Inequality of opportunity in health in old age in China and India

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Background

China and India have a large and rapidly aging population. They have also experienced growing disparities in health across social, economic, and spatial dimensions (Subramanian et al., 2006; Tang et al., 2008). In the literature, on inequality, there is a shift in focus from inequality in outcome to inequality in opportunity to achieve the outcome (Piggottaro, 2012; Roemer and Trannoy, 2016). As equalizing outcomes:

• Ignores differences in tastes and preferences of individuals for which they are responsible.
• Fails to fully appreciate the differences in the individual’s resources that are associated with the outcome (Doworkin, 1981a, 1981b).

In addition, studies indicate that the idea that disparities have their origin beyond individual control can generate public support for redistributive policies (Alexisina and Angeletos, 2005; Bénabou and Tirole, 2006).

Inequality of opportunity: Roemer’s approach

Roemer (Roemer, 1998, 2002) makes the distinction between efforts, as factors affecting outcome which are within an individual’s control, and circumstances as those beyond. He also acknowledges that individual’s efforts are associated with their circumstances. Roemer’s approach is widely used in studying inequality of opportunity in health as it captures a number of important mechanisms (Rosa Dáz, 2014).

Research Hypotheses: Main

Both countries embarked on markedly different developmental trajectories since the middle of the 20th century. The main purpose of this research is to examine the role of these different development paths on inequality of opportunity.


India: Limited implementation of redistributive policies like the Land Reform Act of 1949 as the political structure of local governments were dominated by the landed class (Besley and Burgess, 2000). Limited success of the public programs for its dependence on the private sector capacity and incentives to deliver the program needs (Mallenbaum, 1982).

Such differences are likely to affect the contribution of circumstances in total inequality.

• Hypothesis 1: The importance of circumstances will be lower in China than in India.
• Hypothesis 2: The importance of circumstances will reduce more over time in China compared to India.

Results

• The importance of circumstances has declined over time in India, while it shows similar contribution for different cohorts in China.
• The importance of effort is significantly higher among the oldest cohort in China.

Data and variables

Data: Study on Global Aging and Adult Health WAVE 1: China(2007-10), India(2007)
Sample size for 50+ population: 13567 - China: 7150 - India
Dependent variable: A health index variable: First we regress objective measures of health available in the survey like underweight/overweight, indicators for high-risk waist-to-hip ratio, hypertension, lung functioning, maximum grip strength, time taken to walk, visual acuity, a composite index of cognitive ability, age, and sex on a subjective health variable. Then use the standardized probability of “good” or better health to create a continuous index. This strategy is similar to that by Groot, 2000, and Jørgen, 2007.

Main independent variables

Circumstance variables include parental SES measured by father’s education and occupation, whether mother ever went to school and ever worked; person’s height (Bozzoli et. al., 2009; Case and Paxson, 2008) as an indicator of childhood nutritional and disease environments.

Effort variables include indicators of lifestyle choices like consumption of tobacco and alcohol. Fruits and vegetables and years of schooling.

Demographic variables include age cohorts (those born before, around the time of, or after the foundation of the People’s Republic of China (1949) and independent India (1947)) and gender.

Loricalational variables include rural/urban dummies and provinces/states.

Conclusions

• The cross-country comparison highlights the limitation of drastic policies in diluting the relation between circumstances and health among aging population in China.
• For India, the results highlights not only the need for redistributive policies acknowledging the role of circumstances, but also a need to put gender in the center of any such policies.