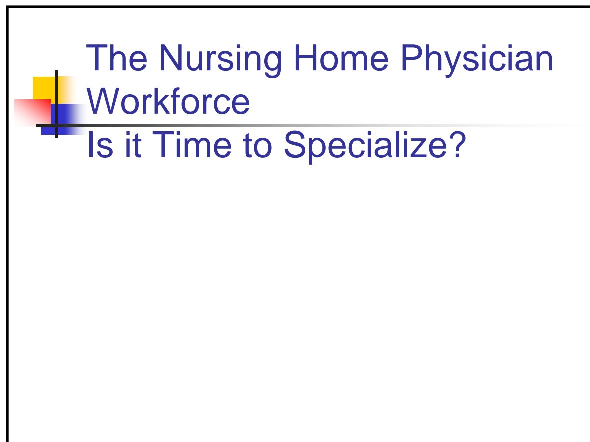
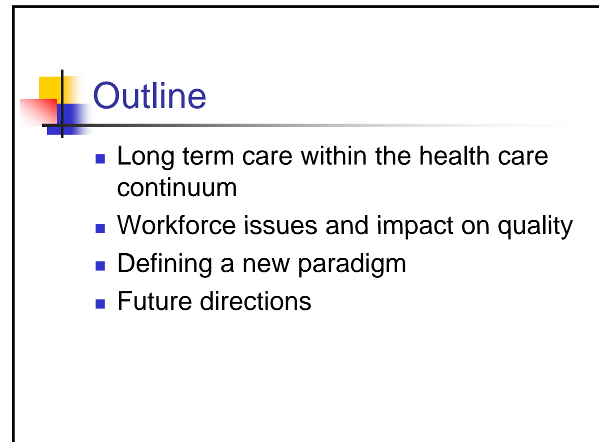
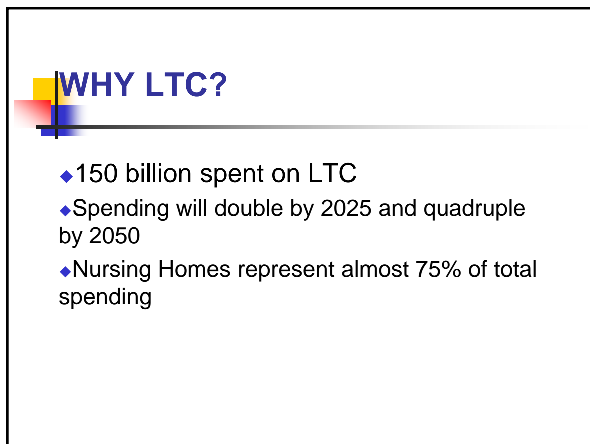
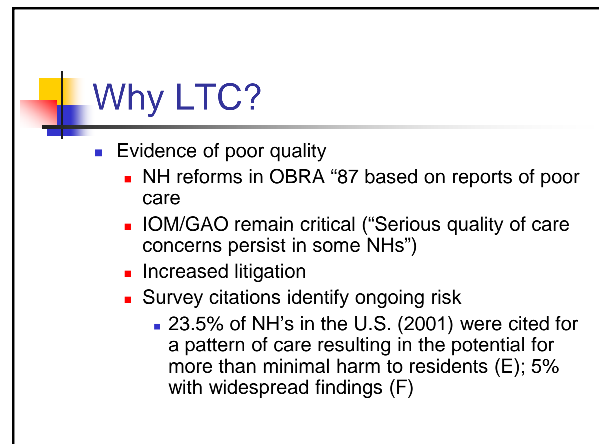
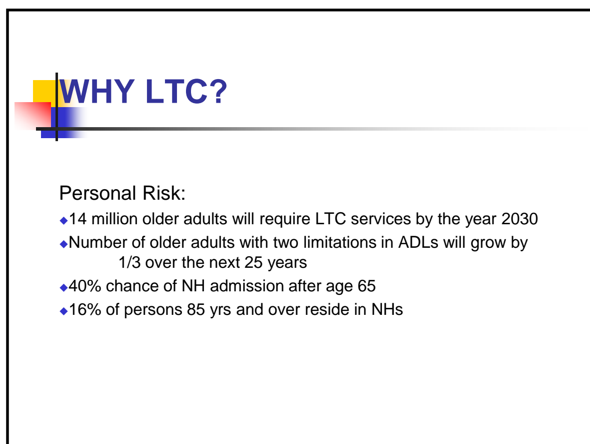
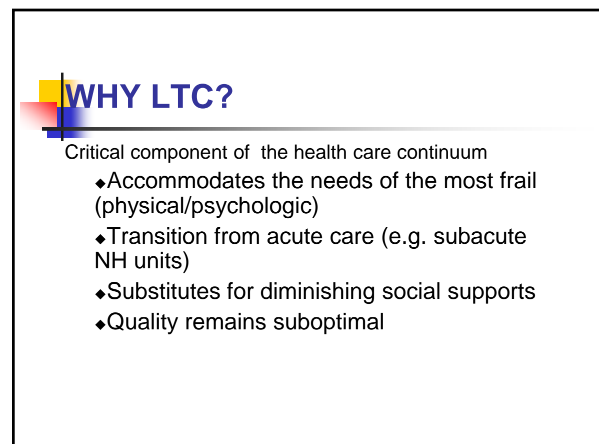

