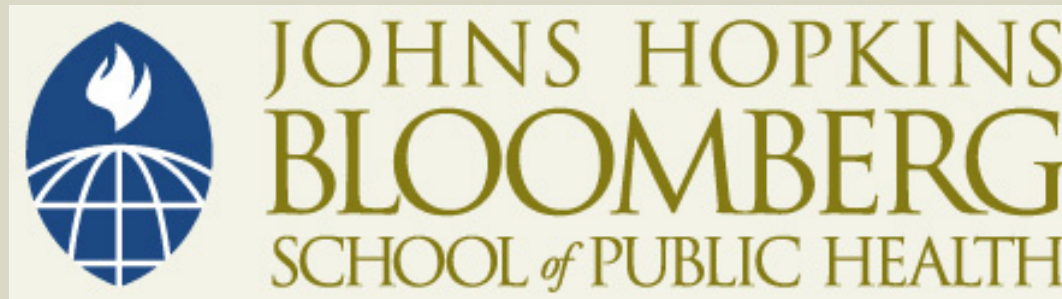


This work is licensed under a [Creative Commons Attribution-NonCommercial-ShareAlike License](https://creativecommons.org/licenses/by-nc-sa/4.0/). Your use of this material constitutes acceptance of that license and the conditions of use of materials on this site.



Copyright 2006, The Johns Hopkins University and Larry Wissow. All rights reserved. Use of these materials permitted only in accordance with license rights granted. Materials provided "AS IS"; no representations or warranties provided. User assumes all responsibility for use, and all liability related thereto, and must independently review all materials for accuracy and efficacy. May contain materials owned by others. User is responsible for obtaining permissions for use from third parties as needed.

Poverty and Health

Larry Wissow

Professor

Health, Behavior and Society

Johns Hopkins School of Public Health

Policy vs. personal

- the personal narrative is an attempt to explain something for yourself – you use the writing to analyze and come to an understanding of an experience
- the policy narrative is designed to convince someone else of something – you, in this case, know what you think about it.

Policy vs. personal

- Your hope is to influence someone who may vote or enact policy
- You may use a small amount of set-up or framing material but the bulk of the composition is made up of a story or stories that illustrate the point you want to make – this isn't an essay.

Relationship of “poverty” and health

- One of the most persistent findings in all of social epidemiology – see it across conditions, across countries (though of course exceptions)
- The Whitehall Study of heart disease by type of occupation: starting from the top, at each occupational level moving down, there exists a higher mortality rate from CVD than in the previous occupational level

Poverty and health

- See relationship in both subjective ratings of health status (poor more likely to rate their health as poor) but also in objective measures based on lab tests or physical examinations
- See it in both genders
- Rich-poor differences in health increase with age, though visible among children. Seems to be a cumulative effect.
- Disparities in mortality rates between the richest and poorest seem to be increasing, even as overall mortality rates have tended to fall.

Definitions – absolute poverty

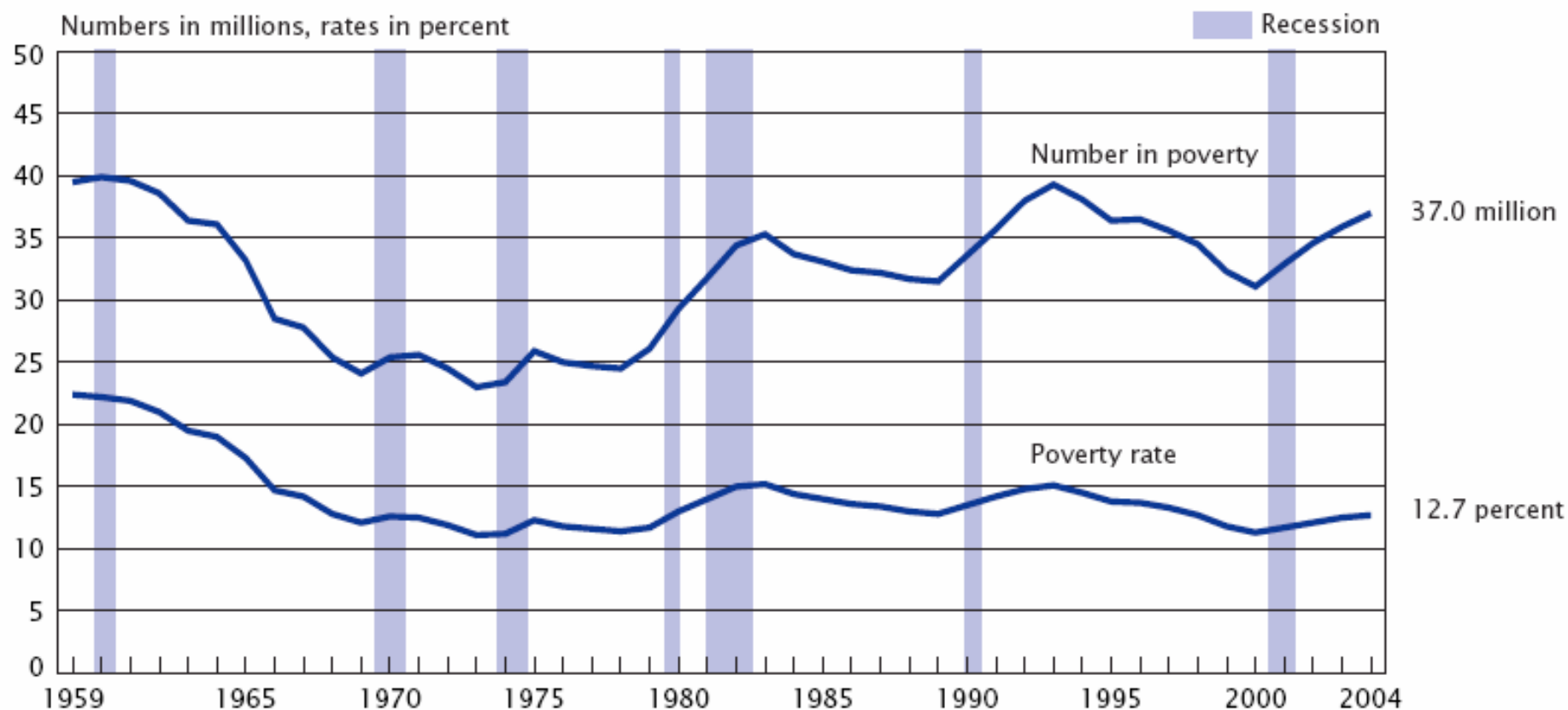
- Absolute poverty: cannot meet basic human needs for food, shelter, and disease avoidance.
- Usually measured financially, but lots of critiques – what is “required” depends a lot on job, family structure, etc. and on social norms.
- In US, is costs of a particular basket of food to meet a basic meal plan, adjusted for inflation and family size (“Orshansky threshold”).
- <http://www.census.gov/hhes/www/poverty/>

