazione e, in base al suo contenuto e alla modalità di espressione, il medico controbatte con una domanda. Una risposta stimola poi un'altra domanda finché il medico non si convince di aver compreso precisamente tutti i dettagli della malattia del paziente »(Tumulty PA).

Negli ultimi tempi, come ha constatato Eugene Braunwald, i medici hanno perso interesse verso un'attenta anamnesi relegando sempre più la pratica ad un semplice questionario, dimenticandosi che l'anamnesi è in assoluto il miglior modo per ottenere informazioni importanti.

Esistono vari software diagnostici, spesso venduti insieme a enciclopedie mediche, i quali permetterebbero di effettuare tramite l'uso di un computer, diagnosi anche molto complicate.

History in PEDz ..

☒ Personal profile :

1· Name	2· Age	3· sex
4· address	5· admission through	6· time of admission
7· source of info		

☒ Chief Complaint

☒ Hx of present illness

☒ Systemic Review :

General
1· Wt change
2· Fever
3· Sweating
4· Activity
5· Sleeping
6· General condition
7· appetite

Eye
1· redness
2· discharge
3· diplopia

Ear
1· discharge
2· pain

Neck
1· swelling
2· limitation move·

CVS
1· cyanosis
2· rapid breathing
3· excessive sweating during feeding

Respiratory
1· nasal discharge
2· epistaxis
3· cough
4· wheeze
5· cyanosis
6· rapid breathing
7· stridor

Infectious
1· fever
2· chills
3· rigor

Mouth
1· ulceration
2· gum bleeding

CNS
1· abnormal movements
2· headache
3· gait
4· vision
5· hearing
6· level of consciousness
7· neck stiffness
8· diplopia
9· photophobia

MSS
1· joints swelling
2· joints pain
3· limitation movements
4· joints stiffness

Skin
1· rash
2· hyper- , hypo pigmentation
3· hemangioma
4· mangolion spot

UGS
1· dysuria
2· urgency
3· enuresis
4· loins pain
5· # wet nappies
6· scrotal swelling
7· frequency

GI
1· vomiting
2· diarrhea
3· abd pain
4· constipation
5· color of stool
6· abd distention
7· sticky stool
8· blood in stool
9· melena

☒ Past Medical Hx

1· Previous admission	2· Previous surgeries	3· Hx of blood transfusion
4· Hx of allergy	5· Accidents , injuries	6· Previous investigations

☒ Perinatal Hx

a· Prenatal :

1· Mother's age	2· Maternal fever or rash	3· Maternal diabetes	4· Drugs taking
5· Exposure to radiation	6· Antenatal care	7· Prolonged rupture of membrane > 18-24 h	8· Duration of pregnancy

b· Natal :

1· Delivery mode	2· Crying	3· Birth wt

c· Post-natal :

1· Neonatal admissions	2· Neonatal jaundice

☒ Nutrition Hx

1· Breast feeding (frequency, duration)	2· Bottle feeding (frequency, amount, reason for bottle)	3· Wt gain
4· Weaning	5· Table food (type, amount)	

☒ Developmental Hx

1· Gross motor	2· Fine motor	3· Language
4· Social	5· School performance	

☒ Vaccination Hx

1· Type of vaccine	2· Age of vaccine
3· According JNP, UNRWA	4· complication

☒ Family Hx

1· Mother's age	2· Father's age	3· Consanguinity
4· # children and similar conditions	5· Genetic diseases	6· Early deaths

☒ Social Hx

1· House (rooms, ventilation)	2· Occupation of father	3· Income
4· Insurance	5· Animals	6· Smoking

☒ Psychiatric Hx

1· anxiety	2· emotional problem	3· temper	4· school refusal
5· mental problem	6· behavioral problem	7· mood disorders	

Pediatrics SAWA

La complessità dell'anamnesi

Struttura

L'anamnesi si divide in più parti, principalmente una familiare e una personale. L'anamnesi personale si divide a sua volta in fisiologica, patologica remota e patologica prossima. La raccolta dei dati anamnestici sarà differente a seconda dell'età e del sesso della persona.

Raccolta delle generalità

Per primi vengono raccolti i dati relativi a nome, età, sesso, stato civile, luogo di nascita e di residenza. Tali dettagli servono per identificare la persona che si sta per interrogare. Questa parte viene redatta soltanto la prima volta che la persona viene all'osservazione del medico, diventando poi parte della scheda clinica (o della cartella clinica).

Anamnesi personale fisiologica

Vengono chieste al paziente informazioni riguardo alla propria nascita, se a termine o no, e al parto se naturale (parto eutocico o parto distocico) o operativo (parto cesareo), il peso alla nascita, l'allattamento (materno, mercenario, artificiale) primi atti dell'infanzia (dentizione, primi passi, prime parole) ed eventualmente profitto scolastico.

Pubertà: menarca, regolarità dei flussi mestruali, comparsa dei primi peli, profitto scolastico, sviluppo somatico (staturale e ponderale) e psichico.

Servizio militare: per accertare la presenza di eventuali evidenti patologie alla visita di leva.

Matrimonio e gravidanze: viene indagata l'attività riproduttiva, numero dei figli (parità) numero delle gravidanze e modalità dei parti, aborti, comparsa della montata lattea, allattamento. Vengono anche chieste informazioni sullo stato coniugale e sull'andamento del matrimonio in quanto il matrimonio può determinare l'insorgenza di alcune nevrosi (patologia del matrimonio)

Sessualità: si indaga, con discrezione, la vita sessuale del paziente, in particolare la presenza di problemi sessuali, impotenza, calo della libido, dispareunia, presenza di comportamenti a rischio per malattie sessualmente trasmissibili.

Menopausa: età di esordio (precoce o tardiva) comparsa di manifestazioni e sintomi, eventuali complicanze, terapia sostitutiva.

Stili di vita: abitudini alimentari circa la quantità e qualità dell'alimentazione, l'uso di alcool, tabacco, sostanze stupefacenti. Sedentarietà. Relazioni sociali. Situazione economica, familiare, domiciliare, soprattutto nell'anziano spesso soggetto a modifiche del nucleo familiare e/o nei rapporti tra i congiunti oltre che soggetto a trasferimento di residenza.

Allergie ambientali o a farmaci.

Alvo regolare o irregolare.

Minzione e diuresi: viene indagata la quantità, la frequenza e il colore; se è presente minzione notturna, o se la stessa causa bruciore.

Attività lavorativa: in questa fase si raccolgono informazioni sul tipo di attività che si svolge o che si è svolta, per comprendere se sia o sia stato in passato esposto ad agenti fisici, chimici o biologici o altre possibili condizioni potenzialmente responsabili di disturbi o malattie professionali. Proprio legati alla natura lavorativa della persona sono state individuata la maggior parte dei disturbi evidenziati, (un quarto dei casi) notificati grazie all'anamnesi.

Tratti strutturali della personalità: Informazioni sul profitto di studio o lavoro. Tendenza a sovra o sottostimare l'importanza del proprio stato di salute. L'umore del paziente con particolare riferimento alla risposta psicologica allo stato di malattia (accettazione, volontà di guarire, il concetto di morte, fiducia nei medici).

La complessità dell'anamnesi

Anamnesi familiare

L'anamnesi familiare prevede due soli ambiti: gli ascendenti (i genitori e i nonni) e i collaterali (fratelli e sorelle). Si indaga sullo stato di salute dei genitori e dei collaterali del paziente o sulla loro eventuale età e causa di morte. Questo punto è importante per conoscere i fattori di rischio genetici (che possono essere visualizzati tramite un genogramma), ambientali, o l'eventuale predisposizione familiare. Alcune condizioni patologiche non si trasmettono con modalità ereditaria ma è provata la predisposizione familiare. Ne sono esempio l'ipertensione arteriosa essenziale, la cardiopatia ischemica, allergopatie, malattie del sistema immunitario.

Possono anche essere richieste informazioni riguardo ai nonni soprattutto se si sospetta una malattia autosomica dominante a penetranza incompleta (vengono all'osservazione come fenotipi che saltano una generazione).

La complessità dell'anamnesi

Anamnesi patologica prossima

Definita anche "patologica recente" riguarda il disturbo per cui il paziente consulta il medico.

Vengono indagati la modalità di insorgenza dei disturbi, sul momento esatto della loro comparsa, sulla localizzazione, intensità, forma, carattere e irradiazione del dolore (se presente); la diuresi e minzione, l'alvo (feci); l'esito di eventuali esami eseguiti precedentemente e l'esito della terapia ove essa sia già stata effettuata. Vengono raccolte informazioni riguardo al sonno, sete e fame, astenia, ansia, tosse, starnuto, vomito, attività sessuale, dispnea, palpitazioni, prurito, eccetera).