The Nursing Home Physician Workforce
Is it Time to Specialize?

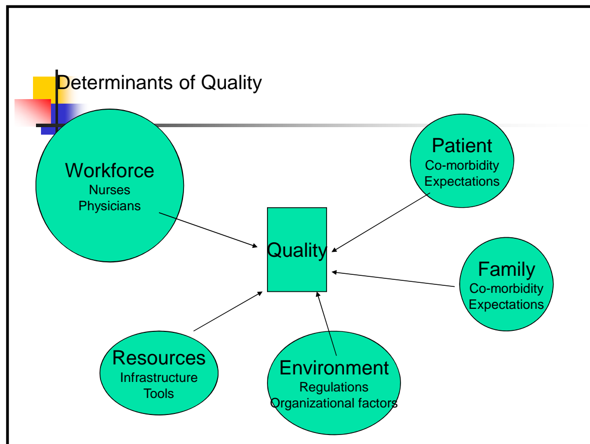

Outline
Long term care within the health care continuum
Workforce issues and impact on quality
Defining a new paradigm
Future directions


WHY LTC?
150 billion spent on LTC
Spending will double by 2025 and quadruple by 2050
Nursing Homes represent almost 75% of total spending


Why LTC?
Evidence of poor quality
NH reforms in OBRA "87 based on reports of poor care
IOM/GAO remain critical ("Serious quality of care concerns persist in some NHs")
Increased litigation
Survey citations identify ongoing risk
23.5% of NH's in the U.S. (2001) were cited for a pattern of care resulting in the potential for more than minimal harm to residents (E); 5% with widespread findings (F)


WHY LTC?
Personal Risk:
14 million older adults will require LTC services by the year 2030
Number of older adults with two limitations in ADLs will grow by 1/3 over the next 25 years
40% chance of NH admission after age 65
16% of persons 85 yrs and over reside in NHs


WHY LTC?
Critical component of the health care continuum
Accommodates the needs of the most frail (physical/psychologic)
Transition from acute care (e.g. subacute NH units)
Substitutes for diminishing social supports
Quality remains suboptimal



Workforce: Links to Quality

Underlying mechanisms:

- Availability (supply)
- Knowledge (training)
- Competency (application of knowledge)
- Acculturation (philosophy)
- Organizational factors (relationships)

Physician Practice in LTC

- Physician care mandated in NHs but little information on staffing
- Home visits constitute very small percentage of primary care practice (1%)
- No information regarding Assisted Living

What is Optimum Physician Care?

- No gold standards
- Time necessary to fulfill given tasks specific to LTC site
  - Increasing responsibility commensurate with sicker and more frail population
  - Increasing need to coordinate care through team
  - Increasing psychosocial demands (physician acting as educator and counselor to address unrealistic/uninformed expectations)

What do we know?

National survey of physicians that was part of AMA's Professional Activities Survey (n=21,578)

- 77% of physicians spend no time in NH
- of those with NH practice most spent < 2hrs. per week
- 3% spent > 10 hrs. per week
- Family Practitioners were most likely to have a NH practice

Katz, P. R., Karuza, J., Kolassa, J., & Hutson, A. (1997). Medical practice with nursing home residents: Results from the National Physician Professional Activities Census. *JAGS, 45,* 911-917.