Poverty Thresholds for 2004 by Size of Family and Number of Related Children Under 18 Years

Size of family unit	Weighted average thresholds	Related children			
		None	One	Two	Three
One person (unrelated individual).....	9,645				
Under 65 years.....	9,827	9,827			
65 years and older.....	9,060	9,060			
Two persons.....	12,334				
Householder under 65 years.....	12,714	12,649	13,020		
Householder 65 years and older.....	11,430	11,418	12,971		
Three persons.....	15,067	14,776	15,205	15,219	
Four persons.....	19,307	19,484	19,803	19,157	19,223
Five persons.....	22,831	23,497	23,838	23,108	22,543
Six persons.....	25,788	27,025	27,133	26,573	26,037
Seven persons.....	29,236	31,096	31,290	30,621	30,154
Eight persons.....	32,641	34,778	35,086	34,454	33,901
Nine persons or more.....	39,048	41,836	42,039	41,480	41,010

Source: U.S. Census Bureau.

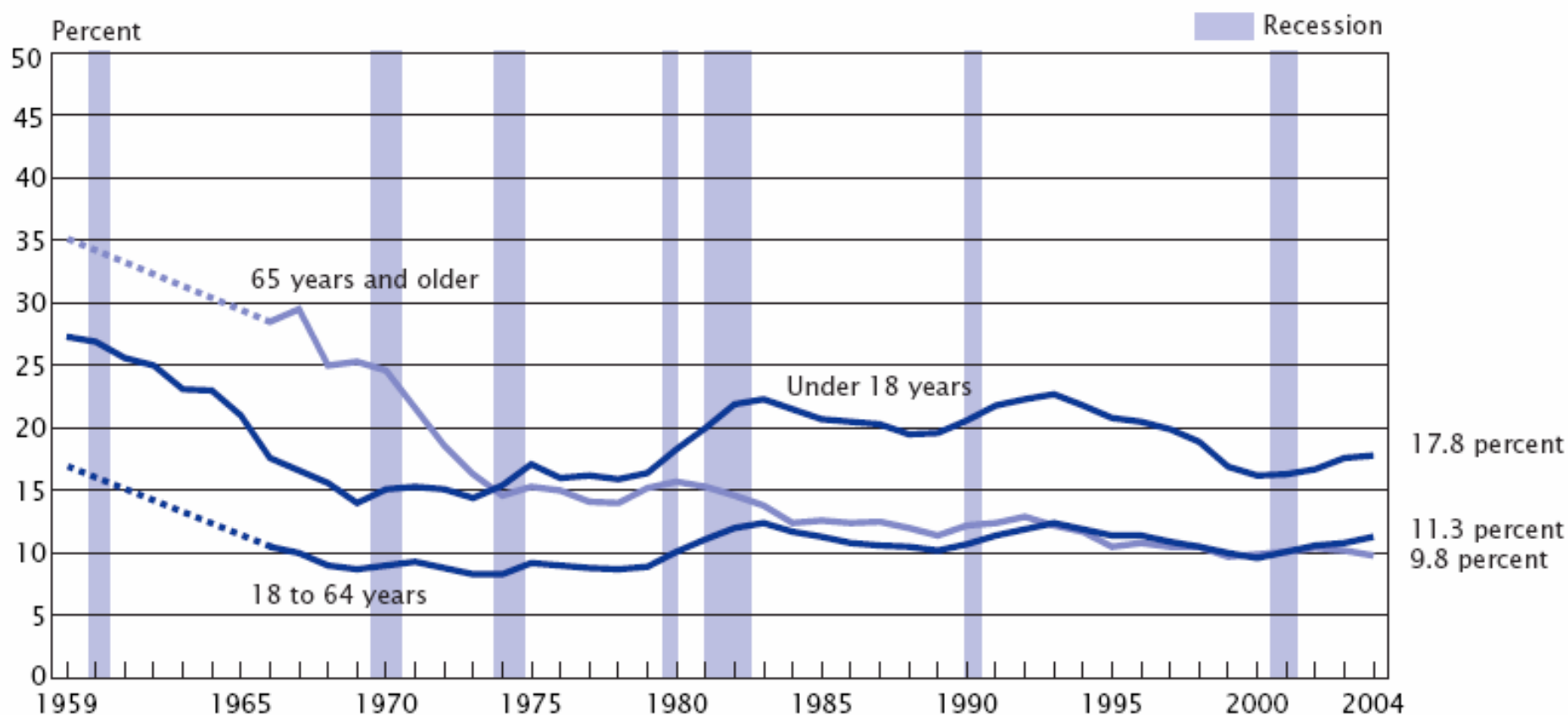
Figure 3.
Number in Poverty and Poverty Rate: 1959 to 2004



Note: The data points are placed at the midpoints of the respective years.

Source: U.S. Census Bureau, Current Population Survey, 1960 to 2005 Annual Social and Economic Supplements.

