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# THE DEMOGRAPHIC DIVIDEND: AN OPPORTUNITY FOR ETHIOPIA'S TRANSFORMATION

4.3

The number of children women want, on average, in Ethiopia.

Ethiopia's economy needs to be able to absorb the large number of people reaching working age over the next several decades—a demographic dividend hinges on vigorous job growth.

\$9,030

Ethiopia's possible gross domestic product (GDP) per capita by 2050 with the right combination of investments.

*This Early Insights brief shares highlights and insights from a report by the Ethiopian Economics Association and the Population Reference Bureau (PRB) on the demographic dividend in Ethiopia. The full report will be released in the fall of 2015.*

Recently, experts have debated how to promote a demographic dividend in sub-Saharan African countries (see Box 1). In Ethiopia, the prospect of a demographic dividend has grabbed the attention of policymakers and academics, generating discussion and research on this phenomenon.

Since 1993, Ethiopia has established proactive public policies to address population health and rapid population growth. In more recent years, these policies have included programs to reduce infant and child mortality, improve education, and increase access to family planning.

In the past two decades, Ethiopia has experienced an impressive decline in fertility, enjoyed robust economic growth, and made great strides in poverty reduction. Although the country faces challenges, Ethiopia may be on track to capture a demographic dividend.

## Ethiopia Has Started on the Pathway to a Demographic Dividend

Ethiopia has made steady progress in expanding access to education and health services. Fertility has steadily declined and gross domestic product (GDP) growth rates have been among the strongest in Africa. Despite this progress, more work is needed to ensure that Ethiopia achieves a demographic transition and also takes full advantage of this transition. With a demographic transition and accompanying investments in health, education, and job growth, Ethiopia may realize the economic boost that a demographic dividend can provide.

### BOX 1

## What is a demographic dividend?

A demographic dividend is the accelerated economic growth that may result from a quick decline in a country's mortality and fertility rates and the subsequent shift in the age structure of the population. As a country's working-age population grows in relation to the number of young dependents, a country has a window of opportunity for strong economic growth. This window of opportunity is limited in time.

**Source:** James N. Gribble and Jason Bremner, "Achieving a Demographic Dividend," *Population Bulletin* 67, no. 2 (Washington, DC: Population Reference Bureau, 2012).

## Spotlight on Education

Access to education is crucial to a demographic dividend. The knowledge, skills, and capabilities of Ethiopia's future working-age population will determine the extent to which Ethiopia can capitalize on demographic changes.

Education opens up opportunities for young people and contributes to the future development of Ethiopia. Girls' education—especially at the secondary level—often contributes to a fertility decline, since women with higher levels of education are more likely to use contraception and tend to prefer smaller families.<sup>1</sup> It also contributes to economic growth because it opens opportunities for women other than traditional roles in the home.

## RECENT SUCCESSES

- More girls are being educated. Current primary school enrollment rates show near perfect gender parity.<sup>2</sup> The gender gap in enrollment is also narrowing at the secondary education level.
- Youth literacy was 55 percent among ages 15 to 24 in 2007 and is currently estimated to be close to 70 percent.<sup>3</sup>
- Literacy of women ages 15 to 49 doubled between the 2000 and 2014 Demographic and Health Surveys.<sup>4</sup>

## ATTENTION NEEDED

- In some regions, women remain largely uneducated, and the percentage of women ages 15 to 49 that have completed primary school or above has actually decreased over the last 15 years.<sup>5</sup>
- Ethiopian men are still more likely to pursue higher education than are women. Fewer than one in three graduates at the tertiary level are female.<sup>6</sup>
- Educational opportunities are limited for both men and women in some areas of Ethiopia. For example, in 2000 less than 3 percent of men in the Amhara region had completed secondary school or above.<sup>7</sup> By 2011, only marginal improvements had been made in that region and less than 5 percent of men had completed secondary school or above.<sup>8</sup>

## Spotlight on Health

During the past decade, Ethiopia has delivered on ambitious health programs, including the 2003 Health Extension Program, improving the health and well-being of the population and contributing to a transition to lower fertility levels.<sup>9</sup> Over this period, the country has reduced infant and child mortality and promoted reproductive health and family planning.