Early work: Open versus Closed Staff

NYS Nursing Home Survey (n=353, 63% response rate)

- 43% of facilities had closed medical staffs
- 12% had physician contracts
- Closed staffs were more likely
  - in facilities that were larger
  - had more Medicaid residents
  - used NPs and PAs
  - had more residents per nurse.

Karuza, J., & Katz, P. R. (1994). Physician staffing patterns correlates of nursing home care: An initial inquiry and consideration of policy implications. *JAGS, 42, 787-793.*

Benefits of closed staff

Organizational Predictors	Physician On Site[1]	Physician Emergency Response Time Latency	Rate of Physician Attendance at Team Meeting	Acute Cross Coverage[1]	Emergency Cross Coverage[1]
	β	β	β	β	β
Number of residents	.35**	-.07	.05	.13	.12
Medicaid residents (%)	.13*	.10	.10	.16**	.08
Physician extender[2]	.01	-.05	-.03	-.05	.05
Residents per nurse	.04	-.07	-.01	.01	-.01
Closed staff[2]	.19**	-.17**	.13**	.32**	.37**
R^2	.28**	.06*	.04*	.21**	.22**

[1] dichotomous variable coded as: 1 = no; 2 = yes.

[2] coded as dummy variable.
* $p < .05$; ** $p < .01$.

New York Nursing Home Survey (2005)

- Survey questionnaires designed separately for administrator, director of nursing and medical director
- Medical director survey focused on physician staff models, credentialing, call systems and care teams
- 63% of 646 NHs replied in full

NY Nursing Home Survey

- Number MDs credentialed = 14.46
- Formal agreement with a physician group
  - 26% with mean of 8.64 MDs in group
- Residents cared for by their own community based physician = 37%
- Facilities with closed staff = 46.6%

NY Nursing Home Survey

- Medical staff by-laws present in 78%
- Restrictions on medical staff appointments in 63% of facilities
- NPs present in 21% of facilities
- PAs present in 13% of facilities

Medical Director Characteristics

- Yrs with NH (7.28)
- Hrs per week (14.85)
- Administrative Hrs (6.86)
- Providing resident care (75%)
- Additional homes as medical director (0.6)
- CAQ in geriatrics (38%)
- CMD per AMDA (19%)
- Median yrs since medical school (23)

Perceptions of Physician Care in the Nursing Home

J Am Geriatr Soc 2005;53:1651-57

- Qualitative interviews on end of life care with 54 respondents who participated in national survey of 1,578 informants
- Physicians perceived as "missing in action" contributing to increased burdens on dying nursing home residents and their families

Does Physician Practice Make a Difference?

- The geriatric paradigm can significantly impact quality of care and cost when well targeted
- Variability of medical care in non-LTC sites has been linked to physician training, volume of practice, access to patients, length of visits and case mix (e.g.hospitalist vs nonhospitalists)
- Medical staff organization has been linked to quality measures in the acute care arena

Does Physician Practice Make a Difference?

- Few studies have linked physician practice to outcomes in LTC
- Two recent analyses suggest a significant association between NH quality and:
  - Physician training
  - Medical staff organization

Does Physician Practice make a Difference?

- Nursing homes whose medical directors were certified (CMD) had a F-tag derived quality score that was 15% better than non-CMD homes (JAMDA 2009 10(6) pg 431-435)
- Nursing home medical staff organization (NHMSO) dimensions found to be independent predictors of CMS quality measures

Organizational Theory

- Donebedian-Structure/Process/Outcome
  - Focus on measures of organizational capacity and capabiility
  - Views structure as relatively immutable characteristics such as size, control status or chain membership
- Contingency Theory
  - Views structure as mutable characteristics such as organization's choice of mechanisms for communication, coordination and control
  - Elements include formalization (procedures;job descriptions), specialization (degree to which tasks are divided), standardization (extent that similar tasks are performed in an uniform fashion), complexity (vertical vs horizontal operating units) and centralization (level at which decision making authority is granted)

Organizational Theory

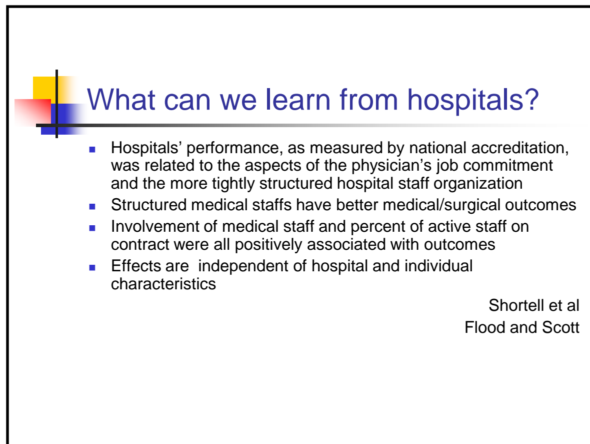
- Culture
  - Consists of values, guiding beliefs, understandings and ways of thinking shared by members of the organization.
  - Results in social interactions that are the vehicle for communication, coordination and integration of activities.