Figure 4.
Poverty Rates by Age: 1959 to 2004

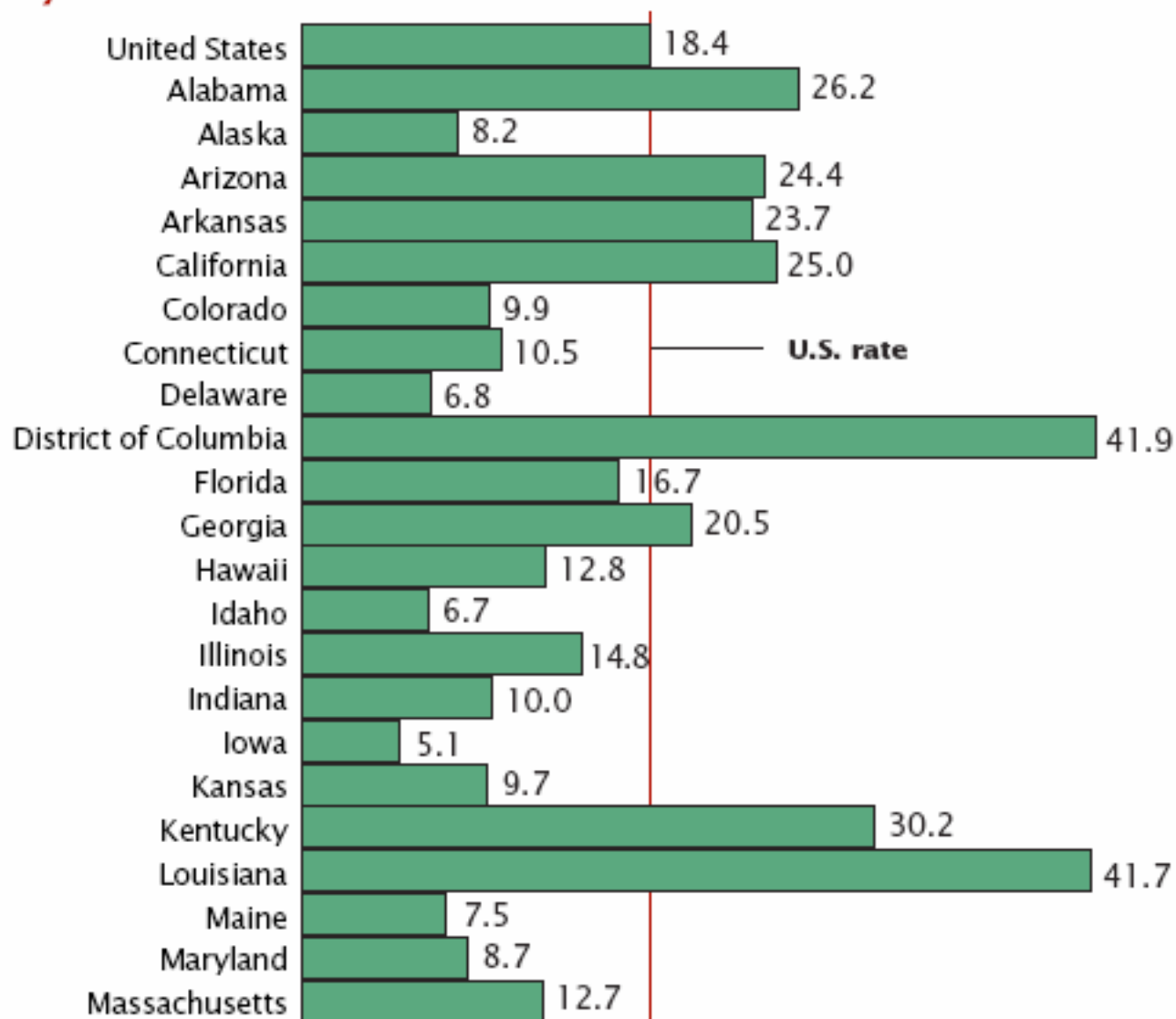


Note: The data points are placed at the midpoints of the respective years.
 Data for people 18 to 64 and 65 and older are not available from 1960 to 1965.

Source: U.S. Census Bureau, Current Population Survey, 1960 to 2005 Annual Social and Economic Supplements.

Figure 2.

**Percentage of the Population Living in Poverty Areas
by State: 1999**



Problems with absolute poverty

- Hard to determine an absolute threshold below which health is threatened, or an upper threshold over which there is a random distribution of health (or other “good” to be used as yardstick)
- Relationship of income to health gets weaker as income rises but does not go away

Problems with absolute poverty

- Across developed countries, higher GDP/capita (ecologic measure of personal income) is not related to health status
- Income and health can be related *within* but not necessarily *among* nations (though this is clearly not true for comparisons of developed with poor countries)

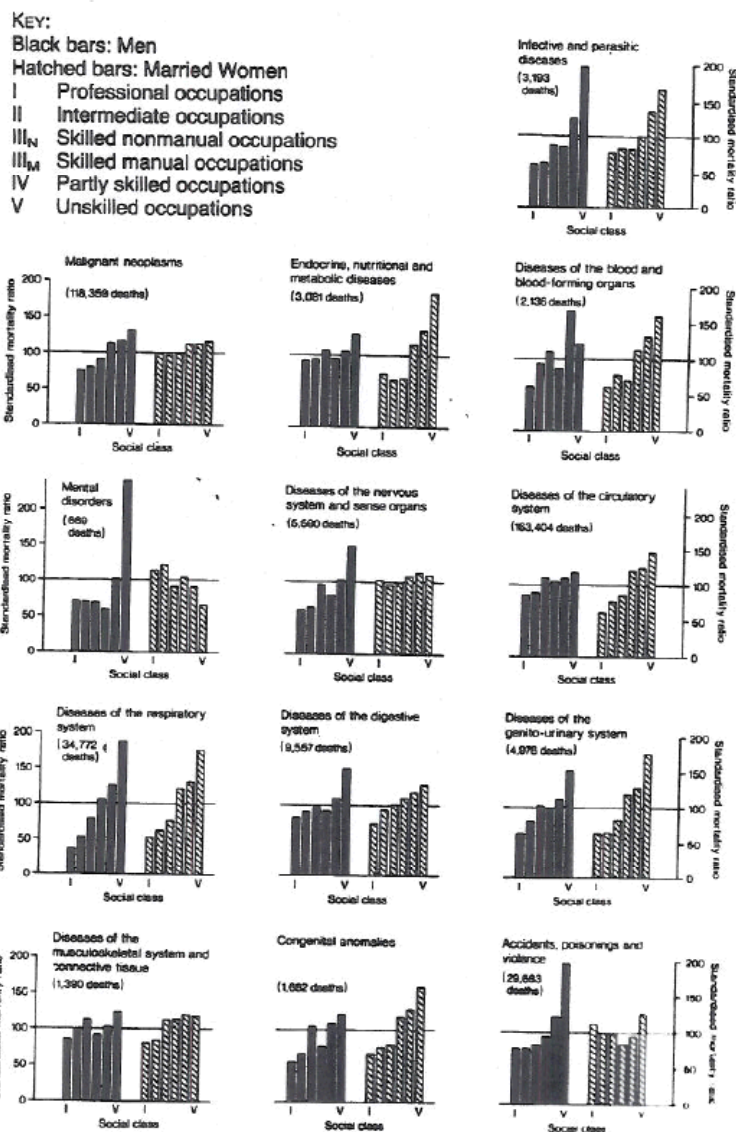
Defining socioeconomic status

- A composite of
 - Economic status (income)
 - Social status (education)
 - Work status (occupation)
- Tend to overlap, with relationship among them varying over time and among cultures

