

Meeting the Demand for Healthcare Services: Workforce Supply for Rural America

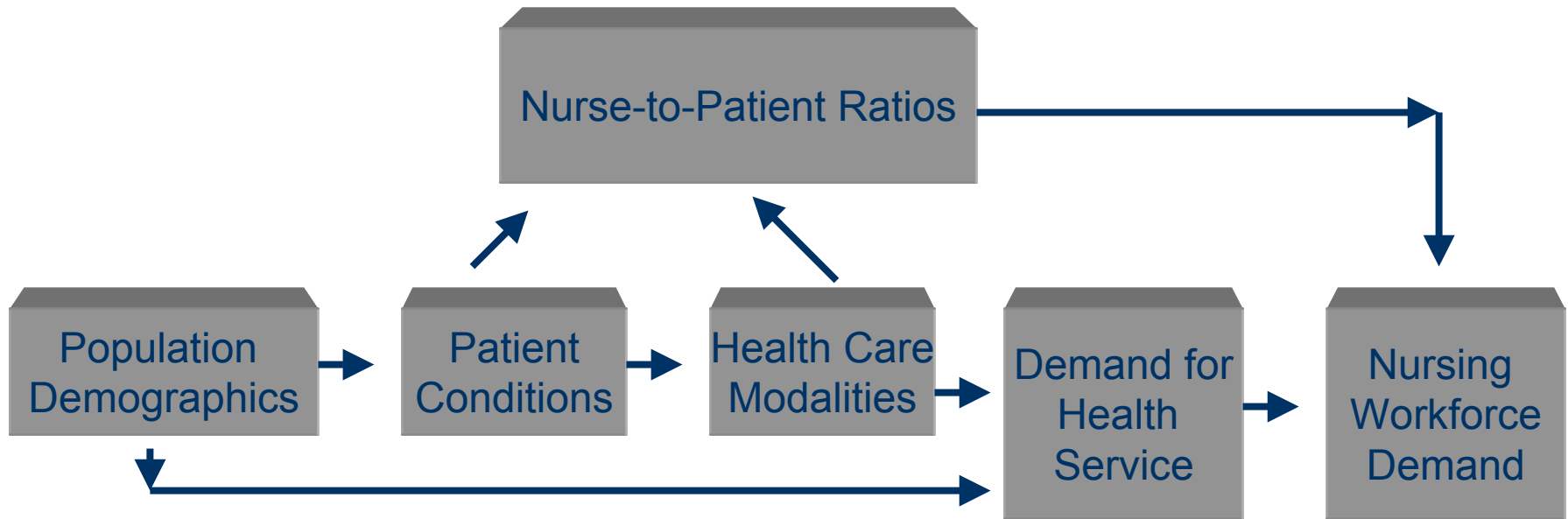
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Presentation Outline

- I. Demand for healthcare workers
- II. Supply of healthcare workers
- III. Levers that could affect this
- IV. What it takes to work toward resolution