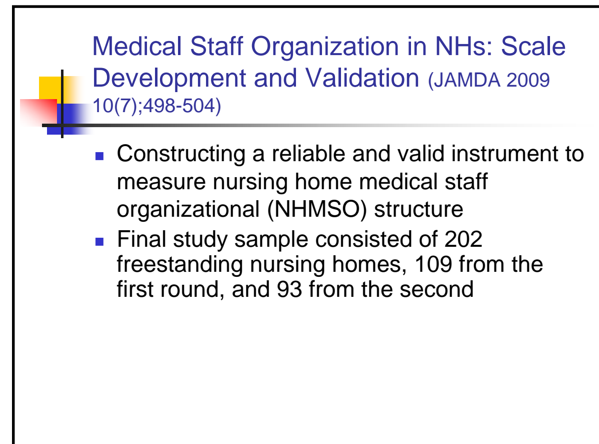
What can we learn from hospitals?

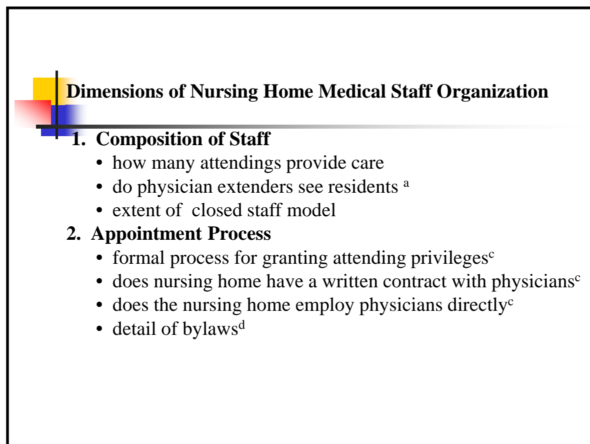
Seven dimensions to describe medical organization in hospitals:

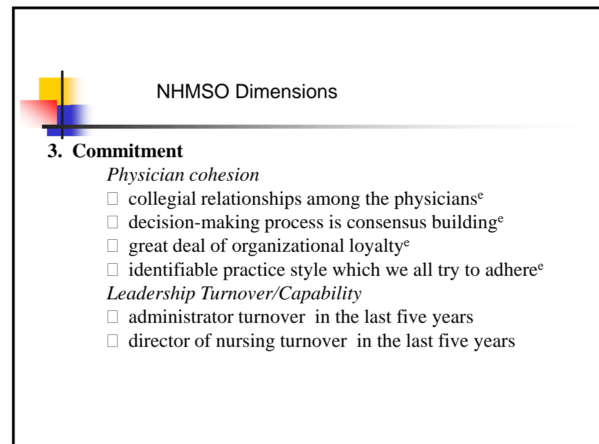
- staff composition
- appointment process
- job commitment of physicians
- reporting and coordination systems
- number of control committees
- documentation
- informal interpersonal relationships

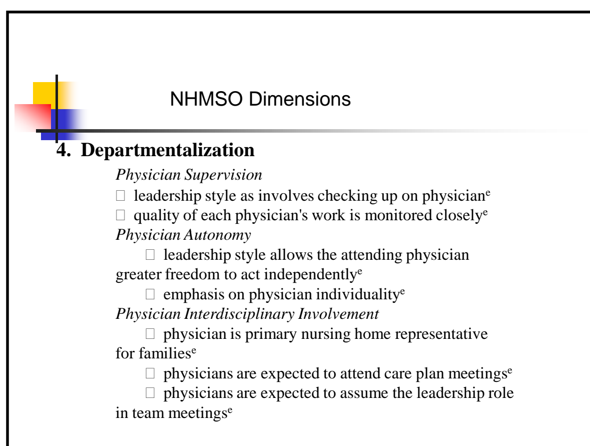
Roemer and Friedman


What can we learn from hospitals?
Hospitals' performance, as measured by national accreditation, was related to the aspects of the physician's job commitment and the more tightly structured hospital staff organization
Structured medical staffs have better medical/surgical outcomes
Involvement of medical staff and percent of active staff on contract were all positively associated with outcomes
Effects are independent of hospital and individual characteristics
Shortell et al
Flood and Scott