Defining social class

- Max Weber's formulation
 - Shared economic interest
 - Prestige
 - Power
- Also overlap, but generally now:
 - Income most important
 - Occupations with autonomy and security
 - Education variable

Fig. 1. Mortality by Social Class and Cause of Death: Standardized Mortality Rates for Men and Married Women (by Husband's Occupation) Aged 15-64



SOURCE: U.K., Office of Population Censuses and Surveys, *Occupational Mortality, 1970-1972* (London: Her Majesty's Stationery Office, 1978), 41

Sample occupational hierarchy (UK)

- I. Professionals (executives, lawyer, doctor)
- II. Managerial, sales managers, teachers
- III. Non-manual skilled (clerks); manual skilled
- IV. Partly skilled (bus drivers, postmen)
- V. Unskilled (porters, ticket collectors, general laborers)

Hierarchies of social class

- Vary over time and culture
 - Traditional societies highest class often not wealthy and charged with correcting maldistribution of “goods”
 - This is “traditional” role of educated, professionals, physicians, etc. who had high class
 - Even nobles have theoretical duty to public good

Hierarchies of social class

- Increasingly based on income
 - Income respected
 - Poverty seen as moral or other lack
 - Political system “vulnerable” to financial influence
- But social class can work similarly to culture
 - Self-consciousness and self-definition

“Exploitation” of class consciousness

- (Thomas Frank): alliance of traditional business Republicans and “Reagan Democrats”
 - Alliance of wealthy business owners and working class
 - Built on commonality of “family values” and rejection of intellectual pretence
 - Workers willing to sacrifice in the name of class solidarity

How might SES relate to health

- Increased physical stressors among the poor:
 - Living and working conditions that pose more physical risks, offer less shelter from adverse environmental conditions, from infectious diseases
- Increased psychological stresses
 - Jobs that may be less psychologically rewarding, offer less individual control or satisfaction
 - Increased emotional stressors related to financial worry, job loss, exposure to community violence
 - Increased stressors may be one cause of increased use of harmful substances (alcohol, smoking)
 - Stressors increase “allostatic load” – chronically elevated steroid levels, etc.

How might SES relate to health

- Decreased access to coping resources
- Decreased access to preventive and treatment services
- Dangerous neighborhoods that make social interaction less possible, increase isolation
 - poor single mothers are more isolated, have fewer social contacts
- Decreased tenure at a given place of living – less investment in “place” and neighborhood

How might SES relate to health

- Often but not always associated with decreased access to educational resources secondary to community context or need to work
- Decreased access to healthful foods
 - Highly processed, poorly nutritious foods tend to be cheaper or more promoted (cheap ingredients, long shelf life, higher profit margin)
 - Poor often live at greatest distance from lower cost, more comprehensive sources of food
 - Less variety in diet, more vulnerable to nutrient deficiencies

How might SES relate to health

- Intergenerational transmission via parenting
 - Poor parents more likely to be depressed, psychologically unavailable
 - Poor parents more likely to use authoritarian or aversive parenting strategies
 - Social isolation may limit access to other adults who are also involved in “parenting” (Takes a village...)

Relative poverty as a risk factor

- Where do people stand relative to others
- What is the level of maldistribution of income
- Predicts that poor people will do worse in a society with a greater maldistribution of income as compared to one that is more egalitarian.

Relative poverty

- Among European countries, the percentage of overall wealth owned by the poorest 70% of the population is positively correlated with health status.

Relative poverty mechanism

- Mechanism of “action” based on theory that all material resources are imbued with meaning – car has practical and symbolic uses; phones are practical but also increase sense of connectedness and security – and that not being able to meet societal standards is a cause of stress.
- “Money can’t buy everything, still I’d rather be rich.”

Combination of relative and absolute poverty

- reduced access to life opportunities and material resources
- decreased social cohesion, increased exclusion and social conflict that lead to decreased availability of community resources (both material and psychosocial)
- promotion of hopelessness, frustration, loss of respect

Social support – instrumental and emotional

- Provision of information
 - Better decision-making, increased sense of control, open avenues to positive coping
- Practical assistance
 - Financial, transportation, other assistance that make coping possible or relieve other stresses
- Emotional empathy and comfort
 - Enhance confidence and self-esteem, reduce isolation, reduce negative affect

How might social support influence health outcomes?

- Facilitates participation in healing and health promoting activities
- Reduces levels of stress and thus stress internal stress response
- Reduces perceived disparities
 - Two-way street – provides opportunity to give to others (promotes mastery)

Social support and parenting (Ceballo)

- Mothers with higher levels of social support are:
 - more nurturing and consistent in their parenting
 - less likely to use punitive strategies (scold, ridicule)
 - seem more tolerant of children and sensitive to their needs.
- Though poverty may be able to reduce the impact of social support, the opposite is also true.

Studies of social support and health

- Many studies suggest broad relationship between social support and health status
 - Most famous: Alameda County study, published 1979: participation in social networks (proxy for social support and other things) was related to decreased all-cause mortality
 - Woolcock: controlling for BP, age, exercise, and other risk factors, chance of adult dying in the coming year is cut by 50% if join one group and by 75% if join two.