Anamnesi farmacologica

Riguarda i medicinali prescritti o autosomministrati (farmaci da banco)

Anamnesi tossicologica

Riguarda l’uso di droghe.

La complessità dell'anamnesi

Anamnesi patologica remota

L'anamnesi patologica remota (APR) consiste nell'indagine cronologica e ordinata sulle malattie, traumi ed interventi chirurgici sofferti dal paziente nel passato.

Malattie infettive (in particolare quelle dell'infanzia) che abbiano lasciato una immunità permanente e che quindi non possono ripresentarsi. Ciò aiuta nella diagnosi differenziale.

Malattie le cui recidive (o manifestazioni a distanza) potrebbero essere responsabili della sintomatologia attuale del paziente, per esempio tubercolosi, tumori, epatite virale o la sifilide che può dare delle manifestazioni cliniche evidenti anche dopo alcuni anni.

Interventi chirurgici pregressi ad esempio in caso di tumori maligni che possono recidivare dopo intervalli di tempo molto lunghi. Possono agevolare l'indagine del medico qualora il paziente non sappia spiegare bene di cosa ha sofferto.

Traumi ossei pregressi (ad esempio fratture) possono essere indice di osteoporosi o rarefazione ossea da metastasi tumorali ossee o da mieloma multiplo.

La complessità dell'anamnesi

Donna di 92 anni. Proviene dal proprio domicilio, centro storico della città, dove vive in condizioni di completa dipendenza (Barthel Index: 5/100) e compromissione cognitiva molto grave (CDR 5), assistita da una collaboratrice familiare (badante) e con intervento quotidiano del servizio ADI. Nell'ultimo anno è stata ricoverata tre volte. Ha una figlia di 72 anni che fa da supervisione.

Da sei mesi viene riferita disfagia che si è aggravata da una settimana. Portata in pronto soccorso per sopore e iperpiressia (39 °C). PA: 90/70, FC: 120/min, FR: 36/min, Azotemia 121mg/dl; Creatininemia: 2.35mg/dl, PCR: 28; EAB (aa): ph: 7.35, PCO2: 62, PO2 40, SatO2: 80%. RX torace: polmonite basale dx;

Diagnosi: sepsi da polmonite dx con insufficienza respiratoria (ventilazione non invasiva per 8 ore).

Accettata in reparto medico la polmonite viene trattata secondo le linee guida ATS/IDSA.

Muore dopo 6 giorni di degenza.

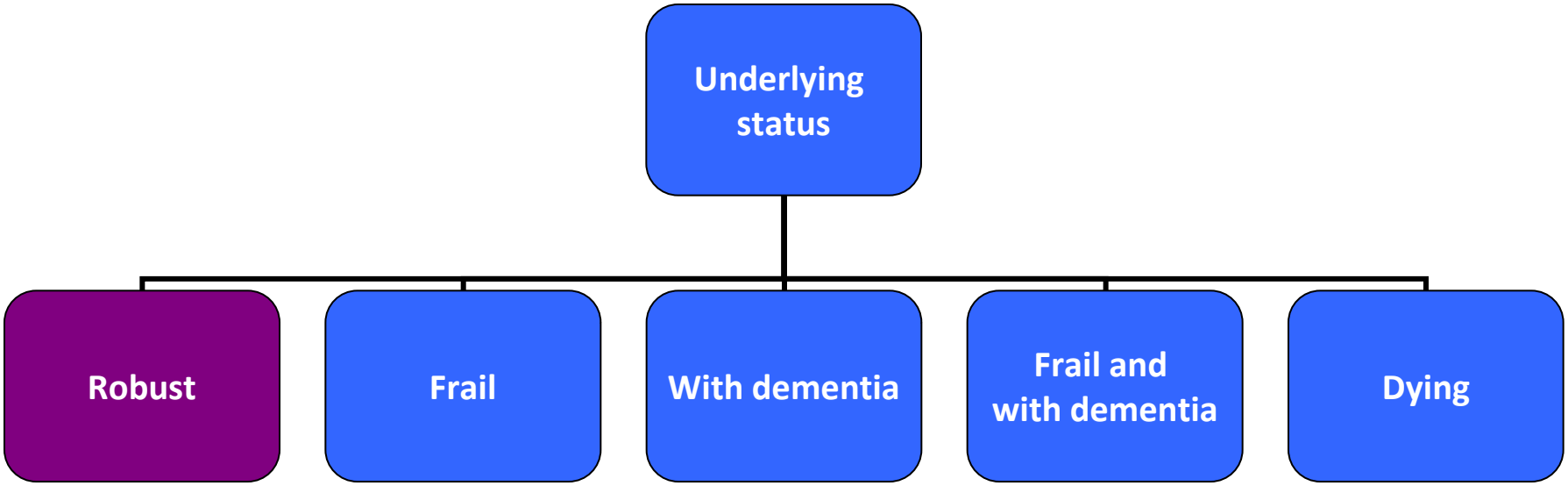
La complessità dell'anamnesi

È appropriato il ricovero ospedaliero sapendo che la prognosi della paziente è certamente sfavorevole a breve?

1. **È appropriata la terapia antibiotica considerando da un lato la prognosi sfavorevole e dall'altro il rischio di resistenze che il suo impiego comporta?**

2. **È indicato l'uso di SNG (Sondino Naso Gastrico), il posizionamento della PEG, per la nutrizione enterale totale?**

Quali informazioni anamnestiche?



M Gillick, 2000

Il grande impegno contemporaneo per la medicina personalizzata.

“We are now building a national highway system for personalized medicine, with substantial investments in infrastructure and standards”.

MA Hamburg & FS Collins, NEJM 363(July 22): 301-304, 2010.

La medicina narrativa

Per una buona parte della medicina contemporanea la cura porta alla cronicizzazione del disturbo, quindi al suo prolungarsi nel tempo.

La medicina narrativa è lo strumento che meglio di altri comprende il significato del lungo durare dei mali.

La narrazione è la migliore descrizione degli eventi adattativi che accompagnano sempre la vita, in particolare quella della persona malata per lungo tempo.

The acts of looking selectively, and devising a hypothesis, mean that most of reality is excluded from a scientist's measurements. Indeed, the scientist's reality is restricted to what he can measure. The isolated object is not the same as the object in its environment: unless we measure the whole universe continuously, in all possible ways, an element of fiction intrudes into our analysis.

Athar Yawar, Lancet 375:546-547, 2010.

Una volta -forse- il medico parlava con il paziente (che pagava), ma poi non era in grado di fare nulla…

Ci interessa l'oggi nella sua crisi, senza semplificazioni.

Insufficiente la posizione “marginale” di Claude Bernard:

“Tuttavia il medico ogni tanto deve tener conto nel trattamento di una malattia della cosiddetta influenza del morale sul fisico e di tanti altri fattori di ordine famigliare e sociale che nulla hanno a che fare con la scienza. Per questo un buon medico pratico non solo deve conoscere la sua scienza, ma deve essere anche un uomo onesto, dotato di spirito, di tatto, di buon senso”.