Medical Staff Organization in NHs: Scale Development and Validation (JAMDA 2009 10(7);498-504)
Constructing a reliable and valid instrument to measure nursing home medical staff organizational (NHMSO) structure
Final study sample consisted of 202 freestanding nursing homes, 109 from the first round, and 93 from the second


Dimensions of Nursing Home Medical Staff Organization
1. Composition of Staff
how many attendings provide care
do physician extenders see residents a
extent of closed staff model
2. Appointment Process
formal process for granting attending privileges c
does nursing home have a written contract with physicians c
does the nursing home employ physicians directly c
detail of bylaws d


NHMSO Dimensions
3. Commitment
Physician cohesion
collegial relationships among the physicians e
decision-making process is consensus building e
great deal of organizational loyalty e
identifiable practice style which we all try to adhere e
Leadership Turnover/Capability
administrator turnover in the last five years
director of nursing turnover in the last five years


NHMSO Dimensions
4. Departmentalization
Physician Supervision
leadership style as involves checking up on physician e
quality of each physician's work is monitored closely e
Physician Autonomy
leadership style allows the attending physician greater freedom to act independently e
emphasis on physician individuality e
Physician Interdisciplinary Involvement
physician is primary nursing home representative for families e
physicians are expected to attend care plan meetings e
physicians are expected to assume the leadership role in team meetings e

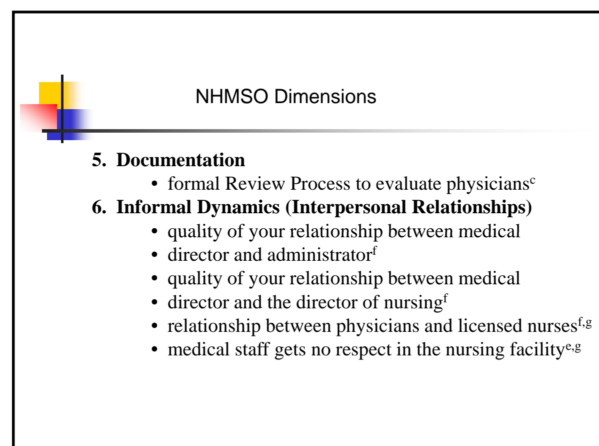

NHMSO Dimensions
5. Documentation
formal Review Process to evaluate physicians c
6. Informal Dynamics (Interpersonal Relationships)
quality of your relationship between medical
director and administrator f
quality of your relationship between medical
director and the director of nursing f
relationship between physicians and licensed nurses f,g
medical staff gets no respect in the nursing facility e,g

Table 3. Descriptive Statistics and Reliability Analysis of the First Administration of the NHMSOC Scale (n=109)

Dimension / Item	Mean	Std	Alpha
Medical Staff Level			
Medical Staff Culture and Cohesiveness			**.71**
collegial relationships among the physicians	3.46	.97	
decision-making process is consensus building	3.32	.97	
great deal of organizational loyalty	3.51	.96	
identifiable practice style which we all try to adhere	3.12	.89	
Physician Control/Integration			**.66**
leadership style as involves checking upon physician	3.00	1.10	
quality of each physician's work is monitored closely	3.06	1.01	
medical director plays a key role in non-medical (i.e., administrative) decisions	3.11	1.13	
Physician Autonomy			**.67**
leadership style allows the attending physician greater freedom to act independently	4.06	.96	
emphasis on physician individuality	3.77	.78	
Physician Interdisciplinary Involvement, Coordination and Communication			**.80**
physician is primary nursing home representative for families	2.78	1.03	
physicians are expected to attend care plan meetings	2.69	1.19	
physicians are expected to assume the leadership role in team meetings	2.49	1.09	

