Session 8:
ACP Featured Speaker:
Health Equity for the Practicing Physician

Learning Objectives

1. Describe the most significant health inequities in the United States and their relationship to the social determinants of health.
2. Identify the approaches at the federal level designed to eliminate health inequities in the United States.
Session 8

ACP Featured Speaker: Health Equity for the Practicing Physician

Faculty

Linda Rae Murray, MD, MPH
Chief Medical Officer
Cook County Department of Public Health
Chicago, Illinois

Dr Murray served as chief medical officer—primary care for the 23 primary care and community health centers comprising the Ambulatory & Community Health Network of the Cook County Bureau of Health Services. Today she serves as the chief medical officer for the Cook County Department of Public Health of the Cook County Health & Hospital System, the state certified public health agency for suburban Cook County. She practices as a general internist at Woodlawn Health Center, is an attending physician in the Division of Occupational and Environmental Medicine at Cook County Hospital and is an adjunct assistant professor at the University of Illinois School Of Public Health (Occupational & Environmental Health and the Health Policy & Administration Departments). She plays a leadership role in many organizations including NACCHO’s (National Association of City & County Health Officers) Health Equity & Social Justice Team, the national executive board of American Public Health Association, and serves on the board of the Chicago-based Health and Medicine Policy Research Group.

Dr Murray has worked in a variety of settings including practicing occupational medicine at a Workers Clinic in Canada, served as residency director for occupational medicine at Meharry Medical College, and as bureau chief for the Chicago Department of Health under Mayor Harold Washington. More recently Dr. Murray served as medical director of the federally funded health center, Winfield Moody, serving Cabrini Green Public Housing Project in Chicago. Dr Murray has been an active member of a wide range of local and national organizations including serving as a member of the Board of Scientific Counselors for the Agency for Toxic Substances and Disease Registry (ATSDR), the Board of Scientific Counselors for the National Institute of Occupational Safety and Health (NIOSH) and the Board of Directors of Trinity Health.

Faculty Financial Disclosure Statement
The presenting faculty reports the following:
Dr Murray has no financial relationships to disclose.
Faculty Disclosures

- Dr Murray has no financial relationships to disclose.

Learning Objectives

- Participant will be able to explain the difference between disparity and inequity
- Participant will recognize health status differences by race, ethnicity, class and gender
- Participant will be able to discuss the policy changes required to reduce health inequities

Eliminating “Health Disparities”

- A goal of U.S. health for the past THREE Healthy People plans.
- Many governmental and private foundation grant efforts to address this issue.
- Not doing well.

EXCELLENT RESOURCES:
- Steve Whitman et al. Urban Health: Combating Disparities with Local Data. (Chicago Area)
- WHO REPORT: Closing the gap.

Why are some people healthy and others not?

This is the FUNDAMENTAL question for both population health and personal health.
**Evolution of Healthy People**

<table>
<thead>
<tr>
<th>Target Year</th>
<th>1990</th>
<th>2000</th>
<th>2010</th>
<th>2020</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overarching Goals</td>
<td>Decrease mortality: infants–adults</td>
<td>Increase span of healthy life</td>
<td>Increase quality and years of healthy life</td>
<td>Achieve high-quality, longer life free of preventable disease</td>
</tr>
<tr>
<td></td>
<td>Increase independence among older adults</td>
<td>Achieve access to preventive services for all</td>
<td>Reduce health disparities</td>
<td>Achieve health equity; eliminate disparities</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Increase health span</td>
<td>Create social and physical environments that promote good health</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Promote quality of life, healthy development, healthy behaviors across life stages</td>
</tr>
</tbody>
</table>

**World Health Organization’s Definition of Health**

Health is not simply the absence of disease, but the presence of physical, social, and emotional well-being.

**United Nations Universal Declaration of Human Rights**

Everyone has the right to a standard of living adequate for the health and well-being of himself and his family, including food, clothing, housing and medical care and necessary social services, and the right to security in the event of unemployment, sickness, disability, widowhood, old age or lack of livelihood in circumstances beyond his control.