La raccolta della storia: “the road blocks”

- **Un atteggiamento direttivo che non permette mai al paziente di prendere l’iniziativa nel racconto; è quanto accade con le interviste troppo strutturate, che nel tentativo di essere molto oggettive, finiscono col trattare il paziente come un oggetto, inducendolo a sottrarsi all’aspetto più personale del rapporto;**
- **un atteggiamento volto ad ammonire o a minacciare il paziente sottolineando eccessivamente possibili errori commessi, uno stile di vita che sia tuttora una concausa della sua patologia, conseguenze che possono occasionare disagio e sofferenza ai suoi familiari, ecc.;**
- **dare consigli e suggerimenti, fornire soluzioni, prima di avere attentamente studiato il problema, appiattendo la specificità del caso concreto sulla scia dei dati statistici, di esperienze precedentemente accumulate;**
- **cercare di persuadere in modo logico, dialettico o cattedratico, senza tenere conto che il problema posto dal paziente, accanto all’ovvia dimensione razionale, ne presenta una ancor più complessa sotto il profilo emotivo;**
- **moraleggiare, fare delle raccomandazioni o dire ciò che si dovrebbe fare, assumendo il ruolo di una maestra che bacchetta un bambino un po’ sciocco e un po’ capriccioso, che non capisce cosa sia bene per lui;**
- **mostrarsi in disaccordo, giudicare, criticare, contestando le interpretazioni del paziente, con un atteggiamento di tipo svalutativo, che accentua la asimmetricità della relazione;**
- **dichiararsi d’accordo, approvare e lodare, senza però cogliere gli elementi di incertezza del paziente, dandogli quindi una superficiale rassicurazione che non terrà alle prime difficoltà;**
- **mettere in ridicolo il paziente davanti ai suoi familiari o davanti ad altri membri del team dei curanti, studenti inclusi: etichettarlo, facendo riferimento a lui utilizzando la diagnosi clinica come se fosse una sorta di nome e cognome;**
- **interpretare o analizzare i dati di laboratorio, facendo ipotesi ancora da verificare, senza tener conto delle ansie del paziente, che spesso interpreta ciò che dice il medico alla luce dei suoi pregiudizi;**
- **rassicurare, consolare, mostrare simpatia, approfittando di questa benevolenza per interrompere il paziente e non consentirgli di esprimersi fino in fondo;**
- **mettere in discussione quanto detto dal paziente e dai suoi familiari, mettendoli alla prova in un modo che può apparire loro inquisitorio; in questo modo si riduce molto la sicurezza del paziente, se ne abbattono le difese e si crea una diffidenza rilevante;**
- **mostrarsi distaccati, distratti, cambiando frequentemente argomento, dimenticando domande e risposte già ottenute; lasciando il paziente con la sensazione che la sua storia interessi ben poco chi gli sta di fronte.**

Le cinque corde fecero piazza pulita del disordine. Mi consentirono di trovare nuovi lick e intessere trame più ricche. Potevo quasi sovrapporre la linea melodica agli accordi, grazie alla possibilità di aggiungere note qua e là. E tutt'a un tratto, anziché avere due chitarre, era come se avessi un'intera orchestra. Non sapevi più chi suonasse cosa, e se tutto filava liscio e te la cavavi bene, neppure ti interessava. Era fantastico. Come se mi avessero tolto la benda dagli occhi e i tappi dalle orecchie nello stesso momento. Fu allora che saltò la diga.

Ian Stewart ci chiamava affettuosamente i suoi "prodigi da tre accordi". Ma era un titolo onorevole. Okay, questa canzone ha tre accordi, giusto? Che cosa puoi fare con quei tra accordi? Chiedete a John Lee Hooker, la maggior parte delle sue canzoni ne aveva solo uno. I pezzi di Howlin'Wolf, di Bo Diddley, solo un accordo.

Keith Richard, Life 2010

Una delle prime lezioni che appresi esercitandomi alla chitarra era che nessuno di quei musicisti utilizzava accordi semplici. C'era sempre qualche aggiunta, qualche sottrazione. Mai un accordo maggiore convenzionale. Piuttosto, ricorrevano all'amalgama, alla distorsione, alla storpiatura. Non esisteva un "modo corretto" di suonare. Esisteva soltanto una sensibilità. Un approccio personale. E' un brutto mondo, questo.

Keith Richard, Life 2010

Medical Care for the Final Years of Life

"When You're 83, It's Not Going to Be 20 Years"

David B. Reuben, MD

The Patient's Story

The case of an 83-year-old man who has had a fall-related injury and continues to be the sole caregiver for his wife who

Abstract

The case of an 83-year-old man who has had a fall-related injury and continues to be the sole caregiver for his wife who has dementia exemplifies a common situation that clinicians face—planning for the final years of an elderly individual's life. To appropriately focus on the patient's most pressing issues, the approach should begin with an assessment of life expectancy and incorporation of evidence-based care whenever possible. Short-term issues are focused on efforts to restore the patient to his previous state of health. Mid-range issues address providing preventive care, identifying geriatric syndromes, and helping him cope with the psychosocial needs of being a caregiver. Long-term issues relate to planning for his eventual decline and meeting his goals for the end of life.

Unfortunately, the workload and inefficiencies of primary care practice present barriers to providing optimal care for older patients. Systematic approaches, including team care, are needed to adequately manage chronic diseases and coordinate care.

The Patient's Story

Mr Z is an 83-year-old man with gout, osteoarthritis, and a deteriorating gait who has fallen several times in the past year. He is the primary caregiver for his wife of 62 years, who was diagnosed with Alzheimer disease 4 years ago.

A retired businessman, Mr Z continues to serve on several corporate and charitable boards of directors. Over the past few years he states that he has been "slowing down" and notes that his "gait is off." He has fallen twice outside his home. Ten months ago, he tripped outside and broke 2 ribs. One month ago, he fell again when he "missed a step" in a restaurant and "tore ligaments" in his left knee. After the second injury, Mr Z used a wheelchair for a few weeks but now walks with a quad cane. He works with a physical therapist to improve his gait and endurance.

Current medications are allopurinol, for gout; potassium, for long-standing hypokalemia; and occasional acetaminophen with codeine, for knee pain. He has not accepted recommendations to take calcium or vitamin D supplements because he fears a recurrence of calcium oxalate kidney stones.

Mr Z reports that he drinks 1 glass of wine with dinner but did not drink alcohol immediately before he fell. He lives in a ground-floor condominium with a 15-step interior staircase (with a hand rail) from the garage 1 floor below. He continues to drive an automobile.

The Patient's Story

Mr Z cares for his wife who has moderate Alzheimer disease but remains independent in her activities of daily living (ADLs) and has no psychological or behavioral complications; Mr Z performs all of her instrumental activities of daily living (IADLs) including cooking, transportation, and finances. He says he is managing fine and declines additional help because his wife does not like other people in their home. Mrs Z fired several of the home health aides whom Mr Z had hired and refuses to move into a setting with more assistance, a wish Mr Z has acceded to.

Mr Z denies symptoms of depression or memory loss and says he has a great deal of support from his friends and 2 children who live nearby. He also attends an Alzheimer disease support group. He knows that his wife's condition will worsen but he has not yet brought himself to formulate specific future plans. He is currently considering respite options.

Mr Z receives care in several medical settings from primary care and specialty physicians. He received a screening colonoscopy 2 years ago and a vaccine for influenza this season, a herpes zoster vaccine 3 months ago, and a pneumococcal vaccine 10 years ago. Mr Z underwent an eye examination 6 months ago; no visual risk factors for falling were identified.

Mr Z's sitting blood pressure reading was 125/60 mm Hg, with a pulse rate of 78/min; and when standing the blood pressure reading was 133/60 mm Hg, with a pulse rate of 80/min. Lung and cardiac examinations showed normal results. There was full range of motion in both hips (flexion, adduction, and abduction). His right knee was swollen but not painful and there was no erythema. He was able to stand from a chair without using his arms. Sensation in both lower extremities was intact to light touch. There was no cogwheel rigidity, tremor, or shuffling gait. Mental status was alert; he was oriented to time, place, and person and was quite articulate.

Urinalysis, complete blood cell count, and serum chemistries (including uric acid, thyrotropin, and lipid panel) were within normal range.

The Patient's Story

Recent physical therapy evaluation showed a normal standing balance for his age as assessed by computerized posturography.

The leg lengths differed—right leg length (32.25 inches) and left leg length (33.25 inches), which was corrected by modifying his right shoe with a heel lift. The physical therapy evaluation also included assessments of falls risk, muscle strength, flexibility, and functional mobility. On the Performance-Oriented Mobility Assessment (Tinetti Scale), he scored 24 out of 25 for balance—the only deficit was an inability to perform 1-legged stance; he scored 7/12 for gait, with deficits on step length (right foot not passing left foot), truncal stability (marked sway noted), and walk stance (widened base of support).

His total score was 31 out of 37 with moderate fall risk (range, 26-31). On a 5-point scale for lower extremity muscle testing, his strength for hip abduction was 4 plus on the right and 3 plus on the left; for hip adduction, 4 plus on the right and 3 plus on the left; for both knee flexors, 4 plus; for both knee extensors, 4 plus; and all other muscles were 5 plus. In tests of mobility, Mr Z was fully independent with gait, transfers, and bed mobility.