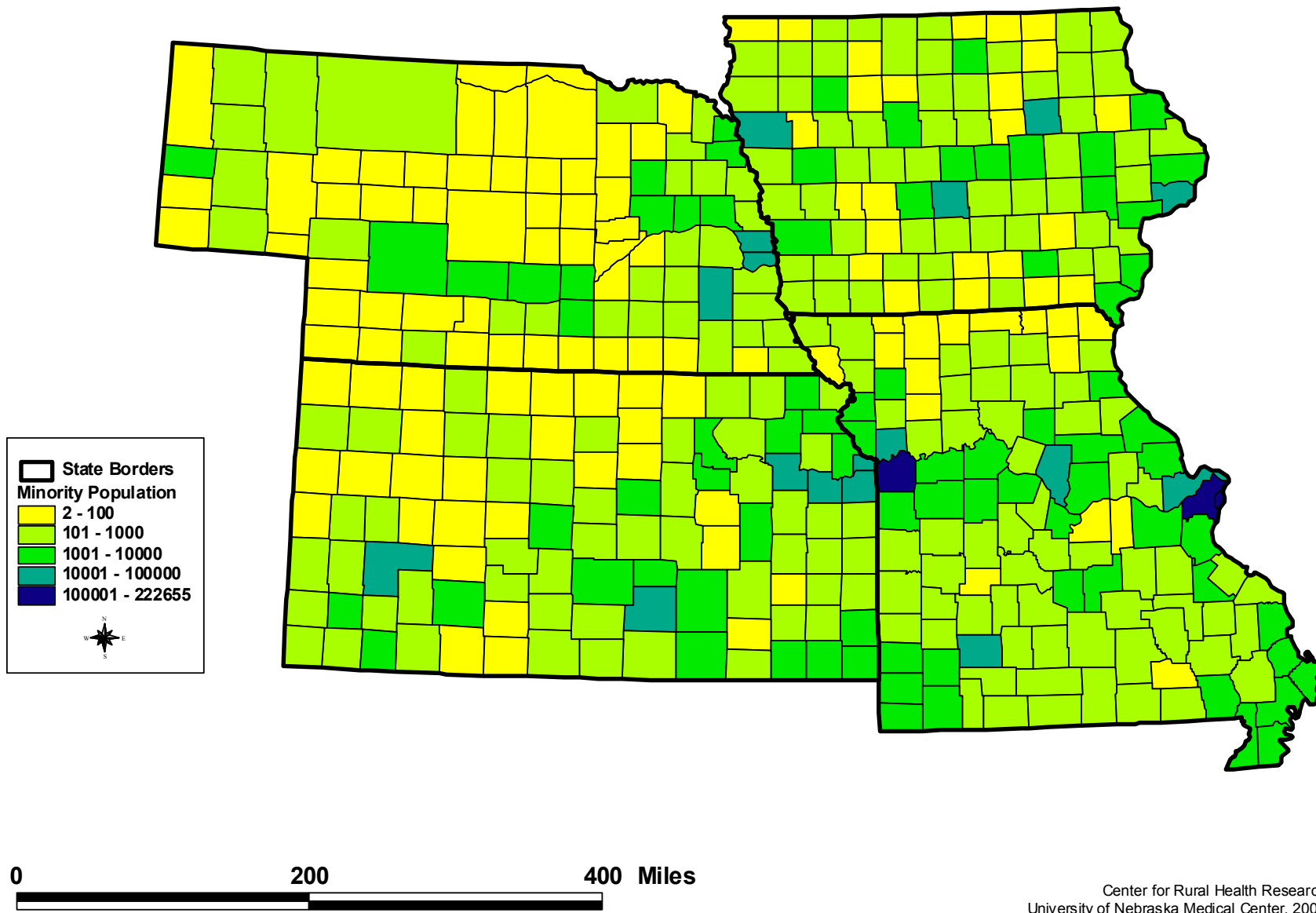
I. The Dynamics of the Demand: Illustration from Nursing



I.A. Population Demographics

- Aging
- Changing (diversification)
- Evolving (new environment-health conditions)