## RECENT SUCCESSES

- Between 2000 and 2011, the under-5 mortality rate was nearly cut in half, going from 166 deaths per 1,000 births to 88 deaths per 1,000 births.<sup>10</sup>
- Between 1995 and 2000, the United Nations Population Division estimated Ethiopian life expectancy at 51 years for both sexes combined. This figure increased to an estimated 63 years for both sexes combined from 2010 to 2015.<sup>11</sup>

## ATTENTION NEEDED

- Infant and child mortality remains high in certain regions. In Benishangul-Gumuz region, the under-5 mortality rate is 169 deaths per 1,000 live births.<sup>12</sup>
- Ethiopia's maternal mortality ratio has improved at a much slower rate, compared to the sharp decline in under-5

mortality. In 2000, the Ethiopian Demographic and Health Survey (EDHS) estimated 871 maternal deaths per 100,000 live births, and in the 2011 EDHS, this figure declined to 676 maternal deaths per 100,000 live births.<sup>13</sup>

## Spotlight on Fertility Transition

The economic growth of four countries in East Asia—Hong Kong, Singapore, South Korea, and Taiwan—in the 1980s and 1990s underscored the critical role that a rapid fertility decline and changes in population age structure can play in producing opportunities for economic growth. After decades of high fertility rates, Ethiopia's rapid decrease in fertility started in the 1990s, beginning the last stage of a demographic transition that, if it continues, may open the window of opportunity for a demographic dividend.

Major factors contributing to the fertility decline include strong expansion of health services, including extension of modern family planning to rural areas; reductions in infant and child mortality; increased use of contraceptives; reductions in child marriage; and rapid improvements in education levels for women.

## RECENT SUCCESSES

- Between 2000 and 2014, the total fertility rate (TFR) of Ethiopia dropped from an estimated 5.9 children per woman to 4.1 children per woman.<sup>14</sup>
- The decrease has been equally rapid in urban and rural areas, with each area experiencing a decline in fertility of about one-third. In 2014 the TFR in urban areas was one-half the TFR in rural areas.<sup>15</sup>
- Between 2000 and 2014, the contraceptive prevalence rate, defined as the percent of married women using a modern contraceptive method, has increased more than sixfold to 40 percent, an average increase of nearly 2.5 percentage points per year.<sup>16</sup>

## ATTENTION NEEDED

- Significant regional differences exist in Ethiopian fertility levels. According to the 2014 Mini EDHS, the regions of Affar, Benishangul-Gumuz, Gambela, and Somali still have TFRs that are higher than 5 children per women.<sup>17</sup>
- Desired family size in Ethiopia remains high. In the 2011 EDHS, Ethiopian women reported they desired a family size of 4.3 children on average, while men preferred 4.8 children on average. Between 2000 and 2011, women's ideal family size declined by one child, from 5.3 children in 2000 to 4.3 children in 2011.<sup>18</sup>

As a result of changes in mortality and fertility, the age structure of the Ethiopian population has begun to shift from a high proportion of young people in the population to one with a relatively higher share of working-age people.

However, Ethiopia's total dependency ratio is still high, at 86 dependents per 100 working-age people.<sup>19</sup> The total dependency ratio relates the number of children (ages 0 to 14) and older persons (65 years or older) to the working-age population (ages 15 to 64). Experts estimate that the total dependency ratio must reach about 50 dependents per 100 working-age adults to allow for a potential demographic dividend.<sup>20</sup> To reach this dependency ratio, fertility would need to decline in Ethiopia to about 2.5 children per woman. The country will reach this fertility level between 2030 and 2035, if Ethiopia continues its ongoing rapid fertility decline.<sup>21</sup>

## Spotlight on Economic Performance

To harness the benefits of a demographic dividend, the Ethiopian economy needs to be able to absorb the large number of workers who will become working age over the next several decades. The goals of the Ministry of Finance and Economic Development (MoFED) Growth and Transformation Plan include fast-paced economic growth, industrialization, and extensive infrastructure development.<sup>22</sup> However, in many ways Ethiopia is still transitioning from a subsistence-agricultural economy to one that is knowledge-based. To reap a demographic dividend, the Ethiopian economy should be driven by the strength of an educated population, connected to the global marketplace, and characterized by diversity, flexibility, and the ability to withstand shocks.

### RECENT SUCCESSES

- The official figures from MoFED show that the economy, measured by GDP, has been expanding at an average rate of 10.5 percent per year for the last decade.<sup>23</sup> With annual population growth of almost 3 percent, this rate translates into an average per capita GDP growth rate of almost 8 percent.

- Ethiopia has been one of the fastest growing economies in Africa for the past ten years, according to figures from the African Development Bank. Similarly, Ethiopia is ranked as one of the top five fastest growing economies in the world.<sup>24</sup>

### ATTENTION NEEDED

- One of Ethiopia's challenges in the coming years will be to continue on its current path of strong economic growth.
- Most of Ethiopia's growth has been driven by the public sector. A recent World Bank report showed that Ethiopia ranks the sixth lowest in the world in private investment rates.<sup>25</sup>

Capturing a demographic dividend in Ethiopia will hinge on conducive economic policy and vigorous job growth. Figure 1 outlines the goals and outcomes of Ethiopia's recent economic policy frameworks. As the economy has changed, rates of poverty and inequality have also shifted.