Article 25

**Definition: Health Disparities**

- Differences in the incidence, prevalence, mortality, and burden of diseases and other adverse health conditions that exist among specific population groups in the United States. This definition includes health disparities related to socioeconomic status. (*National Institutes of Health Sept. 1999*)

**Definition: Institute of Medicine:**

- Across virtually every therapeutic intervention, ranging from high technology procedures to the most elementary forms of diagnostic and treatment interventions, minorities receive fewer procedures and poorer-quality medical care than whites.
- These differences persist even after differences in health insurance, SES, stage and severity of disease, comorbidity, and the type of medical facility are taken into account.
- Moreover, they persist in contexts such as Medicare and the VA Health System, where differences in economic status and insurance coverage are minimized.

Source: Institute of Medicine, 2002
Margaret Whitehead’s definition

- Health Inequities: differences in health that are not only unnecessary and avoidable but, in addition, are considered unfair and unjust.

What is the difference between “Health Disparity” and “Health Inequity”? 

Inequality (or Disparity) = a difference

Two quantities that are not equal

Rate A ≠ Rate B

Disparities are OBSERVED differences.

- Poor people die younger than rich people
- Low social class infants have lower birth weight
- Smokers get more lung cancer than non-smokers
- Women live longer than men

Inequities are ethical judgments about differences

- Should poor people die younger than rich people?
- Should low social class infants have lower birth weight?
- Should smokers get more lung cancer?
- Should women live longer than men?

Epidemiologists can measure health inequality.

However, some process of sociopolitical discourse is required to assess which inequalities are an affront to social justice and thus require intervention.

Social Production of Health and Illness

“Do we not always find the disease of the populace traceable to defects in society?”

- Rudolf Virchow, in a late 19th century speech

It’s complicated!
Commission on Social Determinants of Health FRAMEWORK

- Emphasizes socioeconomic and political context and the structural determinants of health inequity
- CONTEXT includes all social and political mechanisms that generate and configure social hierarchies
  - Including labor market, education system, political institutions, and other cultural and societal values
- Among the contextual factors that most powerfully affect health are the welfare state and its redistributive policies (or absence of such policies)

CSDH FRAMEWORK

- STRUCTURAL DETERMINANTS – generate stratification and social class divisions and define individual socioeconomic position within hierarchies of power, prestige, and access to resources.
  - Most important structural stratifiers are: income, education, occupation, social class, gender, race/ethnicity
- Together the context and structural determinants create the SOCIAL DETERMINANTS OF HEALTH INEQUITIES.

CSDH Model

WHERE DO HEALTH INEQUITIES COME FROM?

- Where do health differences among social groups originate, if we trace them back to their deepest roots?
- The structural mechanisms that shape social hierarchies according to these key stratifiers are the ROOT CAUSE of inequities in health.
What are SDOH?

• Social determinants of health (SDOH) are the economic and social conditions that influence the health of individuals, communities, and jurisdictions as a whole.

• Social determinants of health are about the quantity and quality of a variety of resources that a society makes available to its members.

Ottawa Charter’s Prerequisites of Health

- peace
- shelter
- education
- food
- income
- a stable ecosystem
- sustainable resources
- social justice
- equity

World Health Organization, 1986

Social Class

• Social classes are groupings of individuals based on their relationship to the economy.

• Class matters

What do we mean by “SES”? 

• Socioeconomic status/position (SES)

- Wealth— and/or the associated power and social standing/prestige
  - Income, accumulated economic assets (wealth)
  - Education (prestige, wealth, power)
  - Occupation (power, prestige, wealth)

• Multidimensional construct -- yet health studies often use a single SES measure

Measures of Socioeconomic Status

- Economic Status
  - Income
  - Poverty
  - Wealth

- Occupational Status
  - Occupational prestige

- Educational Status

Economic Status

- INCOME: (personal, family, household)
  - More unstable
  - Age dependent
  - Varies widely within occupations
  - Moderately related to education
  - Fails to include informal economy
  - Can easily be changed through policies
**Federal Poverty Levels**

- Established by Office of Management & Budget in 1963-64
- Created by Mollie Orshansky of Social Security Administration
  - Chose cheapest of four food plans of Dept. of Agriculture.
  - Economy food plan was “designed for temporary or emergency use when funds are low.”