Social capital

- Poverty (absolute or relative) is to some extent a proxy for membership in helpful social networks/receipt of social support
- Social support can be measured at a population level
- “Capital” as a resource that can be called upon when needed

Measuring social capital

- As membership in “networks”
 - Formal or informal
 - Can be specific to role: each person can be member of more than one; networks may overlap or not (example: workplace)
 - Does not require emotional closeness, familiarity, or even frequent contact
 - Common thread is feeling of reciprocity

Reciprocity and collective efficacy

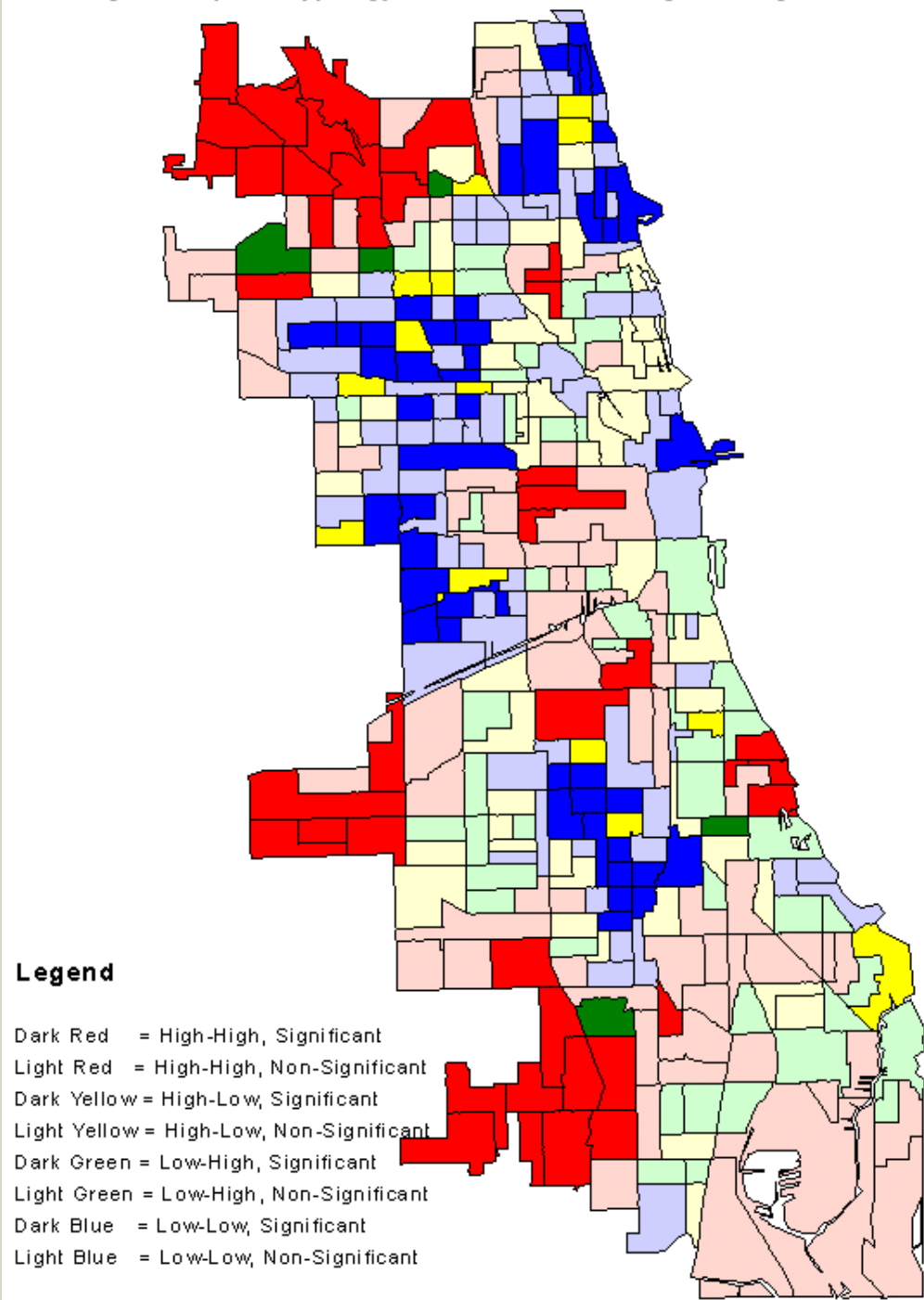
- Increased reciprocity with those you are acquainted with
- Increased trust in those you don't know
- Increased willingness to contribute to common causes
 - See others as deserving
 - Feel that others will look out for you, too

Spatial clustering of collective efficacy

- Maps can help define areas of risk
- Clustering demonstrates how neighborhoods influence each other
 - Dark colors indicate statistically significant clusters
 - High areas tend to cluster with high and vice versa
 - Significant boundary areas might be places for interventions