## Spotlight on the Job Market

As Ethiopia's age structure changes and the working-age population grows relative to the population of young dependents, productive employment opportunities need to be available for those in the workforce. The expansion of rural education has, among other factors, had an impact on the rural-urban demographic balance: Once rural youth are educated, they seek livelihood alternatives to farming and often migrate to urban centers where broader employment options may be available.

FIGURE 1

Recent Economic Policy Frameworks Have Yielded Results.

YEAR	NAME	DESCRIPTION	SELECT RESULTS
2005	Plan for Accelerated and Sustained Development to End Poverty (PASDEP)	Included investment in urban centers, efforts to curb youth unemployment, and efforts to ensure smooth rural-urban migration.	Service sector overtook agriculture as the largest contributor to GDP. Relative growth in the industrial sector, particularly manufacturing, was stagnant.
2010	Growth and Transformation Plan (GTP)	Included a focus on the industrial sector, particularly manufacturing, heavy public sector investment in infrastructure, and public savings schemes.	Service sector remained strong. The share of industrial sector to total growth increased to 25 percent. Manufacturing and construction subsectors grew. Strong improvement in gross domestic savings, from almost 6 percent of total GDP in the last year of PASDEP (2009/2010) to almost 23 percent in 2013/2014.

Source: Ministry of Finance and Economic Development (MoFED), Ethiopia, *Ethiopia: Building on Progress—A Plan for Accelerated and Sustained Development to End Poverty (PASDEP) (2005/06-2009/10)* (Addis Ababa: MoFED, 2006); and MoFED, *Growth and Transformation Plan 2010/11-2014/15* (Addis Ababa: MoFED, 2010).

## RECENT SUCCESSES

- Unemployment in Ethiopia is declining. The national unemployment rate fell from 8 percent in 1999 to 5 percent in 2013.<sup>26</sup>
- The Ethiopian government created more than 1.3 million jobs in 2013/2014, through strategies included in the Growth and Transformation Plan such as investing in micro- and small-scale enterprises.<sup>27</sup>

## ATTENTION NEEDED

- Despite moderate progress, unemployment continues to be a challenge in Ethiopia, particularly in urban areas, where unemployment is almost 17 percent and more than twice as high for urban women compared to urban men.<sup>28</sup>
- The current rate of rural unemployment is 2 percent.<sup>29</sup> However, unemployment is not really an option in rural Ethiopia where family members may be unpaid agricultural workers. There is increasing rural underemployment as family members work on smaller and increasingly fragmented plots of land with lower productivity.<sup>30</sup>
- A focus on the quality and diversity of the labor pool is needed. Jobs should be available at a range of professional levels and talent and educational excellence rewarded through higher wages for targeted sectors.

## Combined Investments in Economy, Education, and Family Planning Could Lead to Vigorous Growth

DemDiv, a simulation model developed by the Health Policy Project, provides an opportunity to measure specific results that could be part of a demographic dividend. The model projects potential socioeconomic gains based on different investment and policy scenarios. This model was applied to the Ethiopian context to consider Ethiopia's fertility, education, and economic trends and to project future GDP per capita based on three different scenarios.<sup>31</sup>

**Baseline Scenario:** In this scenario, Ethiopia makes slow progress in attaining education, economic, and family planning goals. In particular, increases in the use of family planning are slower than current rates.

**Economy Only Scenario:** This scenario emphasizes investments made to achieve a flexible labor market, improvements in technology, government institutions that facilitate movement of goods and labor, and access to credit. In this scenario, family planning use increases slowly, identical to assumptions in the baseline scenario, and educational attainment remains constant.

## Economy Plus Family Planning and Education Scenario:

In addition to the economic investments assumed in the Economy Only Scenario, this scenario includes intense investment in family planning and education, raising contraceptive prevalence rates to nearly 69 percent and female educational attainment to an average of 11.7 years by 2050. In this scenario, GDP per capita jumps to \$9,030 by 2050 (see Figure 2, page 5).

The DemDiv model results show that an investment strategy combining strong economic policies, family planning, and education can help Ethiopia reap a demographic dividend with:

- GDP per capita that could increase more than 18 times by 2050.
- Significant reductions in the gap between the number of jobs and the number of working-age people.