Putting Mr Z's Health Issues Into Perspective

Mr Z: ***I guess over the last few years, I never gave much thought to what would happen to me. . . . But I see that when you're 83, it's not going to be 20 years. . . . There's going to be a time, sometime down the road, when I can't make the decisions.***

Dr B: ***Mr Z is by far one of my healthiest patients in that he doesn't have any cognitive impairment. His biggest issues are his gait and his mobility. Over the year and a half that I've seen him, he's had a couple of big falls. [I]t took him a while to rebound and his gait never fully recovered. There have been incremental steps of decline.***

Although Mr Z's problems seem minor and self-limited, he has embarked on the journey that will represent the final chapter of his life. His physician's role is to ascertain Mr Z's personal trajectory on that pathway, clarify his goals, and together develop a plan to monitor and achieve those goals, periodically reassessing as he ages.

Putting Mr Z's Health Issues Into Perspective

Treatment Caveats to Consider

To help Mr Z remain independent for as long as possible, recommended care should be based on evidence whenever possible. For individuals of Mr Z's age and older, however, a conventional evidence-based approach is modified by 3 important caveats.

Prognosis. For some patients, comorbidities can worsen prognosis such that screening tests and treatments of demonstrated effectiveness for healthier older persons of the same age would not be beneficial within the expected survival period.

Insufficient Evidence. The evidence base guiding the management of many conditions affecting older persons is insufficient, especially for those aged 80 years or older. Older individuals and those with comorbidities are often excluded from clinical trials, and some conditions are difficult to study or have not received priority for research. Consequently, treatment recommendations often must extrapolate beyond the evidence base.

Putting Mr Z's Health Issues Into Perspective

Patient Goals and Preferences. Patients' goals may relate to a functional or health state (eg, being able to walk independently), symptom control (eg, control of pain or dyspnea), living situation (eg, remaining in one's home), or survival (eg, living long enough to reach a personal milestone such as a family member's wedding). Sometimes patient and physician goals may differ. For example, a patient may seek a cure when the physician believes that only symptom management is possible. In other cases, the physician may believe that a better outcome is possible but the patient declines to pursue the recommended path (eg, physical therapy to regain mobility). In addition, patient preferences for specific treatments may lead to care that is not the best evidence-based option (eg, using pads to manage urinary incontinence although effective behavioral and pharmacologic therapy is available).

Putting Mr Z's Health Issues Into Perspective

Eventually, however, Mr Z's physician will need to manage his inevitable decline and his care will be guided by Mr Z's personalized goals.

In this phase, the evidence for many decisions may not fit the individual patient's specific clinical situation or unique cluster of medical and social issues. Hence, the physician must rely on experience, knowledge, and clinical judgment. This combination of the science, wisdom, and skill of medicine is the key to providing the best care for older patients in their final years of life.

Table 1. Questions and Simple Tests for General Screening Assessment of Frail Older Patients[a]

	Question	Answer or Indicator	Alternative
Functional status			
Activities of daily living (ADLs)	Bathing, dressing, toileting, transferring, maintaining continence, feeding	Able to complete without assistance; able but with difficulty; unable to complete without assistance	
Instrumental activities of daily living (IADLs)	Using the telephone, shopping, preparing meals, housekeeping, doing laundry, using public transportation or driving, taking medication, handling finances	Able to complete without assistance; unable to complete without assistance	
Visual impairment	Do you have difficulty driving, watching television, reading, or doing any of your daily activities because of your eyesight, even while wearing glasses?[2]	Yes indicates positive screen	Snellen eye chart
Hearing impairment[b]	Is your age older than 70 years? Are you of male gender? Do you have 12 or fewer years of education? Did you ever see a doctor about trouble hearing? Without a hearing aid, can you usually hear and understand what a person says without seeing his face if that person whispers to you from across the room? Without a hearing aid, can you usually hear and understand what a person says without seeing his face if that person talks in a normal voice to you from across the room?	1 Point 1 Point 1 Point 2 Points If no, 1 point If no, 2 points ≥3 Points, positive screen	Alternative is Audioscope[3]
Urinary incontinence[c]	Have you had urinary incontinence (lose your urine) that is bothersome enough that you would like to know how it could be treated?	Yes indicates positive screen	
Malnutrition	Have you lost any weight in the last year?[4]	Loss of at least 5% of usual body weight in last year indicates positive screen[4]	
Gait, balance, falls[c]	Have you fallen 2 or more times in the past 12 months? Have you fallen and hurt yourself since your last doctor's visit? Have you been afraid of falling because of balance or walking problems?	Any yes response indicates positive screen	
Depression[d]	Over the past 2 weeks, how often have you been bothered by: Little interest or pleasure in doing things? Feeling down, depressed, or hopeless?	Response score for each: 0, Not at all 1, Several days 2, More than half the days 3, Nearly every day Total ≥3, positive screen	
Cognitive problems	3-Item recall[5] Clock drawing test[6]	<2 Items recalled indicates positive screen[5] Any of the following errors indicatepositive screen: wrong time, no hands, missing numbers, number substitutions, repetition, refusal[6]	
Environmental problems	Home safety checklists[7]		

[a] All except the Snellen eye chart, Audioscope, and evaluation for cognitive problems can be assessed by self-report using questionnaire.
[b] Questions and response indicators are from the National Health and Nutrition Examination Survey (NHANES) battery.[8]
[c] Questions and response indicators are from the ACOVE-2 Screener.[9]
[d] Questions and response indicators are from the Patient Health Questionnaire-2.[10]

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Table 2. Life Expectancy for Older Persons by Age, Race, and Sex[a]

	White		Black	
Age, y	Men	Women	Men	Women
65	17.2	20.0	15.2	18.6
70	13.7	16.2	12.4	15.3
75	10.7	12.8	9.9	12.2
80	8.1	9.7	8.0	9.6
85	6.0	7.1	6.3	7.5
90	4.3	5.1	4.9	5.7
95	3.1	3.6	3.8	4.3
100	2.2	2.5	2.9	3.2

[a] Data adapted from National Vital Statistics Reports.[15]

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Figure. Hypothetical Trajectories of Functional Decline for Mr Z

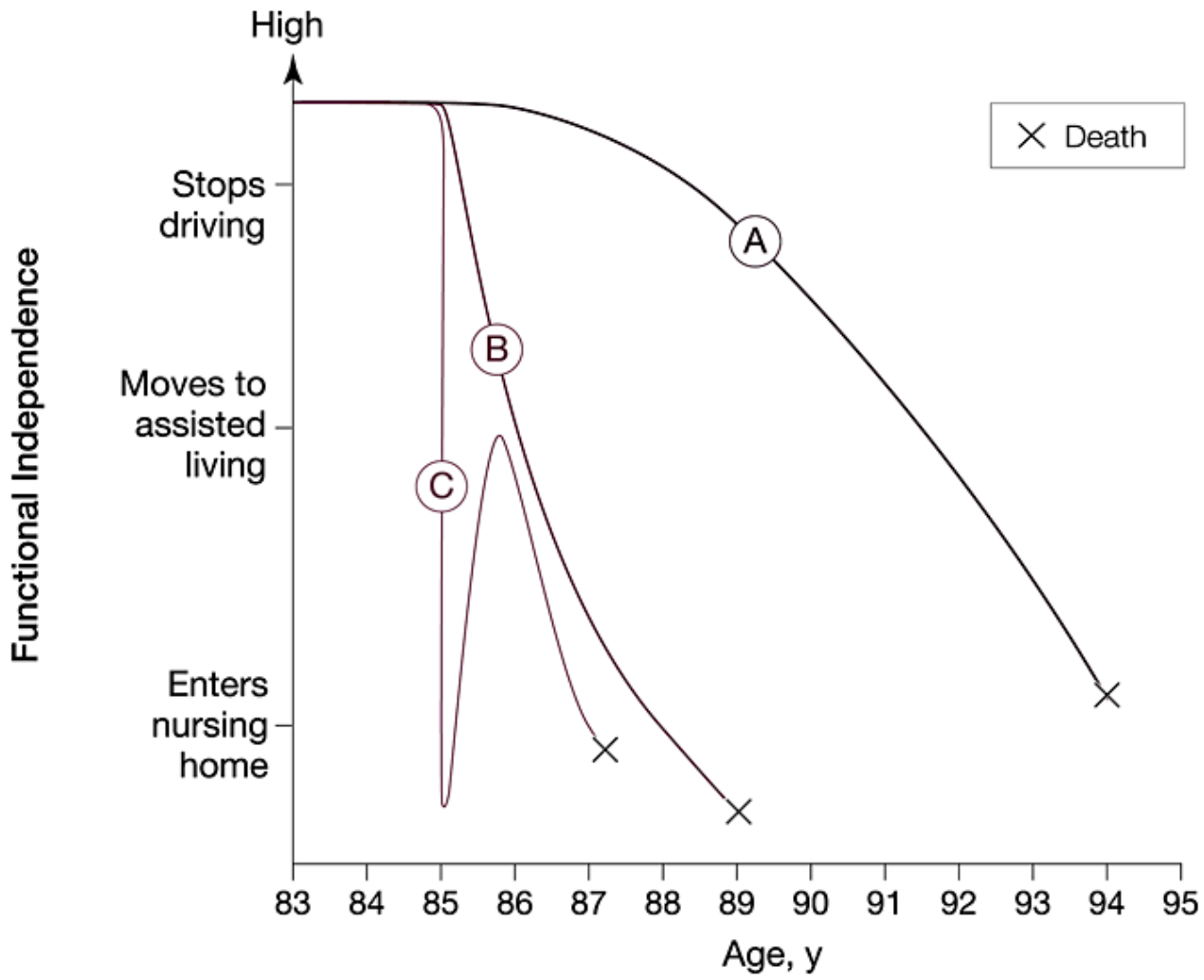

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Table 3. Treatment and Monitoring of Mr Z