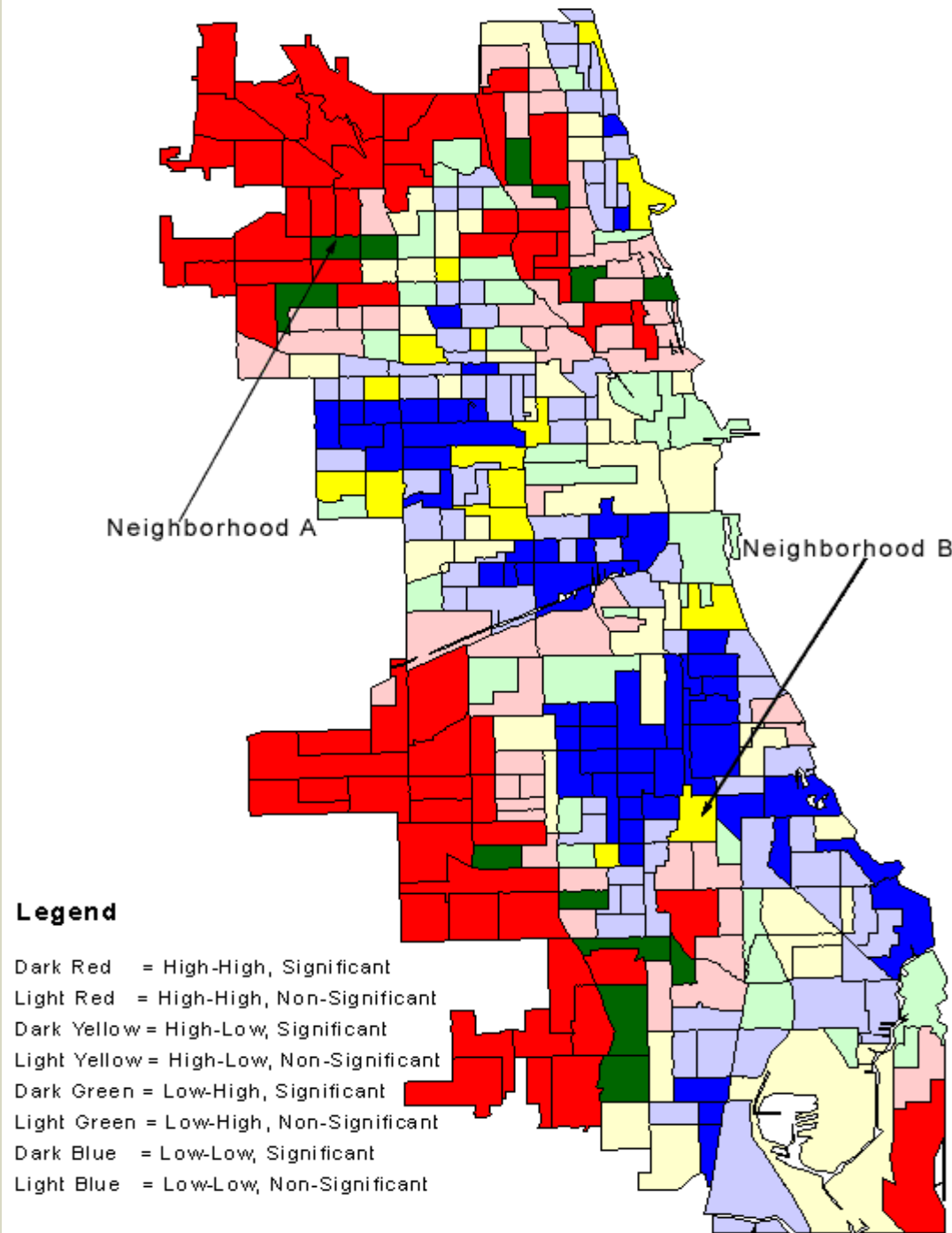
Map 1: Intergenerational closure

Figure 1. Spatial Typology of Adult-Child Exchange: Chicago, 1995



Map 2: Social control

Figure 2. Spatial Typology of Child-Centered Social Control: Chicago, 1995



Social capital and health-related issues

- At ecologic level:
 - More spending on education
 - More philanthropy
 - Better child and adult health status
- Cause or effect?
 - Less crime
 - More income equality