Minority Population - 2000 Census



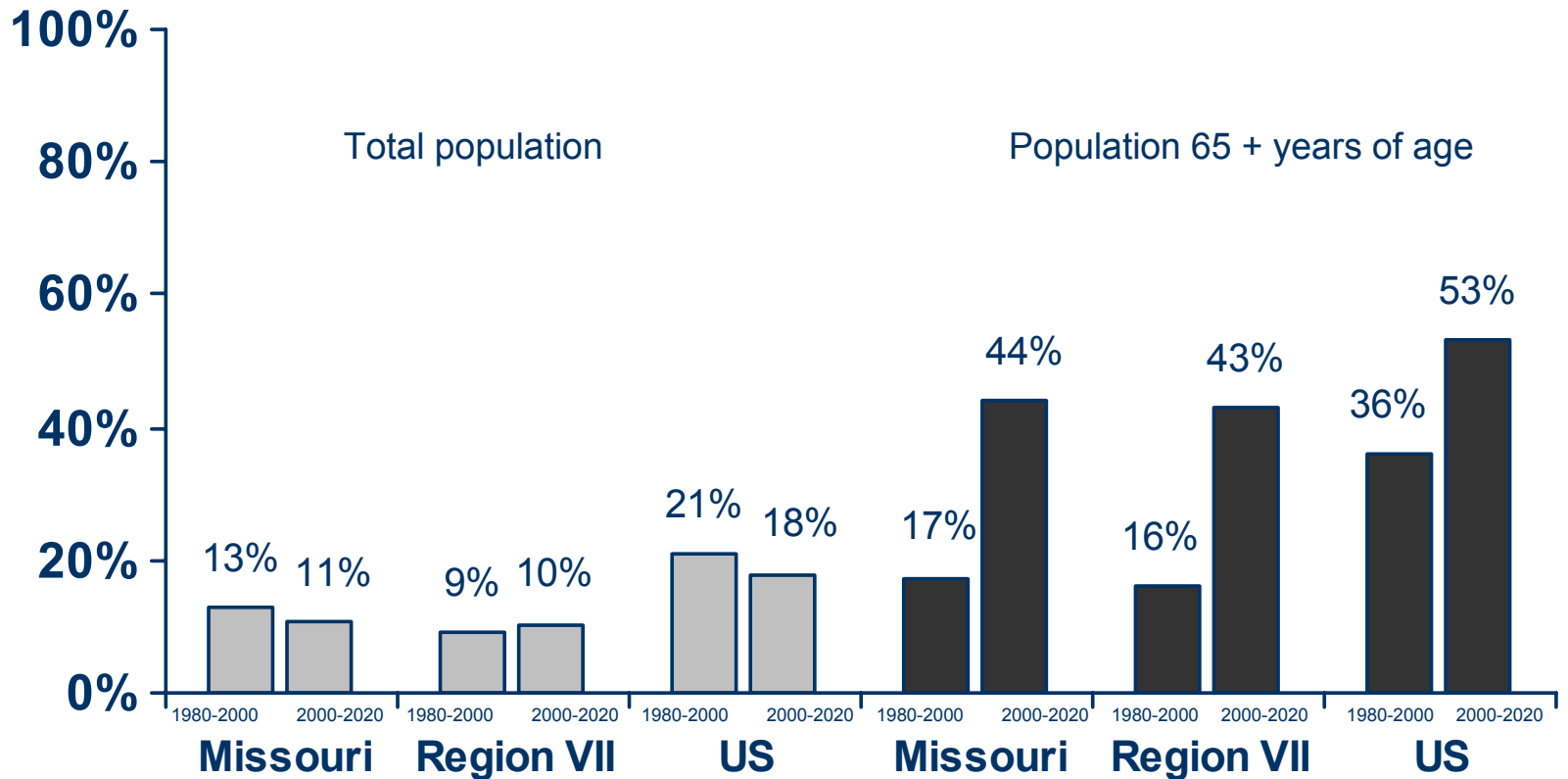
Background

(Taken from *HRSA State Health Workforce Profile, Missouri, December 2000*)

- The total population of Missouri is projected to grow 11% by 2020.
- The population over 65 is projected to grow 44% by 2020. This is in addition to 17% growth in this age group between 1980 and 2000. This is expected to increase the demand for health care services.
- Blacks/African Americans represent 11% of the population of Missouri, compared to 12% for the US. A small proportion of the population is Hispanic/Latino (2%) compared to the US (11%). The proportion of the population that is non-Hispanic Whites is 86%, compared to 72% for the US.
- The infant mortality rate for Blacks/African Americans in Missouri in 1996-98 was more than twice as high (15.5/100,000) as for non-Hispanic Whites (6.2/100,000) or Hispanics/Latinos (5.5/100,000).
- In 1997, Missouri ranked 8th in the country in the rate of deaths due to heart disease and was above national averages in the rate of deaths due to firearms and cancer.
- In 1998, Missouri was above the national averages in the number of hospital beds per 100,000 population and nursing home beds for people 65 and over.

Population Profile

Projected percentage change in total population & population 65 + years of age, 1980-2000 & 2000-2020



Source: Bureau of the Census

I. B. Patient Conditions

Decrease or at least delay in death associated with certain conditions

- some types of cancers
- HIV+
- diabetes

Increase in conditions associated with longer lives

- dementia
- arthritis

Different conditions associated with new population groups

- reappearance of infectious disease due to lack of immunization
- conditions associated with different lifestyles (dietary habits)

I.B. Patient awareness and self-treatment

Cultural differences in patient-provider interactions

Educational differences between modern patient and patient of 20 years ago

Byproduct of exposure to medical information

- health reporters
- commercial advertising

Internet users

Economic differences among patients affects compliance

insurance status

income affects compliance

socio-economic environment affects compliance (two directions)