Assessment/Treatment	Time Frame	Administrator/ Method
Short-term (within 1 y) issues		
Physical therapy	Now	Physical therapist
Home safety inspection	Now	Home health
Vitamin D replacement	Now	Clinician
Bone mineral density and bisphosphonates if osteoporosis	Now	Clinician
Assessment of function, falls, and fear of falling	Now and every visit	Self-report (Table 1)
Influenza vaccination	Yearly	Office staff or community
Midrange (1-5 y) issues		
Community-based fall prevention program	In 3-6 mo depending on physical therapy progress	Clinician provides list of nearby programs
Assessment of caregiver burden	Now and every visit	Clinician asks; may need social worker
Blood pressure screening	Every visit	Office staff
Vision testing	Yearly	Office staff or optometry
Weight	Every visit	Office staff
Height	Yearly	Office staff
Hearing impairment screening	Yearly	Self-report or office staff (Table 1)
Depression screening	Yearly	Self-report (Table 1)
Lipid screening	Every 5 y	Clinician
Long-term (>5 y) issues		
Assessment of living situation	Yearly or more often if clinical situation changes	Clinician or social worker
POLST form	Now and updated as clinical situation changes	Previsit questionnaire and clinician

Abbreviation: POLST, physician orders for life-sustaining treatment.

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Table 4. USPSTF Recommendations for an 83-Year-Old, Nonsmoking, Sexually Inactive Man[a]

Recommendation	Grade[b]
Primary prevention	
Alcohol misuse screening and behavioral counseling interventions to reduce alcohol misuse by adults	B
Intense behavioral dietary counseling for adult patients with hyperlipidemia and other known risk factors for cardiovascular and diet-related chronic disease	B
Obesity screening	B
Secondary prevention	
High blood pressure screening	A
Lipid screening	A
Depression screening in clinical practices that have systems in place to assure accurate diagnosis, effective treatment, and follow-up	B
Diabetes screening if sustained blood pressure (either treated or untreated) greater than 138/80 mm Hg	B

Abbreviation: USPSTF, US Preventive Services Task Force.

[a] Data adapted from Agency for Healthcare Research and Policy preventive services selector.[14]

[b] The USPSTF recommends the service. Grade A denotes there is high certainty the net benefit is substantial and grade B denotes there is high certainty the net benefit is moderate or there is moderate certainty that the net benefit is moderate to substantial.

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Table 5. Priorities in the Care of Older Patients by Life Expectancy

Life Expectancy	Medical		Nonmedical	
	Priorities	Tools and Approaches	Priorities	Tools and Approaches
Long (>5 y)	Address the patient's concerns	Open-ended questions	Lifestyle changes	Health educator, CBOs[a]
	Evidence-based disease management	Guidelines	Engage in social and work activities	CBOs,[a] AAAs[42]
	Identify and manage geriatric conditions	Table 1	Environment safety and access (eg, driving)	Occupational therapist, home modification companies, home health agencies
	Preventive services as indicated	USPSTF interactive tool[14]		
	Coordinate care across health care professionals and settings	Discharge summaries, e-mail, telephone		
	Advance directives (eg, designate DPOAHC)	Medical association and state forms (DPOAHC)		
Mid (2-5 y)	Address the patient's concerns	Open-ended questions	Environment safety and need for ADL and IADL support	Home health agencies, social workers, private care managers
	Evidence-based disease management (must expect benefit within patient's lifetime)	Guidelines		
	Identify and manage geriatric conditions	Table 1	Engage in social activities (eg, senior citizen centers)	CBOs,[a] AAAs[42]
	Preventive services as indicated (eg, influenza vaccination)	USPSTF interactive tool[14]		
	Coordinate care across health care professionals and settings	Discharge summaries, e-mail, telephone	Identify and evaluate resources (eg, social support, financial)	Social workers, financial planners
	Advance directives	Medical association and state forms (DPOAHC, living will, POLST[41])		
Short (<1-<2 y)	Address the patient's concerns and identify patient goals	Open-ended questions	Living situation	Social workers
			Caregivers and their health, respite care	Open-ended questions, also see Table 1
	Symptom management	Palliative care guidelines		
	Coordinate care across health care professionals and settings	Discharge summaries, e-mail, telephone	Engage in social activities (eg, adult day care centers)	Social workers, CBOs,[a] AAAs,[42] hospice (when life expectancy ≤6 mo)
	Advance directives (eg, POLST form)	Medical association and state forms (POLST,[41] DPOAHC)		

Abbreviations: AAAs, Area Agencies on Aging; ADL, activities of daily living; CBOs, community-based organizations; DPOAHC, durable power of attorney for health care; IADL, instrumental activities of daily living; POLST, physician orders for life-sustaining treatment; USPSTF, US Preventive Services Task Force.

[a] Examples of community-based organizations include Alzheimer's Association chapters, the Braille Institute, and Lighthouse for the Blind. A list of relevant Web sites is available with the article at http://www.jama.com.

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Finding the Right Level of Posthospital Care

"We Didn't Realize There Was Any Other Option for Him"

Robert L. Kane, MD

Many families considering posthospital care options are

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THE FAMILY'S STORY

Mr and Mrs B lived in suburban New Jersey, where they had raised 3 daughters. Mr B, aged 79 years, had compensated congestive heart failure, diet-controlled diabetes mellitus, and hearing loss remediated with hearing aids. He was physically, mentally, and socially active. Mrs B, aged 78 years, had chronic back pain that limited her activities; Mr B assisted with laundry and food shopping. Nonetheless, Mrs B was still able to engage fully in an independent and active life.

In April 2006 Mr and Mrs B were involved in a severe motor vehicle crash. Mrs B was taken to a hospital, where she was found to have an ankle fracture that required surgery and other minor injuries. Mr B was seen at a different hospital and released to his daughter's home. Three days later, Mr B collapsed; a subdural hematoma was diagnosed and treated surgically, but he remained in a coma in the intensive care unit for more than 5 weeks. Mr B was discharged into an acute rehabilitation facility and thereafter to a skilled nursing facility (SNF). After Mrs B's ankle surgery she received acute rehabilitation and was then discharged to Mr B's SNF.

Mrs B's gradual improvement necessitated finding a new place for her to live. Her injuries ruled out stairs, so her multistory house (hours away from her husband and daughter) was not a viable option. Her daughter's home lacked a ground-floor bathroom and also would not work. Mrs B, with input from her daughter, settled on an apartment in congregate senior housing that provided breakfasts and dinners.

Mr B was evaluated by the assisted living facility that was affiliated with Mrs B's facility but was turned down because his care needs were too great. Mr B stayed at the SNF for 2 years. His family hired an aide for 16 hours a day because Mr B would forget that he needed help to walk safely, and he fell frequently. The out-of-pocket cost of the SNF and the aide was approximately $87 000/y.

Two years after the crash, the family learned about an assisted living group home for patients like Mr B and moved him there. The cost of room, board, and care was $7300/mo. Although he has significant cognitive impairment, he is still able to recognize family members. Mrs B visits Mr B every week, and his physician, Dr T, makes house calls. The family has retained a geriatric care manager to assist Mrs B with her ongoing medical needs.

Mr B is incapable of carrying out instrumental activities of daily living (IADLs) (eg, cooking, using the telephone, shopping) and requires assistance with all activities of daily living (ADLs) (basic tasks such as dressing, using the toilet, or feeding oneself), although he can eat by himself with supervision. Mrs B is capable of managing all ADLs, and is largely able to manage her IADLs, with periodic checking-in as to accuracy of medication management by the geriatric care manager and her daughter. The family does not think it possible to find a place that can accommodate the needs of both spouses.