**2012 Federal Poverty Level**

<table>
<thead>
<tr>
<th>Family Size</th>
<th>50%</th>
<th>100%</th>
<th>133%</th>
<th>200%</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>$5,585</td>
<td>$11,170</td>
<td>$14,856</td>
<td>$22,340</td>
</tr>
<tr>
<td>2</td>
<td>$7,565</td>
<td>$15,130</td>
<td>$20,123</td>
<td>$30,260</td>
</tr>
<tr>
<td>3</td>
<td>$9,545</td>
<td>$19,090</td>
<td>$25,390</td>
<td>$38,180</td>
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<tr>
<td>4</td>
<td>$11,525</td>
<td>$23,050</td>
<td>$30,657</td>
<td>$46,100</td>
</tr>
</tbody>
</table>

**Economic Status**

- **WEALTH:** accumulated value of all assets, including home equity, savings, retirement accounts, stocks and bonds, rental property, businesses and vehicles. *(Net worth = wealth – liabilities)*
  - More strongly linked to social class than income
  - Difficult to measure
Occupational Status

- Summarizes power, income, and educational requirements associated with various positions in the occupational structure.
  - Environmental and working conditions
  - Decision making latitude
  - Psychological demands

- Rapid changes in technology – blue collar disappearing. Service sector increasing

Unemployment by race, ethnicity 1979 - 2011

Figure 4E Share of workers earning poverty-level wages, by gender, 1973–2011

Mishel, State of Working American, 2012
Educational Status

- **Advantages**
  - Fairly stable for adults
  - Practical
  - An indicator likely to capture aspects of lifestyle and behavior

- **Disadvantages**
  - Varies by age cohort
  - Relative to income decreasing variability in years of education
  - Individual measure, not household
  - Economic return varies by race and gender

Cognitive Test Scores at Ages 22, 42, 60, and 120 months by Parents’ SEP and early score

Example:

Education

- **SOCIAL CAUSATION**
  - Exposure to low SES leads to worsening of health status

- **SOCIAL SELECTION**
  - Poor health status leads to lower SES

SES & Health
Relationship between Social Context and Health

<table>
<thead>
<tr>
<th></th>
<th>Community SES LOW</th>
<th>Community SES HIGH</th>
</tr>
</thead>
<tbody>
<tr>
<td>Individual SES LOW</td>
<td>Worst health</td>
<td>Poor health</td>
</tr>
<tr>
<td>Individual SES HIGH</td>
<td>Better health</td>
<td>Best health</td>
</tr>
</tbody>
</table>

SES: A Key Determinant of Health

- Socioeconomic Status (SES), usually measured by income, education, or occupation, influences health in virtually every society.
- SES is one of the most powerful predictors of health, more powerful than genetics, exposure to carcinogens, and even smoking.
- The gap in mortality between high and low SES persons is larger than the gap between smokers and non-smokers.
- Americans who have not graduated from high school have a death rate two to three times higher than those who have graduated from college.
- Low SES adults have levels of illness in their 30s and 40s that are not seen in the highest SES group until after the ages of 65-75.

The Role of Segregation and Structural Racism

Historical Overview of African Americans 1619-2012

- Post-Civil Rights 1965 - 2012: 47 yrs = 12%
- Reconstruction & Jim Crow 1863 - 1965: 102 yrs = 26%
- Slavery 1640 - 1863: 244 yrs = 62%
Biological determinism

“The Negro races stand at the lowest point in the scale of human beings...It is clear they are incapable of self-government and that any attempt to improve their condition is warring against an immutable force of nature.”

Dr. Josiah C. Nott, 1851

Source: Krieger, IJHS, 1987

SES and Race

• African Americans, Latinos, American Indians, and some Asian groups have lower levels of education, income, professional status, and wealth than whites. These differences in SES are a major reason for racial/ethnic differences in health.
• Education and income are generally more strongly associated with health status than race.
• Racial differences in health status decrease substantially when blacks and whites are compared at similar levels of SES.

Race/Ethnicity and SES

• Race and SES are two related but not interchangeable systems of inequality
• In national data, the highest SES group of African American women have equivalent or higher rates of infant mortality, low birth-weight, hypertension and overweight than the lowest SES group of white women

Infant Mortality Rates by Education

<table>
<thead>
<tr>
<th>Infant Mortality Rates by Education</th>
<th>Infant Mortality Rates by Education</th>
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<tbody>
<tr>
<td>Infants of mother &gt; 20 yrs</td>
<td>Infants of mother &gt; 20 yrs</td>
</tr>
<tr>
<td>Black &lt; 12 yrs education</td>
<td>Black &lt; 12 yrs education</td>
</tr>
<tr>
<td>Black &gt; 13 yrs education</td>
<td>Black &gt; 13 yrs education</td>
</tr>
<tr>
<td>White &lt; 12 yrs education</td>
<td>White &lt; 12 yrs education</td>
</tr>
<tr>
<td>White &gt; 13 yrs education</td>
<td>White &gt; 13 yrs education</td>
</tr>
<tr>
<td>White HS grad</td>
<td>White HS grad</td>
</tr>
</tbody>
</table>