Dimension / Item	Mean	Std	Alpha
Nursing Home Level			
Nursing Home Culture			**.70**
quality of your relationship between medical director and administrator	4.09	.93	
quality of your relationship between medical director and the director of nursing	4.22	.86	
relationship between physicians and licensed nurses	3.94	.82	
medical staff gets no respect in the nursing facility (r)	4.27	.95	
Leadership Turnover/Capability			**.80**
administrator turnover in the last five years	2.07	1.23	
director of nursing turnover in the last five years	2.48	1.55	
Credentialing Process/Formalization			
detail of bylaws	2.55	1.19	
Physician Contract/Formalization and Standarization			
(percent of homes)	15%		
Closed Staff Indicator/Control and Cooridation			
mean percent residents cared by community physicians	44.72%	39.52	
Nurse Practitioner and/or Physician Assistant Involvement/Specialization			
(percent of homes)	66%		

Intercorrelations among the Dimensions of NHMSOC from Combined Surveys (n=202)

	1	2	3	4	5	6	7	8	9	10
1 Medical staff culture and cohesiveness	_									
2 Nursing home culture	.28**	_								
3 Physician control/integration	.42**	.23**	_							
4 Physician autonomy	-.05	.08	-.07	_						
5 MD interdisciplinary involvement	.31**	.06	.37**	-.05	_					
6 Leadership turnover	-.21**	-.15*	-.09	-.02	-.05	_				
7 Physician Contract	-.12	.04	-.11	.06	-.03	.08	_			
8 Credentialing process/	.29**	-.04	.24**	-.09	.18*	-.11	-.03	_		
9 Closed staff indicator	.02	.09	.02	.07	-.13	-.01	.31**	-.12	_	
10 Involvement of NP/PA	-.01	-.03	-.01	-.05	-.14*	.07	-.04	-.07	-.02	_

* $p < .05$, two tailed test
**$p < .01$, two tailed test

IS NHMSO RELATED TO CLINICAL OUTCOMES?

- Using Hierarchical Multiple Regression Analyses, test whether the NHMSO dimensions are predictive of quality markers (OSCAR) after accounting for nursing home characteristics (case mix; bed size; part of a chain; for profit; nurse staff ratios
- Findings statistically significant (R^2 change) for prevalence of pain (long stay), catheter use and pneumococcal vaccine administration and positive trends as regards restraint use and prevalence of pressure ulcers

Notwithstanding the Evidence Beware of the……….

The Dangerfield Effect

Unique physician skills necessary for host of clinical, ethical, legal, interdisciplinary issues and which impact care but……

- Primacy of medical model with acute focus
- General lack of understanding of complexity of LTC practice
- Under appreciation (among leaders in medicine) lowers expectations of physician care in LTC and impacts on perceived thresholds for physician involvement **(NO RESPECT)**

A Model for Nursing Home Physicians

Three critical dimensions…

Commitment conceptualized as percentage of the physician's practice devoted to NH care and the amount of time, on average, spent per NH patient encounter.

Physician NH practice competency defined by specialized training and experience necessary to handle the complex medical care in a highly regulated, interdisciplinary care context that is the contemporary NH.

Organizational structure reflects the cohesive integration of the medical providers into the culture of the facility.

A Model for Nursing Home Physicians
Ann Intern Med 2009; 150:411-413)

- It is hypothesized that the quality of medical practice in NHs is optimized when physician geriatric competency and commitment are high within a closed staff model (few physicians responsible for all patients).
- Conversely, quality of care is lowest in an open staff model where physicians demonstrate low commitment and geriatric competency.

Improving Medical Care

- The framework suggests quality of care can be improved by progressing along one or more of three paths—
- Enhancing training and credentialing (competency)
- Increasing reimbursement (commitment)
- Developing new regulatory mandates and organizational models (closing medical staffs)

Goal: To Enhance the Training of Physicians Practicing in Nursing Homes

- Current training
- New Approaches

ACGME Training Requirements

- Internal Medicine
  - "Residents must have formal instruction and assigned clinical experience in geriatric medicine……these experiences may occur at 1 or more specifically designated geriatric inpatient units, geriatric consultation services, **long-term care facilities**, geriatric ambulatory clinics and/or in home care settings."

ACGME Training Requirements

- Family Medicine
  - "Programs should provide opportunity for residents to learn in multiple settings (e.g. hospital, ambulatory settings, emergency rooms, home and **long term care facilities**)."
  - "Residents must develop competency in assessing and meeting the healthcare needs of declining elders, episodic, illness related care, delivery of healthcare in the home, hospital and **long-term care facility**, and end of life care."