PERSPECTIVES

Mr B's Daughter : My father stayed at the skilled nursing facility for 2 years, mainly because we didn't realize that there was any other option for him. . . . [W]e found out about an assisted living group home. It has 8 residents. My father has his own bedroom and a shared bathroom . . . he can eat what he wants for breakfast and they have people who come in and do activities. It's just much more peaceful for him . . . It's pretty high-level care.

Dr T: We've become highly specialized and we can keep people alive for a long period of time, but coordinating care on multiple levels is a problem.

Mrs B's Care Manager: Often social workers are really concerned with the immediate discharge plan . . . from their facility's perspective; they're not always as in tune with the future placement options for that resident.

Unlike most families, the B family had the financial resources to pay for the care they needed at each stage of the long-term care (LTC) journey. Nonetheless, they found it difficult to identify and find the most appropriate LTC options at each care transition. As with Mr and Mrs B, many older persons begin their LTC careers with a hospitalization. Many do not, however, have adequate financial means to pay for their LTC as the Bs did. Generally, Medicare covers the care provided immediately after hospital discharge, called postacute care (PAC). Postacute care, however, is a short-term proposition intended for recuperation; persons needing more care fall into the category of LTC. Overall, about 45% of Medicare beneficiaries discharged from a hospital go to some sort of posthospital care. The number varies by diagnosis. For example, 45% of patients with heart failure receive PAC, compared with 70% of those with stroke and 90% of those with hip fracture.1 A person surviving to 65 years has about a 40% chance of spending some time in a nursing home before death, and that risk increases with age.2

As populations age around the world, more policy attention has turned to providing some form of universal coverage for LTC. Most European countries offer at least some coverage, and many offer quite extensive coverage. The best-known universal LTC programs are probably those of Germany3 and Japan.4,5 The former emphasizes community care and allows patients to receive cash in lieu of services. The latter is more targeted at institutional care. The United Kingdom, France, the Netherlands, and most Scandinavian countries have provisions for publicly funded LTC.

Although most physicians will not spend much of their professional lives practicing in LTC settings, they have compelling reasons to become familiar with the LTC landscape. First, they need to ensure safe and appropriate transition of primary care when LTC is required. Second, they should facilitate well-informed decision making when LTC becomes necessary and serve as advocates for their patients so that the patients' best interests and goals of care are achieved when transitions to LTC are made. This review describes the roles physicians can play in caring for patients across the range of PAC and LTC and as they move from one level of care to another. The different levels of PAC and LTC, the outcomes and quality of this care, and the roles of other professionals are also described.

Many families considering post-hospital care options are ill-prepared and in need of guidance. They may not know the range of available options, the relative benefits of each, or have considered their therapeutic goals. Physicians should be informants, advocates, and facilitators of this big leap for their patients.

Making a good long-term care decision requires information and structure, but such decisions are often made under great time pressure as part of a hospital discharge. Professional intervention and guidance by an informed but disinterested facilitator may be needed, but hospital discharge planners may not be well suited for this role because their mandate is a rapid discharge.

Physicians have 2 crucial roles in these transitions: to ensure the seamless delivery of primary care and to advocate for and facilitate, however possible, better decision making. Physicians need at least a rudimentary knowledge of the array of options and the implications of each. Even if the physician cannot serve as the planning facilitator, the physician should ensure that this task is done well.

The Physician's Role in Care Transitions and LTC

Physicians play key roles in managing these types of care transitions (Box 1), which are high-risk events associated with poor outcomes, such as rehospitalizations. The use of hospitalists, by adding another layer of handoffs, may further complicate this transition. Generally speaking, the more transitions required, the greater the likelihood that changes in regimens associated with these moves can lead to medication errors, and this risk is exacerbated by poor communication. Programs that use nurses (or trained “coaches”) to work with patients prior to and after discharge can reduce hospital readmission rates by ensuring that patients understand their regimens and can follow through with them.

However, these programs are currently the exception rather than the rule. Thus, the quality of a physician's documentation at a time of transition may determine whether the patient receives the right medication regimen, gets appropriate follow-up, and gets care that is consistent with the patient's values and goals.

Box 1. The Physician's Role in Managing Care Transitions and Addressing Placement Options

- **Manage underlying medical conditions, considering patient goals, life expectancy, and comorbid conditions.**
- **Consider the functional implications of the patient's medical conditions (Table 1).**
- **Communicate with those working in supportive roles (eg, home care and nursing home staff).**
- **Communicate with families and patients. Use family conferences to discuss end-of-life decisions.**
- **Assess whenever an older person is making a major care transition. Are there any conditions that can be controlled better, any medications that can be reduced or discontinued?**
- **Advocate for patients and families getting an opportunity to make thoughtful decisions.**
- **Facilitate families getting access to their own advocates/case managers.**
- **Be alert for signs of neglect and abuse.**
- **Appreciate the high-risk nature of caregiving.**

Table 1. Measures Helpful in Planning Long-term Care

Parameter	Components	Examples
Activities of daily living	Bathing, dressing, feeding, using the toilet	Katz ADL Scale[20] Barthel Scale[21]
Instrumental activities of daily living	Cooking, cleaning, using the telephone, paying bills, using public transportation	Lawton IADL Scale[22]
Depression	Feeling sad, blue	Yesavage Geriatric Depression Scale[23] PHQ 9[24,25]
Cognition	Memory, problem solving, orientation, language	MMSE[26] Mini-Cog[27]
Mobility	Walking, getting out of a chair	Get Up and Go Test[28]

Abbreviations: ADL, activities of daily living; IADL, instrumental activities of daily living; PHQ 9, 9-Item Patient Health Questionnaire; MMSE, Mini-Mental State Examination.

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Planning Posthospital Care

Mr B's Daughter: My mother's discharge from the hospital was expected and we had time to consider what the next step would be, but her options were limited since she was discharged to acute rehab. My father's discharge was rather abrupt. He had been in the intensive care unit for 5 weeks and the order was written on a Friday for a Monday discharge. I was not told about the discharge from the doctor, but from other hospital staff. I was completely in the loop with discharge planning.

The social worker for the intensive care unit was extremely helpful in giving me options and recommendations for facilities where I could place my father with a respirator and tracheotomy.

For many patients like the Bs, the transition from independent living to a higher level of care occurs relatively suddenly following an acute hospitalization. Often still grappling with the implications of the illness, families and patients have a poor idea of long-term prognosis when they are pushed into making a long-term placement decision. Most persons experience this introduction to LTC as extremely stressful. Because placement decisions made at hospital discharge can shape the rest of an older person's life, they should be made methodically (Box 2). Hospitals, however, often prefer the most expeditious discharge route. In clinical scenarios like the B's, families often receive a list of facilities with open beds, rather than encouragement to discuss the full set of long-term options. Rarely is the time and attention paid to the initial planning commensurate with the importance of the decision. Programs should provide adequate time for such decision making; if a hospital bed is too expensive, then a short-term transitional care plan could be created.

Box 2. Issues to Be Addressed in Making a Discharge Plan

Identifying the Most Suitable Type of Care

- **What goal are you trying to maximize?**
- **What options are available? (see Table 2).**
- **How well does each option achieve the desired outcomes?**
- **What are the risks associated with the option? Will the patient have to move again? Will the option require a new physician? How big a risk is discontinuity of care in this case?**
- **What are the costs involved in each option? Will third parties pay for some options but not others?**

Choosing the Best Vendor

- **Where is it located? Will relatives be more inclined to visit?**
- **Does it have a philosophy compatible with the patient's and/or family's? Does the vendor have a religious or ethnic overlay desired by (or at least acceptable to) the patient?**
- **Are there policies that restrict the residents from doing what they want? How much risk is the family willing to take?**
- **What is known about the vendor's quality track record?**
- **What does it cost? Total cost? Net costs after third-party payers pick up their share?**
- **What is available now?**

Specific Tasks for the Physician

- **Determining who will assume responsibility for ongoing primary care.**
- **Ensuring a smooth handoff with adequate transfer of salient clinical information**

With complex cases such as the B's, some trade-offs are inevitable. Is the primary goal to preserve the patient's autonomy and quality of life, or is safety a larger concern? These goals are important to discuss, but such discussions may uncover disagreements and historic tensions within a family. The older person's voice must be heard amidst the concerns of family members. Often, the patient's primary concern is autonomy, while health care professionals and the family are more concerned with safety. Families often benefit from the assistance of an outside mediator and advisor. Although one might hope hospital discharge planners would play this role, they rarely do; it may be necessary to hire an independent case manager.