Health, United States 2000, National Center for Health Statistics

AMERICAN APARTHEID

“This extreme racial isolation did not just happen; it was manufactured by whites through a series of self-conscious actions and purposeful institutional arrangements that continue today.” (p 2)

AMERICAN APARTHEID

“If the escalating violence still failed to produce the desired results, the last step was dramatic and guaranteed to attract attention, not only of the homeowner but the entire black community: bombing. During and after World War I, a wave of bombings followed the expansion of black residential areas in cities throughout the north. In Chicago, fifty-eight black homes were bombed between 1917 and 1921, one every twenty days.” (p 35)
Segregation - Racial and Ethnic Distribution in Cook County and Chicago 2005-2009

Life Expectancy by Census Tract and Municipality, Cook County and Chicago, (2003 – 2007)

Average Life Expectancy (2003-2007) by Median Income of Census Tract/Municipality (2009), Cook County

Negative Effects of Segregation on Health and Human Development

- Racial segregation concentrates poverty and excludes and isolates communities of color from the mainstream resources needed for success. African Americans are more likely to reside in poorer neighborhoods regardless of income level.

- Segregation also restricts socioeconomic opportunity by channeling non-whites into neighborhoods with poorer public schools, fewer employment opportunities, and smaller returns on real estate.

Brian Smedley : Joint Center for Political & Economic Studies

Negative Effects of Segregation on Health and Human Development (cont’d)

- African Americans are five times less likely than whites to live in census tracts with supermarkets, and are more likely to live in communities with a high percentage of fast-food outlets, liquor stores, and convenience stores

- Black and Latino neighborhoods also have fewer parks and green spaces than white neighborhoods, and fewer safe places to walk, jog, bike, or play, including fewer gyms, recreational centers, and swimming pools

Brian Smedley : Joint Center for Political & Economic Studies
Negative Effects of Segregation on Health and Human Development (cont’d)

- Low-income communities and communities of color are more likely to be exposed to environmental hazards. For example, 56% of residents in neighborhoods with commercial hazardous waste facilities are people of color, even though they comprise less than 30% of the U.S. population.

- The “Poverty Tax”: Residents of poor communities pay more for the exact same consumer products than those in higher-income neighborhoods—more for auto loans, furniture, appliances, bank fees, and even groceries.

The Pervasiveness of Racial Disparities

- Hispanics, American Indians and Asian Americans have lower death rates than whites for the three leading causes of death (60% of all deaths).
- Hispanics have higher death rates than whites for diabetes, liver cirrhosis, and homicide.
- American Indians have higher death rates than whites for diabetes, liver cirrhosis, accidents, and suicides.
- Between 1955 and 1993 the gap in health between American Indians served by the IHS and whites remained large for causes of death such as accidents, homicide, T.B., and alcoholism, and increased for others such as diabetes, liver cirrhosis, and suicide.

Race Still Matters

Why race matters after adjustment for SES

1. All indicators of SES are non-equivalent across race. Compared to whites, blacks receive less income at the same levels of education, have less wealth at the equivalent income levels, and have less purchasing power (at a given level of income) because of higher costs of goods and services.
2. Health is affected not only by current SES but by exposure to social and economic adversity over the life course.
3. Personal experiences of discrimination and institutional racism is an added pathogenic factor that can affect the health of minority group members in multiple ways.

Race & Class

- There are large and persistent racial/ethnic differences in health
- SES is a major contributor to racial disparities in health
- Race still matters for health when SES is considered
- SES is one of the strongest known determinants of health.
- Efforts to improve health require addressing the broad determinants of health that are embedded in living and working conditions.
Percent Coverage Employer-Sponsored Health Insurance by age, 2011

Share of private-sector workers with employer-provided health insurance, by race and ethnicity, 1979–2010

Ethnicity and Analgesia

A chart review of 139 patients with isolated long-bone fracture at UCLA Emergency Department (ED):

- All patients aged 15 to 55 years had the injury within 6 hours of ER visit, had no alcohol intoxication.
- 55% of Hispanics received no analgesic compared to 26% of non-Hispanic whites.
- With simultaneous adjustment for sex, primary language, insurance status, occupational injury, time of presentation, total time in ED, fracture reduction and hospital admission, Hispanic ethnicity was the strongest predictor of no analgesia.
- After adjustment for all factors, Hispanics were 7.5 times more likely than non-Hispanic whites to receive no analgesia.