ACGME Training Requirements

- Family Medicine
  - "Resident panels must include continuity patients requiring home care and care in long-term care facilities to provide each resident with continuity experience in those settings."
  - "Each residency must document that a patient population of adequate size, representing a broad spectrum of problems, with sufficient age and gender distribution, is cared for in the hospital,in the FMC, and in **institutions for long-term care** or rehabilitation as appropriate."

Resident Training in the Nursing Home

- **Internal Medicine**
  - Loose requirements;Significant inter-program variability;few offer longitudinal experiences
  - Account for 1/3 of practicing NH physicians
- **Family Medicine**
  - Specific requirements for nursing homes including longitudinal experiences. Curriculum and numbers of patients varies from program to program.
  - Account for 2/3 of practicing NH physicians

Adequacy of Training

- In a survey of graduating residents, fewer than 15% felt "very prepared to provide nursing home care"
  - (Blumenthal D, Gokhale M, Campbell EG, Weissman JS. Preparedness for clinical practice: reports of graduating residents at academic health centers. JAMA. 2001;286:1027-34)

Time for the Soapbox

Prerequisites for Optimal Training

- **Leadership** (deans/chairs/program heads) must accept the importance of LTC within the continuum
  - The "facts" only go so far
  - Need to advocate for quality metrics that recognize the linkage between acute/LTC (i.e. P4P)
  - Incentives must be aligned (i.e. hospitals held accountable for the adequacy of care transitions)

Prerequisites for Optimal Training

- Nursing home culture that embraces "teaching"
  - Buy in from the NH leadership (administrator;DON) is critical
  - Association with University may enhance public relations (39% of AMDA members self identify as "faculty")
  - Systems must be in place to accommodate varying schedules of trainees (providers available to cover calls)

Prerequisites for Optimal Training

- Longitudinal experience with adequate patient volume
  - At least one year to appreciate the natural course of illness
  - Assures diversity
  - Exposure to myriad acute and chronic problems

Prerequisites for Optimal Training

- Mandated nursing home primer
  - Uniform knowledge base that assures consistent levels of competency
  - Focus on systems of care;regulatory environment;acute/LTC interface;principles of rehabilitation;quality measurement;capacity assessment;care planning

Prerequisites for Optimal Training

- Engaged and knowledgeable role models
  - Demonstrate the diversity and challenge of NH care
  - Demonstrate the skill necessary to practice effectively
  - Counter negative stereotypes
  - Establish credibility
  - Highlight career opportunities

Future Directions

- **Establish a "Nursing Home Specialty"**
  - The "Netherlands" paradigm
  - Enhanced credibility;reinforces NH practice as a legitimate practice

Nursing Home Specialty: Special Considerations

- Competition with CMDs
- Maintaining inclusiveness
  - Pathways would need to embrace both early and mid-career providers
- Seeking partnerships
- AMDA ownership
- Issues related to home care and ALFs

Nursing Home Specialty: Special Considerations

- Defining requirements for recognition
  - Time commitment
  - Past experiences
  - Knowledge assessment
- Pathways
  - Focused recognition
  - Certification akin to CMD
  - Mastery year of residency
  - NH fellowship

The Future of NH Medicine

- Organized medicine must address at least 4 major issues:
  - Mainstream medicine must reinforce NH practice as a legitimate medical practice site thus preventing further marginalization of LTC
    - Broad based organizations (i.e.AMA;AAFP;ACP) must join AMDA and AGS in defining the role of the NH physician

The Future of NH Medicine

- Attracting and retaining a competent/trained workforce
  - Funding
  - Training
  - Liability reform

The Future of NH Medicine

- Adequate financial support for the practice of geriatrics
  - Dividing the same pie may not be enough
  - Existing and proposed funding levels are chasing physicians out of NHs leaving practice models that are virtually void of physician engagement
  - NH administrators must weigh the cost effectiveness of different organizational models and not continue to operate under the pretext of old and untested paradigms

The Future of NH Medicine

- Research to test new models of care that will guide future policy
  - Define the optimum organizational framework
  - Define new quality metrics
  - Relationship between MDs and NPPs (? Doctors of Nursing)
  - New quality incentives

SUMMARY

- Physicians play a vital and unique role in the care of long term care patients.
- A shortage of physicians in LTC currently exists and is likely to worsen in the future.
- Residency training must be broadened both in scope and content to assure a committed and competent physician workforce