The first step in determining a care transition is to assess the patient's disease, prognosis, rehabilitation potential, functional status, and decision-making capacity. Many of these data can be collected by nonphysician health care professionals, including physical therapists, occupational therapists, and nurses. Table 1 outlines some basic parameters that can inform LTC decisions. Physicians should be familiar with these assessment tools and use them to identify patient needs as a basis for planning LTC.

Professional advice should be seen as just that: informed opinion about what kinds of care are likely to work best. In the end, the judgment should rest with the older patient and her family. They need to be helped to determine their care goals. A primary issue to ascertain is the likelihood that the underlying condition can be improved (or even reversed) with active rehabilitation or more aggressive medical care. Conditions like stroke, hip fracture, some hospital-induced debilitation, depression, and delirium may be improved through active care. By contrast, unless extenuating circumstances such as medication adverse effects or infections are identified, patients with dementia or stroke with no further clinical or functional improvement are unlikely to improve after discharge, other than reversal of impairments related to hospitalization itself. In general, heavier needs for care (greater functional dependency) will require more intensive forms of care.

Decision-making issues related to LTC options differ from those for PAC.

Two schools of thought apply in choosing LTC (as opposed to PAC) options.

The first suggests that location of LTC is a continuum, based on the idea that persons whose care needs are greater require a more intense type of care, ie, more professional staff and more active care.

The second maintains that almost anyone can be cared for almost anywhere if the planning is right, ie, "aging in place." In reality, payment (or insurance coverage), rather than patient preference, often determines what option a person may "choose." In some cases, as with Mr B, patients are placed in a higher level of care than they need because they are unaware of other options.

About 10% of long-stay nursing home residents have only minimal needs that could be readily met in the community. Although community LTC is a mandated service under Medicaid, the majority is provided by special waivers that allow states to use money that would have gone to pay for institutional care to be used for community care. States vary widely in their use of these waivers. Too often Medicaid will pay only for nursing home care, when other options might be preferable for both patient and society.

The evidence base addressing benefits and risks of different placement options is not robust. Despite a general sense about where patients needing care should be treated, hospital discharge placement is far from an exact science. Multiple types of care can address the needs of persons with a given condition. Recommendations for the best type of care may reflect the health professionals' background. When a group of experts was given patient scenarios describing persons with varying characteristics and asked to recommend the most appropriate care, their recommendations tracked their disciplines and professional experiences.

Which Programs Are Available?

The experiences of both Mr and Mrs B illustrate how older patients may transition through several stages of care after a hospitalization. Both experienced formal inpatient rehabilitation followed by a nursing home stay and then, in Mrs B's case, a discharge to a less care-intensive location. Table 2 and the eFigure summarize the available options.

Table 2. Types of Long-term Care

Type	Description	Public Third-party Coverage	Basis for Medicare Payment	Cost Range, $/d	Predominant Physician Type
Postacute care					
Inpatient rehabilitation facilities	Facilities specifically licensed to provide active rehabilitation. Patients must receive at least 3 h a day of PT and/or OT and must show progress to be kept on Medicare.	Medicare (must have a qualifying condition) Medicaid	Prospective payment per episode based on case mix	1000-2000	Physiatrist
Skilled nursing facility	Many nursing homes certified to provide posthospital care under Medicare. Skilled needs include complex medication schedules, wound care, or rehabilitation.	Medicare Medicaid	Daily rate based on case mix (100 d but copayment after 20 d)	150-300	Primary care clinician (physician, nurse practitioner, both), medical director
Long-term care hospital	Facility certified by Medicare to handle complex care (eg, ventilator care and weaning) of patients discharged from hospitals.	Medicare	Variation of hospital payment DRG	1500-3000	Hospitalist
Home health care	Medicare-certified care supervised by registered nurses. Other core staff: physical, occupational, and speech therapists, and social workers.	Medicare Medicaid (limited)	Payment per episode based on case mix	100-300	Primary care clinician
Outpatient rehabilitation	May be certified to conduct active rehabilitation.	Medicare Medicaid	Payment per visit	100-200	Primary care clinician
Hospice/ palliative care	Intended for those at terminal phase of life with expected prognosis ≤6 mo. Hospice care is a specific benefit under Medicare; as such, it is predicated on primarily nonhospital care. Palliative care provides active support like hospice care but without the expectation of avoiding other medical care.	Medicare (hospice; palliative care options vary)	Payment per day	200-300	Primary care clinician or palliative care specialist

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Table 2. Types of Long-term Care

Long-term care					
Home care/ personal care	Services to support frail person who needs assistance in meeting various ADL or IADL care.	Medicaid (state plan and waivers)	Payment per hour (sometimes minimum number of hours)	75-150	Primary care clinician
Nursing home	Certified to provide long-term care; some offer specialized units for persons with dementia.	Medicaid	Payment per day	75-300	Primary care clinician (physician, nurse practitioner, both), medical director
Assisted living	Institutional care with self-contained units including living quarters, a private bathroom, and some modest cooking and food storage facilities; heterogeneous and minimally regulated. Serve less disabled clientele than nursing homes. Some offer specialized units for persons with dementia.	Medicaid in some states (waivers)	Payment per day or month	60-300	Primary care clinician
Day care or adult day health center	Care provided in centralized facilities for various periods of the day. Some also have medical or nursing services (ie, adult day health care vs social adult day care).	Medicaid (in some states)	Payment per use	60-120	Primary care clinician
Adult foster care	Small group living settings with care by nonprofessionals; more homelike than larger institutions.	Medicaid in some states (waivers)	Payment per month	50-100	Primary care clinician
Independent living	Room and board and some housekeeping; may have social activities and amenities.	None		50-100	Primary care clinician
Board and care	Variant of independent living, with room and some meals.	None		50-75	Primary care clinician

Abbreviations: ADL, activities of daily living; DRG, diagnosis-related group; IADL, instrumental activities of daily living; OT, occupational therapy; PT, physical therapy.

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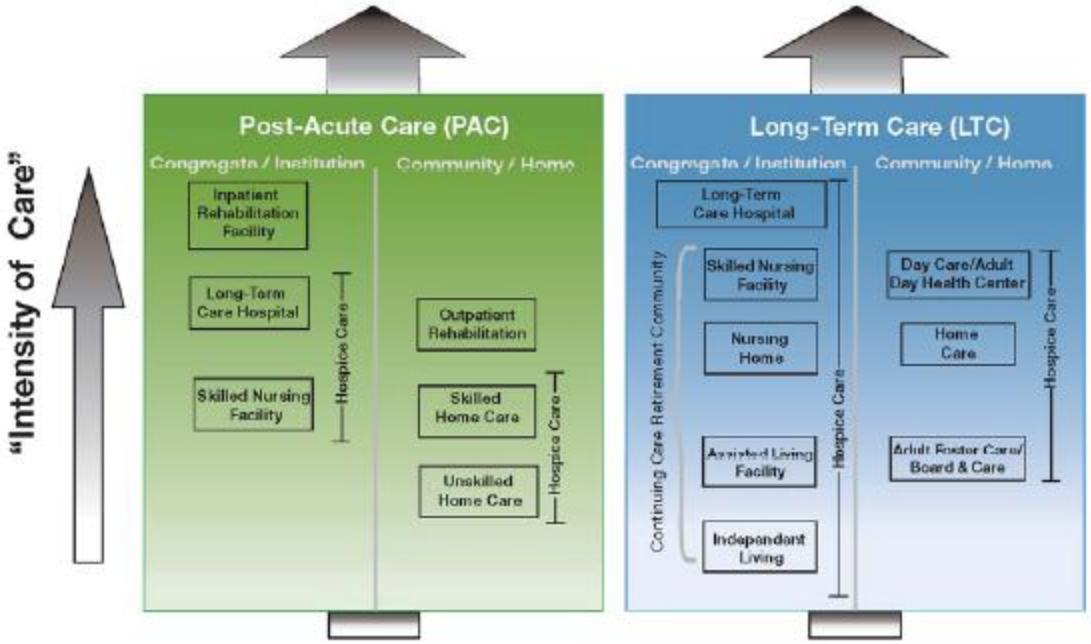
eFigure. Levels of Posthospital Care



Different levels of care meet different personal needs. Levels of care are classified according to three domains: **Acuity of Care**, **Post-Acute Care** (PAC; i.e., after hospitalization) or **Long-Term Care** (LTC); **Site of Care**, in a **congregate setting or institution**, or in the **community or a home**; and the **Intensity of Care**, from care for vital functions such as ventilation to care for activities of daily living and instrumental activities of daily living, to care to prevent injury because of cognitive impairment to care to promote social interaction and function. In this schematic, the location of a specific level of care along the spectrum from more care to less care is representative and may differ in individual cases. For example, a person receiving 3 hours of inpatient rehabilitation daily may receive more paid care than a person receiving intravenous antibiotics in a skilled nursing facility after hospitalization for pneumonia. Continuing Care Retirement Communities are organizations that provide a broad spectrum of levels of care in congregate living, usually from independent living to skilled nursing facility.