Avoiding the Lifestyle Trap

- Lifestyle choices are heavily structured by life circumstances
- Lifestyle choices by themselves account for modest proportions of health status
- Lifestyle choices are difficult to change without considering life contexts
- Lifestyle choice emphases can have unintended side effects that work against health
Cook County Community Health Clinics

Using Chronic Care Model

Started a Saturday walking club with health center staff and DM patients

This group activity looked at food choices in the Englewood community

Worked with local stores to improve choices

REACH GRANTEES:
Detroit and Chicago – involved communities in planning.

Sustainable Food System Model

Source: 2007 ADA Primer on Sustainable Food: Healthy Land, Healthy People

Cheap ingredients mean larger portion sizes and more calories

Change in food prices, 1985–2000 (real dollars)


Patient Protection and Affordable Care Act

- Major health policy achievement
- Achieves 94% health coverage
- Reduces deficit by $143 billion
- Increase value and quality for health dollar
- Increases affordability for almost everyone
- Supports a 21st century HIT system
- “Major” insurance reforms
- Promotes prevention and wellness

Supported by Four Strategies in the Accountable Care Act...
HOPE: Some see fundamental re-structuring of U.S. medical care system

- An inversion of the Resource Allocation Triangle so that...
  - Prevention Activities will be funded and widely deployed
  - Primary Care will become a desirable occupation
  - Resulting in Decreased Demand in the Specialty and Acute Care Systems

ACA & Health Equity

- Data Collection and Reporting by Race/Ethnicity, language
  - Monitors health disparities
- Workforce Diversity
  - Support at all levels, community health workers
- Cultural Respect Education
- Health “Disparities” Research
- Public Health Initiatives – Prevention and Public Health Council
- Social Determinants of health – Health Impact Assessments

What should we do?

- A focus on prevention, particularly on the conditions in which people live, work, play, and study
- Multiple strategies across sectors
- Sustained investment and a long-term policy agenda
- Place-based Strategies: Investments in Communities

Overarching Principles

- Improve daily living conditions
  - The circumstances in which people are born, grow, live, work, and age
- Tackle Inequitable Distribution of Power, Money, and Resources
  - The structural drivers of those conditions of daily life – globally, nationally, and locally
- Measure and understand the problem and assess the impact of action
  - Expand knowledge base, develop a workforce trained in social determinants of health, raise public awareness about the social determinants of health

SDOH and their Public Policy Determinants

- EARLY LIFE – income supports, progressive family policy, availability of childcare, support services, invest in quality education
- EDUCATION – support for literacy, public spending, tuition policy, provide basic skills for unskilled
- EMPLOYMENT & WORKING CONDITIONS – active labor policy, support for collective bargaining, increasing worker control, improve working conditions to reduce injuries and job stress
- UNEMPLOYMENT – active labor policy, replacement benefits, labor legislation, increase employment opportunities
SDOH and their Public Policy Determinants

- **HOUSING** – income and housing policy, rent controls and supplements, provision of social housing
  - Improve housing quality and the safety of neighborhood environments
- **INCOME & INCOME DISTRIBUTION** – taxation policy, minimum wages, social assistance, social assistance levels, family supports
- **RACISM & DISCRIMINATION** – anti-discrimination laws and enforcement, ESL and job training, approving foreign credentials, support of a variety of other health determinants
- **SOCIAL SAFETY NET** – spending on a wide range of welfare state areas

SDOH and their Public Policy Determinants

- **FOOD SECURITY** – income and poverty policy, food policy, housing policy
- **HEALTH SERVICES** – public spending, access issues, integration of services
  - Improve access to care
  - Improve quality of care
  - Emphasize prevention of illness
  - Develop incentives to reduce inequalities in the quality of care.
- **COMMUNITIES** – enrich the quality of neighborhood environments and increase economic development in poor areas.

Social Justice and Health

“Rarely do we find men who are willing to engage in hard, solid thinking. There is an almost universal quest for easy answers and half-baked solutions. Nothing pains some people more than having to think.”

Rev. Martin Luther King Jr.

Questions?

?