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ECONOMIC SHIFTS AFFECT THE WELL-BEING OF VULNERABLE POPULATIONS

In 1990, nearly half of the world's population in low- and middle-income countries lived on less than US\$1.25 a day; that proportion dropped to 14 percent in 2015.¹ Despite progress, poverty remains a major issue and is the top priority for the post-2015 sustainable development agenda. Nearly 1 billion people continue to live in extreme poverty and suffer from hunger, with women more likely to live in poverty than men.

Extreme poverty is concentrated in sub-Saharan Africa and Southern Asia and is partly a result of slow progress in employment growth and limited opportunities for work that provides income above US\$1.25 per day. A challenging global environment with volatile commodity prices, higher food and energy prices, and extreme weather events and natural disasters are also contributors.²

These factors take a toll on lives and livelihoods: Lagging economic development and economic shocks affect the health, education, and human capital of the world's most vulnerable populations.

Findings From the Research

VULNERABLE POPULATIONS REMAIN AT RISK DESPITE ECONOMIC GROWTH

India's economic growth between 1970 and 2000 is explained in part by a rise in life expectancy, a more open economy, and an increase in the proportion of the working-age population.³ Still, economic trends, such as changes in the rate of inflation, have a strong impact on low-income groups. Rising food prices starting in 2007 were associated with an increased risk of malnutrition among children in India. As food prices rise, children's food consumption tends to fall and weight declines relative to height (a condition known as wasting). Researchers observed a greater increase in wasting in low- and middle-income children than in high-income children in India.⁴

NATURAL DISASTERS TAKE A TOLL

Indonesia has suffered a series of natural disasters over the past decade. The Philippines experiences annual high-intensity typhoons and has the highest number of tropical cyclones per capita of any country in the world.⁵ These events claim lives and affect survivors for years to come.

About the Population and Poverty Research Initiative

The William and Flora Hewlett Foundation's Population and Poverty (PopPov) Research Initiative, in partnership with other funders, has supported a global group of researchers looking at how population dynamics affect economic outcomes. Research funded through the PopPov Initiative sheds light on pathways through which fertility, health, and population growth affect economic growth, providing insights and an evidence base relevant to achieving the Sustainable Development Goals (SDGs). Findings show that investing in women's health, education, and empowerment improves economic well-being for individuals and households, and contributes to economic growth.

After a 2004 tsunami, children in Aceh, Indonesia, who had lost both parents suffered both short-term and long-term consequences that varied with the age and gender of the child.⁶ With the death of both parents, adolescents (ages 15 to 17) as well as young girls (ages 9 to 14) had worse educational outcomes than those who had not lost parents or who lost only one parent. Children who lost both parents were less likely to stay enrolled in and to complete fewer years of school.

Disasters may also affect economic development in the short- and long-term. Countries may lose revenue and expenditures may immediately rise, with longer-term consequences for economic development and poverty reduction. For severe natural disasters, the impact may be localized and not well-reflected in national statistics. For example, the 2004 tsunami resulted in a small increase in poverty within Aceh at a time when poverty declined slightly in Indonesia overall.⁷

Another potential outcome of natural disasters is increased fertility in response to child mortality or spousal mortality and remarriage.⁸ A preliminary study found that a Philippine woman's likelihood of getting pregnant tripled in the five years following her exposure to a typhoon. This typhoon-related increase in pregnancy is concentrated in agricultural areas where child labor is prevalent and

people continue working in old age to support their families, suggesting that childbearing may be an economic response to disaster.⁹

A study of communities affected by the 2004 tsunami showed that women who lost one or more children were more likely to give birth between 2006 and 2009. Women without children initiated childbearing earlier.¹⁰ Early initiation of childbearing could have adverse consequences: Early childbearing has been associated with poorer health and lower educational attainment for both mothers and their children.¹¹

Decreased access to contraception offers another explanation for higher post-disaster fertility. Destruction of homes, facilities, and services may limit access to contraception, which may contribute to an increased likelihood of pregnancy after a disaster.¹²

TABLE

Results From Micro-Level Studies Assessing Health and Education Programs and Interventions

REPRODUCTIVE HEALTH

In rural areas in Indonesia, children with a mother who had better access to midwives experienced significant increases in years of education and cognitive test scores.

Women in Indonesian communities where midwives were assigned to work were more likely to receive iron tablets and to have skilled attendants at childbirth. In these communities, less-educated women were more likely than other women to increase their use of antenatal care within the first trimester of pregnancy.

A maternal health, child health, and family planning program in Matlab, Bangladesh, improved cognitive functioning and educational attainment of children living in intervention areas. Women experienced increased child spacing, lower child mortality, greater use of preventative health services, and improved health.

NUTRITION

Girls and boys ages 2 and under who receive daily supplemental feeding experienced positive health benefits as measured by height. They were one centimeter taller than those who did not receive supplemental feeding.

GENDER

A cash transfer program in the North Indian state of Haryana offers cash incentives to families that give birth to daughters and additional incentives for the daughters' education. An evaluation showed the program improved the sex ratio (living daughters to sons) as well as household investments in daughters' health and education.

Sources: Ava Gail Cas, "Early Life Public Health Intervention and Adolescent Cognition: Evidence From the Safe Motherhood Program in Indonesia," working paper (2012), accessed at <http://fds.duke.edu/db/attachment/1933>, on Oct. 14, 2015; Elizabeth Frankenberg et al., "Do Women Increase Their Use of Reproductive Health Care When it Becomes More Available? Evidence From Indonesia," *Studies in Family Planning* 40, no. 1, (2009): 27-38; Shareen Joshi and T. Paul Schultz, "Family Planning and Women and Children's Health: Long-Term Consequences of Outreach Programs in Matlab, Bangladesh," *Demography* 50, no. 1, (2013): 149-80; Monica Jain, "India's Struggle Against Malnutrition-Is the Integrated Child Development Scheme (ICDS) Program the Answer?" *World Development* 67 (2015): 72-89; and Nistha Sinha and Joanne Yoong, "Long-Term Financial Incentives and Investment in Daughters: Evidence From Conditional Cash Transfers in North India," World Bank Policy Research working paper 4860 (2009), accessed at www-wds.worldbank.org/ser/vlet/WDSContentServer/WDSP/IB/2009/03/09/000158349_20090309091453/Rendered/PDF/WPS4860.pdf, on Oct. 14, 2015.

INTERVENTIONS PROTECT VULNERABLE GROUPS

People in poverty face challenging conditions—ranging from food insecurity to natural disasters—that threaten their health and livelihoods. Programs that target the health and education needs of vulnerable populations can improve their access to services with the potential to change their social and economic condition, particularly in response to emergencies such as natural disasters. Research shows that cash transfers and programs that extend the availability of health services to poor households and communities can mitigate the effects of poverty (see Table). Some of these programs also have the potential to create longer-term effects on education and cognitive development, laying the foundation for social mobility, increased productivity, and ultimately economic growth at the national level.

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