The goals of care may also differ from rapid rehabilitation to more gradual restoration to maintenance to palliation. Hospice and palliative care can be provided at virtually every level of care.

Note that some of the hierarchy is open to question. For example, day care does not necessarily provide more intensive care than home care.

Source: Created by Seth Landefeld and Lisa Leiva.

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Postacute Care Options.

Many patients can safely return home after a hospitalization with just informal care from families, but some will need additional postdischarge care—ie, PAC—to compensate for shorter hospital stays.

Long-term care and PAC often look alike and may even be provided in the same types of places (ie, at home or in a nursing home), but they are quite different, at least in theory. Long-term care implies ongoing support designed to respond to deficits in functioning. Postacute care has a much more active rehabilitative and recuperative goal. Patients undergoing Postacute care can reasonably expect to improve their status, whereas for LTC, success is better measured as slowing the rate of decline.

Three primary forms of PAC include inpatient rehabilitation, skilled nursing facilities, and home health care. A fourth but less prevalent option is an LTC hospital. The type of PAC can matter. Some evidence, summarized in Table 3, suggests that inpatient rehabilitation is associated with better outcomes for patients with strokes than is nursing home care. In contrast, although rehabilitation for hip fractures is generally associated with benefits, inpatient rehabilitation appears to offer no obvious benefit over nursing home rehabilitation for patients with hip fracture. Inpatient rehabilitation for patients with hip and knee replacements was associated with improved function but no improvement in scores on the 12-Item Short Form Health Survey.

Table 3. Studies of Postacute Care Outcomes

Source/Study Design, Years of Study/Sample	Rehabilitation Attributes Studied/Outcomes	Results
Buntin, 2010[34] Design: cross-sectional analysis of Medicare administrative data, 2002-2003 Sample: elderly Medicare patients enrolled in the fee-for-service Medicare program and discharged from an acute care hospital between January 2002 and June 2003: 233 986 with hip fracture and 287 115 with stroke	Attributes: IRFs, SNFs Outcomes: mortality, return to community residence, and total Medicare postacute payments by 120 d after acute care discharge among patients for whom there is the greatest clinical uncertainty regarding optimal postacute care	Hip fracture: IRFs vs returning home reduced mortality by 5.1% ($P < .001$) at 120 d postdischarge; SNF vs returning home reduced mortality by 6.3% ($P < .001$) among patients with hip fracture. Stroke: IRFs vs returning home reduced mortality by 2.7% ($P < .001$) at 120 d postdischarge; patients in SNFs vs IRFs were 9.3% ($P < .002$) more likely to have died or been institutionalized at 120 d.
Chudyk, 2009[35] Design: systematic review of studies published 1980-2007 Sample: 30 randomized and 25 nonrandomized trials	Attributes: 6 categories of rehabilitation (care pathways, early rehabilitation, interdisciplinary care, occupational and physical therapy, exercise); 3 settings (acute care hospital, postacute care/rehabilitation, postrehabilitation) Outcomes of hip fracture rehabilitation in elderly: mortality, functional recovery, length of stay, hospital readmission, placement in nursing home	Measures and methods for characterizing rehabilitation interventions and settings not well standardized, hampering conclusions about best practices in hip fracture rehabilitation in elderly patients. Interactions between patient characteristics (eg, sex and psychologic factors) and functional recovery were not consistently reported and may be important. The most frequently reported positive outcomes were associated with measures of ambulatory ability.
Deutsch, 2006[36] Design: cross-sectional, 1996-1997 Sample: Medicare claims for 58 724 Medicare beneficiaries with recent stroke	Attributes: IRFs and SNF subacute rehabilitation programs Outcomes: community discharges, discharge FIM scores, Medicare Part A reimbursement	Rehabilitation in IRFs associated with higher functional outcomes and higher cost. Patients in IRFs had higher adjusted ORs for community discharge among those with mild motor or no cognitive disabilities (2.19 [95% CI, 1.52-3.14]), moderate motor disabilities (1.98 [95% CI, 1.49-2.61), significant motor disabilities (1.26 [95% CI, 1.01-1.57]), and severe motor disabilities (age <82 y) (1.43 [95% CI, 1.25-1.64]).
Deutsch, 2005[37] Design: cross-sectional, 1996-1997 Sample: Medicare claims for 29 793 Medicare fee-for-service beneficiaries with recent hip fracture	Attributes: IRFs and SNF subacute rehabilitation programs Outcomes: community discharges, discharge FIM scores, Medicare Part A reimbursement	SNF subacute rehabilitation programs less costly with similar or better outcomes. Patients with moderate-to-severe and severe disabilities in inpatient rehabilitation facilities discharged to the community less often (adjusted OR, 0.71 [95% CI, 0.55-0.92]). After controlling for covariates, including baseline FIM scores, procedure, prior living arrangement, comorbidity, age, and sex, the difference in change in motor FIM score was not different in IRFs vs SNFs.
Kane, 1998[38] Design: prospective with 1 y of follow-up, 1988-1989 Sample: 487 patients with stroke and 606 with hip fracture	Attributes: posthospital care at home, in rehabilitation programs, and in nursing homes Outcomes: mortality, rehospitalization, discharge to nursing homes, functional improvement	Rehospitalization rates lowest in patients with stroke discharged to home; highest adjusted rehospitalization rates were in patients with hip fracture discharged to home health care, lowest in those discharged to nursing homes. For patients with stroke, posthospital care in rehabilitation facilities or home health care associated with significantly better functional improvement initially, but not at 1 y. For patients with hip fracture, those discharged to rehabilitation facilities experienced the most functional improvement.
Kramer, 1997[39] Design: prospective with 6 mo of follow-up, 1991-1994 Sample: 485 randomly selected patients with stroke and 518 with hip fracture	Attributes: rehabilitation hospitals, subacute nursing homes, and traditional nursing homes Outcomes: community residence, recovery to premorbid levels in 5 ADLs, Medicare costs, number of therapy and physician visits	Patients with stroke treated in rehabilitation hospitals had better outcomes; more patients with stroke were discharged to the community after treatment in subacute nursing homes vs traditional nursing homes. For patients with hip fracture, ORs of community discharge were 4.3 (95% CI, 2.5-7.4) for IRFs vs SNFs, 2.8 (95% CI, 1.6-5.1) for IRFs vs subacute SNFs, and 3.0 (95% CI, 1.7-5.0) for subacute vs traditional SNFs.

Abbreviations: ADL, activities of daily living; CI, confidence interval; FIM, Functional Independence Measure; IRF, inpatient rehabilitation facility; OR, odds ratio; SNF, skilled nursing facility.

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CONCLUSIONS

The Bs would have benefited from better support as they considered treatment options at each stage of their recuperation.

Mr B could have been cared for earlier in a less restricted setting.

The Bs had the resources to pay for their own care, but many older persons do not.

Private LTC insurance theoretically could help cover the costs of such care and make more options possible.

However, deciding about purchasing LTC insurance requires substantial thought and calculations. Most persons do not buy it until they are at risk of needing such care, and then the cost is high.

Buying it early, when the premiums are much less expensive, means spending scarce disposable income on something that will not be used for many years; moreover, the value may be eroded by inflation.

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CONCLUSIONS

Each decision to move an older person out of a hospital or along the LTC continuum can affect the rest of that person's life.

Decisions at each move should carefully weigh the alternatives and determine which choices align best with the patient's most important goals.

Physicians have 2 crucial roles in these transitions: to ensure the seamless delivery of primary care; and to advocate for, and facilitate, however possible, better decision making.

They need to know at least enough to make useful referrals to persons and organizations that can assist older persons and their families in this important task.

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