I. C. Health Care Modalities

Changing application of technology

- robotic surgery
- diagnostic capabilities

Changing roles of health care professionals

- use of different “levels” of professionals
- could see the development of new professions
- expansion of duties of some, especially as related to chronic conditions

I. C. Health Modalities Expanded

Role of public health

- Epidemiology of new and/or chronic conditions
- Interaction with patients (health education)

Focus on continuum of care and care management

I.D. Profession-to-Patient Ratios

Change as a result of changes in patient conditions and care modalities

Varies across professions and localities

- Variation in licensing
- Variation in professional turf protection
- Variation in practice patterns

I.E. Demand for Health Services

- Patient conditions
- Filtered through health care modalities
- Translated into ratios
- Yields the demand for services

I.E. Demand for Services: Illustrations

- Outpatient services as part of continuum of care for chronic conditions
- Special needs of patients with dementia
- Chronic conditions and use of pharmaceuticals, including changes in practice of dispensing drugs

I.F. Demand for Workforce

Demand for services may mean certain workers

- aging population
- all chronic conditions
- disabled population

Changing modalities may change the skill mix of the professionals

- unusual becomes routine
- routine becomes complex

Drive for efficiencies drives professional practices

Demands for accountability affect efficiencies of providers

II. Supply of Health Care Providers

Shortages exist in all health care professions

Spot shortages in other occupations

- office staff, including coders
- building maintenance

Competing for attention of youth

Competing against other career options, other occupations in an immediate sense

II. Supply: Nurses

For hospitals, shortages in every region of the country

- particularly acute in the west
- intensive care units and operating rooms hard hit
- emergency departments diverting patients

Other healthcare providers are affected

- skilled nursing facilities
- home health agencies
- assisted living

II. Supply: Nurses

“Nursing facts,” taken from Gregory Weaver, Indianapolis Star, September 18, 2001, reporting on a Nursing Workforce Summit

- about 18% of licensed registered nurses no longer work in the profession
- average age of registered nurse in the U.S. is 45.2
- In past 29 years percentage of nurses under 30 years of age declined from 26% to 9%
- by 2020 supply of RNs expected to be 20% short of demand
- *from Hospitals & Health Networks, as posted on web, July 8, 2000*
- RN earnings dropped 2% 1993 to 1997
- salaries rose in 1998 and 1999
- nursing school enrollment fell 4.6% in 1999



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II. Supply: Pharmacists

Demand: Prescriptions increased 44% from 1992 to 1999 (Health Resources and Services Administration)

Supply: AHA report in June, 2001 that 21% of hospital pharmacy positions unfilled

- Interplay of change in use of technology to increase efficiency

II. Supply: What to Expect

Population demographics affect

Immigration

- from outside U.S.
- from within the U.S.

Capacity for training

- overall capacity will be stressed
- opening up additional capacity may be trend of the future

III. Policy Levers

- K-12 Education
- Recruiting early and often
- Attracting new population groups

III. Policy Levers

Pay Scales

- difficult to change for provider organizations
- cost-based reimbursement helps Critical Access Hospitals

Productivity Improvements

- because of use of technology
- because of use of different employees differently

Work environment

- especially nursing and pharmacy

III. Policy Levers

Growing new programs

- Hospitals in Cleveland area have new Health Service Worker Training Academy
 - welfare to work in housekeeping, food service, and laundry jobs

- Hospital in Louisville offers full tuition, stipends, and part-time jobs

Using International Graduates as immediate response

- Use of J-1 Visa Waiver physicians

IV. Getting There From Here

The system needs more investment

- The importance of adequate resources to enable population to achieve maximum productivity
- The contribution of health care to the economic, social, and political fabric of communities, states, and the nation

Making health care careers attractive options for the new workforce

Special state and local programs to attract professionals to rural areas

- Nebraska's loan repayment linked to UNMC programming
- Florida's campuses in or near underserved areas
- RWJ Foundation Practice Sites program experience
- Flex program

Conclusion

- Transitions in population and health care delivery are at the heart of the shortage issue.
- These core trends need to be addressed by putting health care delivery in broader socio-economic context.
- There are important steps that can be taken locally, and by states.
- Let us think of a vision for the Great Plains

For more information, see:

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