FIGURE 7.2

Kids are better off in high social capital states

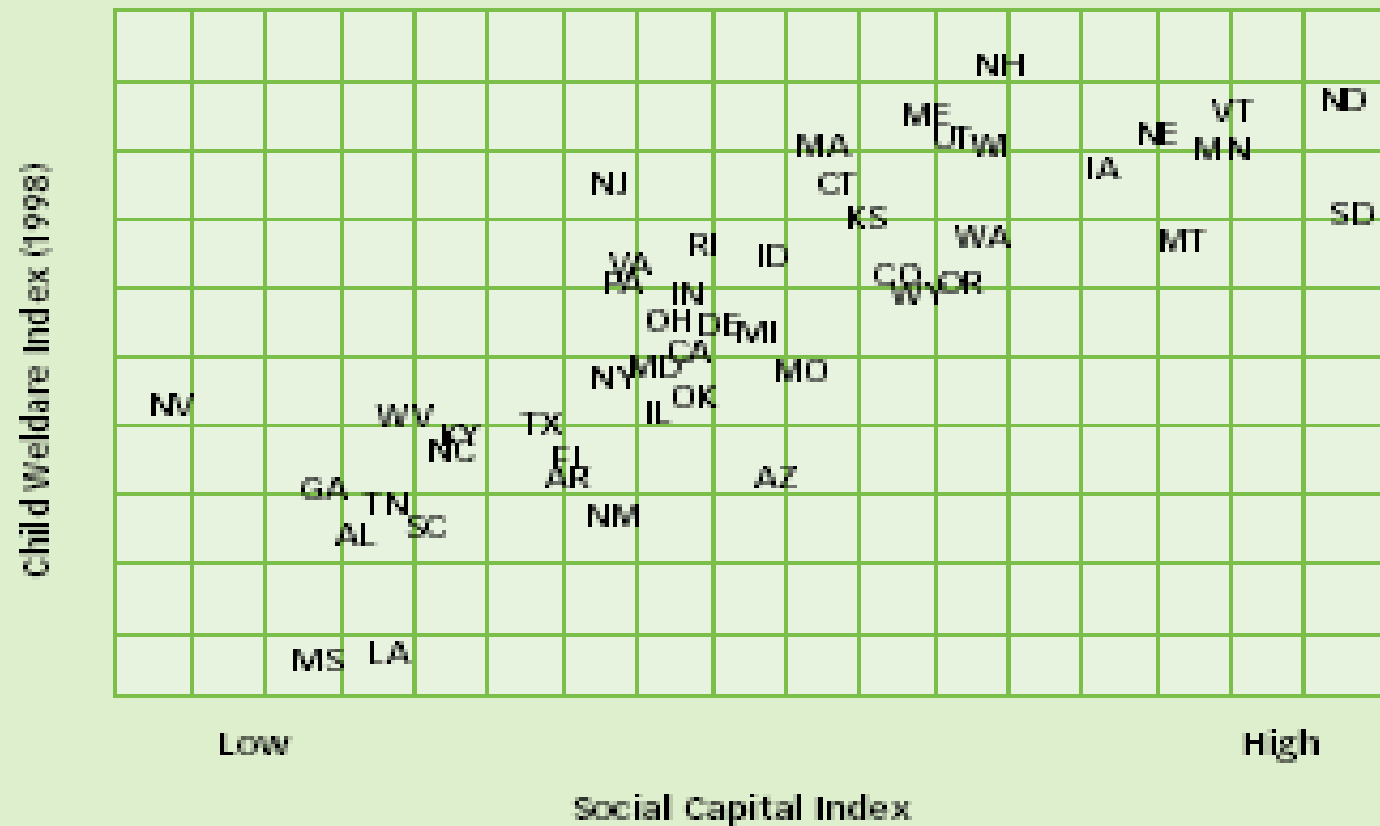


FIGURE 7.4

Violent crime is rarer in high social capital states

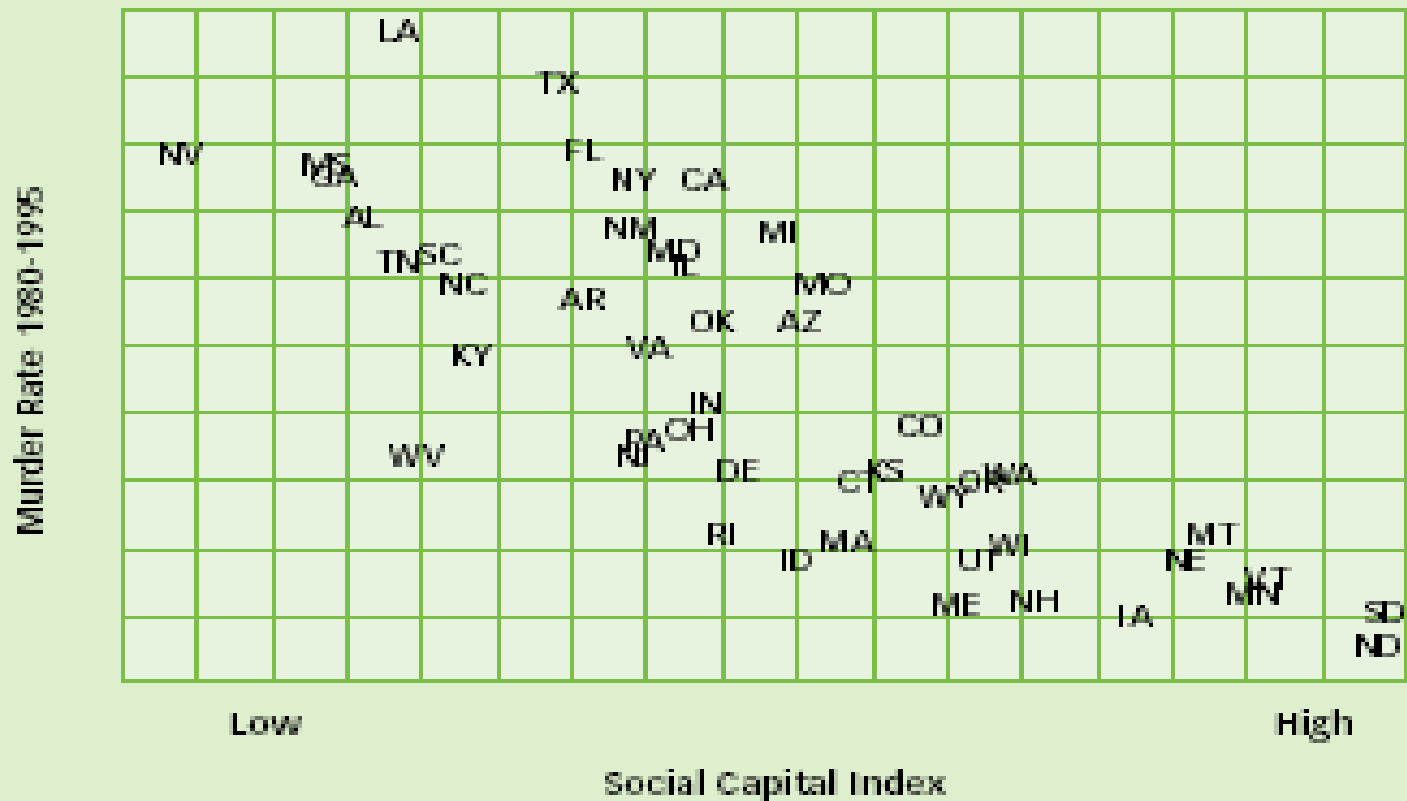
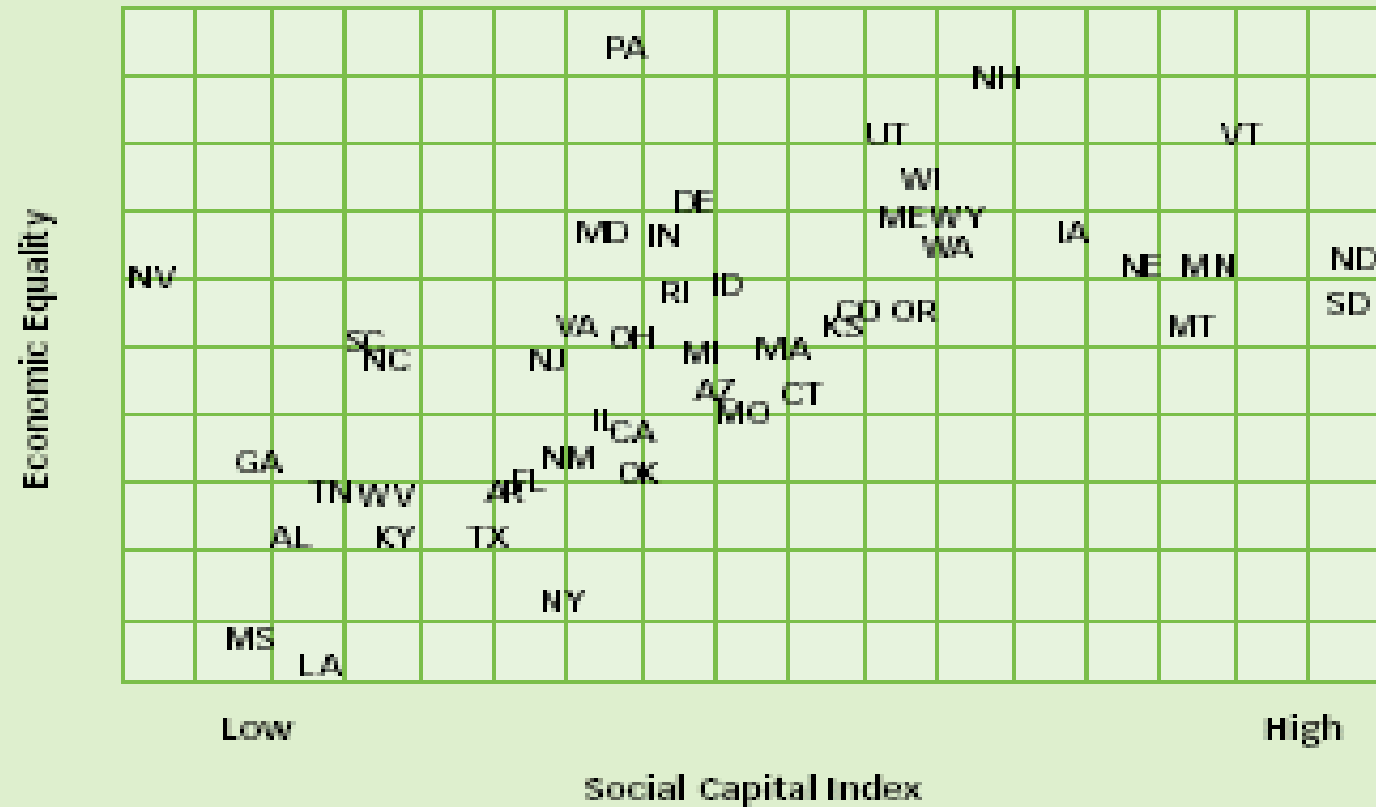