## Policy Implications

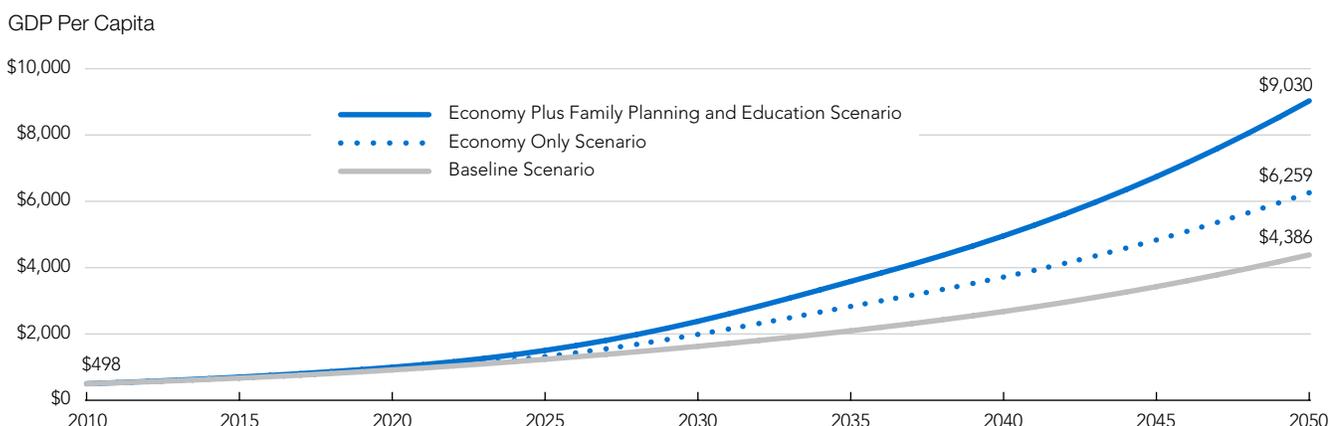
A demographic dividend in Ethiopia would boost the long-term economic and social development of the country. To experience such a dividend, the strong decline in fertility must continue, paired with strategic investments in health and education to develop the country's human capital. A determining factor in whether Ethiopia will be able to fully benefit from its efforts to reduce mortality and fertility will be ensuring that economic opportunities are available for the growing working-age population. A demographic dividend hinges on vigorous job growth.

Ethiopia should continue to implement policy frameworks that prioritize health and education.

- Fertility can be lowered further if Ethiopia prioritizes expanding the available contraceptive method choices and improving the quality of services, and if the country strengthens health systems governance, including monitoring and evaluation.
- Because many Ethiopians still desire large families, more demand for limiting the number of births is needed. One strategy for increasing demand for family planning to limit births is secondary education for girls.
- Although education rates in Ethiopia have improved overall and literacy has been on the rise, room remains for significant improvements in both educational attainment levels and the quality of education. A strong education sector with high-quality schooling for Ethiopia's youth would also develop the human capital needed to catalyze growth. Ethiopia's youth should have the opportunity to gain the specific knowledge and skills that will increase their ability to be successful in the job market.

**FIGURE 2**

**Strong Combined Investments Could Result in Huge Gains.**



Source: Futures Group, forthcoming publication, used with permission from Scott Moreland.

- Expanded secondary and tertiary education for men and women will increase the proportion of skilled workers in the job market—providing young people more opportunity and broadening sources of economic growth.

Economic policies that promote growth will provide the opportunity to capitalize on the demographic dividend.

- Policies that provide incentives to invest and save and that encourage trade, and a flexible strategy for producing a well-trained work force, will yield a stronger economy with greater employment and earning opportunities.
- Investments in basic infrastructure such as roads, transportation, and communication systems will create a supportive environment for Ethiopia to capitalize on its future demographic changes.

Another policy challenge for MoFED to consider is the quality of growth. Sustainable growth is based on knowledge and skills; Ethiopia should not rely on primary resource extraction for growth, but should develop industries that can add value to these resources, which also should be sustainably managed for the benefit of future generations.

- In the years to come, a major challenge for the Government of Ethiopia will be to balance public sector-led growth with private sector-led growth. Increasing private sector participation in productive, labor-intensive sectors, such as the manufacturing industry and commercial agriculture, can help create the jobs needed to employ the large number of youth entering the workforce.
- To foster a vibrant private sector, the Government of Ethiopia can promote public-private joint ventures, create fairer competition policies, and reform service delivery.

Ethiopia's current efforts combined with these changes will enable the nation to take advantage of the benefits of a demographic dividend.

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