

(a) The income variable is split into different groups from below \$9,000 to above \$25,000. Each level of income has a row with the mortality rates for the year 1986. There are two large columns, men and women, and each gender column is split into two more columns, White and African American. Going to the lowest level of income (below \$9,000) the table shows that white men averaged 16 deaths per 1000, while African American men averaged 19.5 deaths per 1000. For women, white women had 6.5 deaths per 1000, and African American women were at 7.6 deaths per 1000. By looking specifically at rows, you can see that there is a gender gap and a race gap among mortality rates. African Americans experience higher mortality rates at all income levels. When examining columns, the mortality rate for everyone regardless of race and gender decreases as income increases.

The disparities in the table are due to the social determinants of health. The social determinants of health are how society and social position contributes to the differential outcomes and inequities of health. Inequity of health in a society refers to unfair differences in allocation of healthcare resources. To explain this trend there are four mechanisms from Diderichsen, Evans, and Whitehead's *Challenging Inequities in Health: From Ethics to Action*.

The first mechanism is social stratification. Social stratification has two levels, the first level is social context. This refers to the material organization of a society and the culture of the society. The second level is how a group of people is positioned within the social context. From the table, classes can be defined by the level of income, race, and gender. Based on this, there will be differences in health outcomes, which is illustrated by the mortality rate. The social position based on income will affect how they operate within the social context and this leads to different health outcomes. Race and gender can also influence societal class if the culture marginalizes those groups, often leading to pay gaps and policy bias.

The second mechanism is differential exposure. This mechanism ties into the first mechanism because different classes in society have different levels of exposure to stressors and environmental factors. By stressors, I am referring to psychosocial stressors, this means stress within the body that is caused by social factors. The stress could manifest as hypertension or plaque buildup in arteries. This stress is caused by lack of control over work and lifestyle, a common problem among lower class groups, according to the table that would be low income individuals and African Americans. Moving onto environmental factors, in the United States, it is usually the case that lower income groups are exposed to more pollutants from poor housing quality and proximity to factories, this can cause health complications and development issues in children. Closely related is the third mechanism, vulnerability. Being exposed to stressors and environmental pollutants increases the negative effects of other detrimental health factors. For example, someone with a compromised immune system due to stress from work will have worse symptoms than a higher class person who had the same diagnosis. The difference is the high class person has less vulnerability because they have less workplace stress.

The final mechanism is the difference in social consequences of ill health. People of lower income have a harder time accounting for the cost of illness. This is because poorer people might not have the best insurance plan or any plan and have a harder time paying out of pocket. Payments might spill over to family and prevent a family from building wealth. Covering the cost of ill health can cause even more stress and decrease the possibility for families to better their financial position.

(b) For income, effective policy measures would provide more equity among social stratifications. When referring to equity, I am referring to need based financing. The economic disparities that arise from societal position are not fair, the needs of lower classes are usually

higher than wealthier classes. With that said, the policy measure would be aimed at eliminating the financial determinants of health and would do so equitably. An example of this could be expansion need based financial support. Determining the needs of the low income demographics and creating support that will aid with the cost of accessing healthcare and the negative externalities of ill health that affect low income classes. This would address entry point A. Entry point A is targeted at social stratification and policies at this entry point focus on eliminating the health disparities that are a product of stratification. Providing support for low income groups can help create fair opportunities for healthcare regardless of income. Entry point D is also targeted. Entry point D is targeting the unfair consequences of ill health by aiding with differentials in health outcomes. Income policies can increase the ability to access rehabilitation care and help cover the costs for low income groups.

Determinants related to income levels have another dimension, not only financial barriers to accessing healthcare, but exposure to pollutants and less education. For example, there is less education about the negative effects of smoking in poorer communities, so as the wealthy are decreasing rates of smoking the poor are not, widening the disparity. Policy measures could reduce stratifications from the determinant of income by attacking these three factors since they are related to income levels. These policies would target entry points B and C. Entry point B is targeted at reducing the exposure to pollutants, poor working conditions, and increasing education. Entry point C deals with the vulnerabilities from differential exposure as explained by mechanism three. Policies would target these entry points by providing more education and creating healthy housing and zoning laws to eliminate exposures and vulnerabilities.

Race is closely related to social position due to many factors such as systemic racism and historical oppression. From the table, even at the same income level, African Americans have higher mortality rates than whites. A policy to deal with this determinant would be eradicating institutional racism. Loan policies for housing, redlining, and the skewed criminal justice system are systems that can affect one's ability to gain income. Racist policies can be embodied as diseases such as hypertension which also lead to differential outcomes. Policies to combat systemic racism specifically would be related to entry point A. This is because these policies would be reducing the stratification of society caused by race. By bettering the social position of a race, there is less unfairness due to social position in terms of health and health outcomes.

Policy measures related to gender could be better opportunities and pay for women in the labor force. Targeting entry point A by reducing social stratification. Another policy could be education that is better fit for females, more opportunity for education, and decreasing gender based violence. A policy like education would be related to entry points B/C because education can prevent exposure to risks and decrease the chance of being exposed to other vulnerabilities.

(c) The Affordable Care Act allowed more coverage for Medicaid in participating states. This was accomplished by getting rid of the categorical eligibility criteria for Medicaid and allowing anyone within 138% of the Federal poverty level to get coverage. The ACA also provided federal subsidies for individuals getting insurance through insurance exchanges. These are two income related policy measures that target entry point D. When people have insurance, the consequence of ill health can be significantly reduced. When insurance covers the cost of medical care, the out of pocket costs will be much less, and other negative externalities such as keeping a family entrenched in poverty are avoided. The ACA also prevented denial of coverage based on pre-existing conditions. This targets entry point D as well because if someone has a pre-existing condition that they are suffering the consequences of, being able to obtain insurance when they previously would not have been able to can reduce the consequences of ill health.