FIGURE 7.9

Social capital and economic equality go together

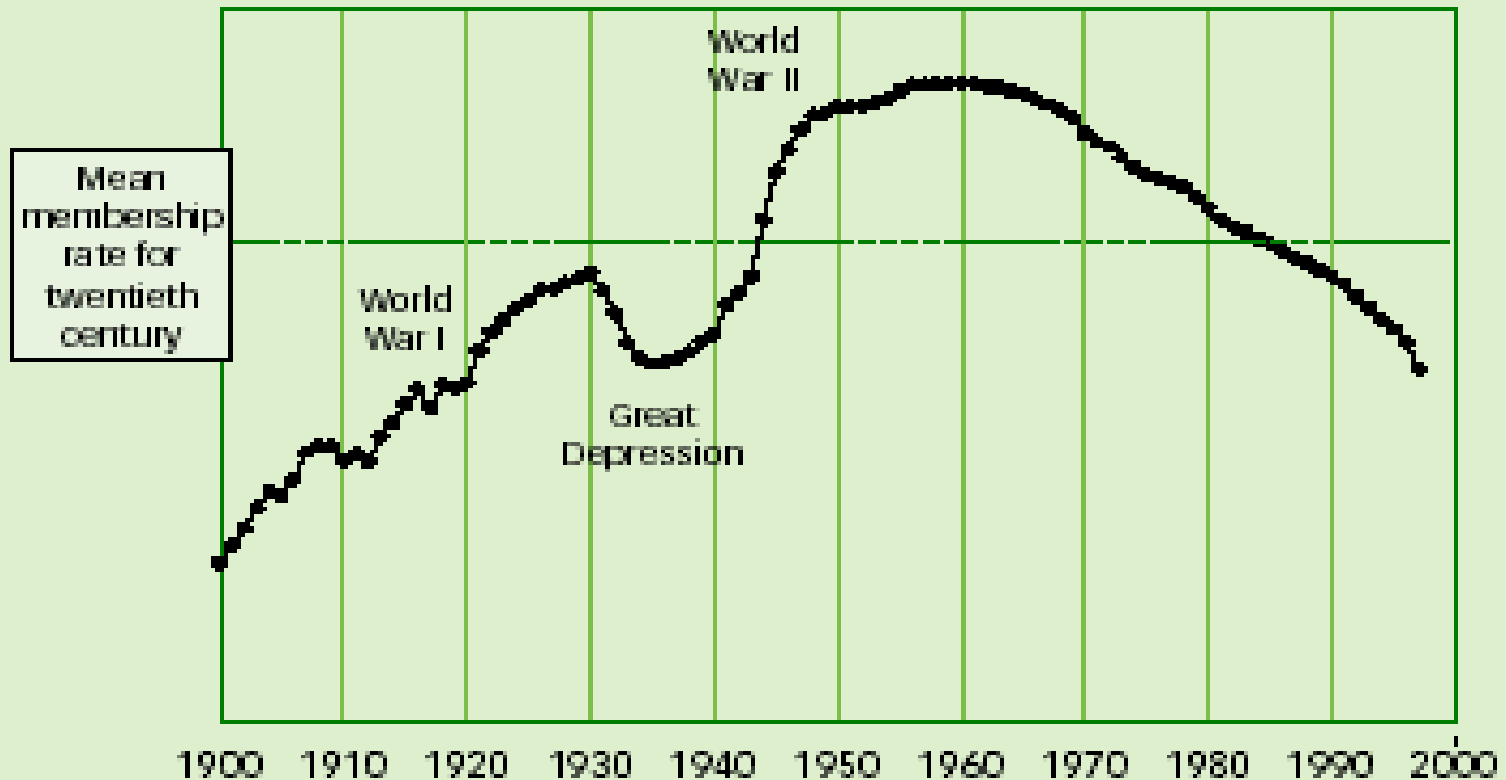


Trends in membership in social networks

- In US, major decrease in membership in community groups since 1960's
- Proportion of adults who are members fell by 50% (16 to 8%) from '70's to '90's
- See similar trend in charitable giving

FIGURE 1

**Average membership rate in 32 national
chapter-based voluntary associations, 1900-1997**



Why charity may be failing?

- Scandals in charitable organizations
 - Red Cross, United Way, etc.
 - Lack of transparency
- Failures of NGO's/non-profits to collect relevant outcome data
 - Forces focus on “overhead” which is counterproductive
- “Brain drain”
 - Debt of graduating students

Why charity may be failing?

- Longer working hours
- Free market philosophies
- Racism
- Misconceptions about role of government
- Reductions in savings/disposable income

Possible solutions

- Transparency
- Investment in management in NGO's
 - “It takes money to spend money wisely”
- Investment in outcome measures
 - Ideally standardized across donors

Médecins sans frontières

- Projects are outlined in detail before they are launched and evaluated throughout their operation. Clearly defined quantitative, as well as qualitative, objectives are revised if necessary. The duration of our intervention is determined solely by those needs that are defined and reevaluated over the course of the mission. Projects and needs are evaluated on an ongoing basis through a standardized data collection system, plus ad-hoc epidemiological surveys.

Médecins sans frontières

- This is also why MSF directly manages all aspects of our field programs and does not delegate management responsibility to third parties.
- MSF-USA's Board of Directors exercises fiduciary control over the use of all funds collected in the United States . It allocates grants to MSF field programs based on detailed narrative and financial proposals, and requires narrative and financial reports upon completion of the grants.
- For transparency to our donors worldwide, MSF combines the accounts of all of our offices internationally. The result is a thorough and transparent picture of the full range of our activities.

Summing up

- Poverty associated with poor health status
 - Psychosocial as well as physical/environmental explanations
- Inequality is noxious as well as simple poverty
- Social support at the individual and community levels may be part of the link