

Accelerating fertility decline in Zambia

Opening the window of opportunity for the demographic dividend

May 2015



Zambia's fertility has declined slowly in the context of steady decline in child mortality over the past three decades. Consequently, 45% of the population is under 15 years of age, which has resulted in a high child dependency burden¹. The population increased from about 3.5 to 13 million between 1963 and 2010, was estimated at 15 million in 2014, and it is projected to reach about 27 million in 2035 and 40 million by 2050^{2,3}. Due to the youthful age structure, Zambia's population is guaranteed to continue growing for many decades after fertility declines to the replacement level (2.1 births per woman). This is due to the high concentration of young people who are yet to enter their child-bearing ages. For example if Zambia attains its replacement fertility level by 2020, its population will continue to grow and stabilise at around 29 million in 2100⁴. If replacement level fertility is attained by 2060, however, the population will stabilise at 56 million around 2120.

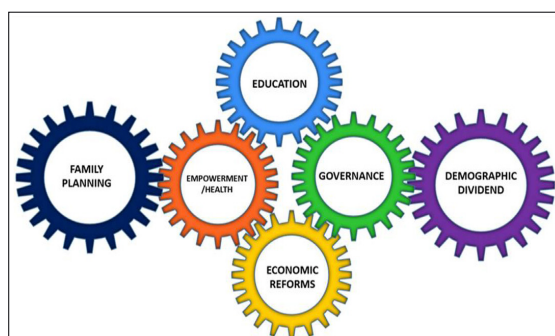
As noted in Zambia's Vision 2030 and the 2007 National Population Policy, the country's high child dependency burden (0.91 dependents for every working-age person) is one

of the main challenges to attainment of sustainable socio-economic development. Nevertheless, the youthful population can offer a unique opportunity for accelerated economic growth if fertility declines rapidly, resulting in an age structure with more people in the working-ages relative to dependent children. This would create an opportunity for the country to experience a sustained period of rapid economic growth, referred to as the *demographic dividend*.

The demographic dividend is the economic benefit that arises from a significant increase in the ratio of working-age adults relative to young dependents that results from rapid fertility decline if this change is accompanied by sustained investments in education, skills development, health, job creation and improved governance. (Figure 1).

This policy brief highlights policy and programme options that Zambia can adopt in order to accelerate fertility decline and open a window of opportunity to harnessing the demographic dividend.

Figure 1: Five policy wheels for creating and earning the Demographic Dividend



All five policy wheels are interrelated; they reinforce each other and should be implemented concurrently to drive the country towards the economic prosperity that can accrue from the demographic dividend.

Source: Adapted from African Union Commission (2013)⁵



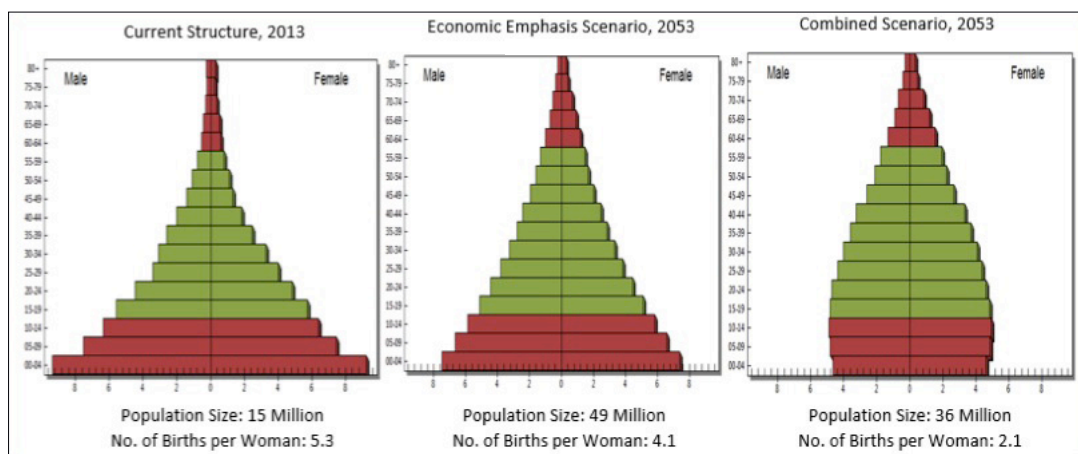
Rapid fertility decline can help Zambia change its youthful age structure to one with more working-age people relative to dependants

For Zambia to embark on the demographic dividend pathway, the starting point is to facilitate accelerated fertility decline. Evidence from countries that have experienced such fertility decline shows that sustained investments in family planning (FP), child survival and female education have been the most critical determinants of fertility decline⁵.

The impact of fertility decline on Zambia's age structure is illustrated by the modelling carried out to assess the potential demographic dividend the country can harness over the next four decades using the *DemDiv* modelling tool^{6,7}. If Zambia follows the

Economic Emphasis Policy Scenario that maximises its economic investments and productive efficiency to the levels reached by the benchmark countries including the Asian Tigers, but makes little investment in education, family planning and other public health issues, its age structure will not be that different from the current one (*Figure 2*). Under this scenario, per capita GDP would increase from USD 1,839 in 2013 to USD 19,546 by 2053. However, if Zambia follows the Combined Scenario where it simultaneously prioritises economic reforms, family planning, education, health, and governance, its fertility would decline to 2 births per woman, its age structure will have low child dependency burden and have more workers, and its economy will grow impeccably, reaching a per capita GDP of USD 26,940 by 2053. This would translate to a demographic dividend of \$7,393.

Figure 2: Population pyramid and key features, Zambia



Source: Modelling Results

Priority issues to address to accelerate fertility decline in Zambia

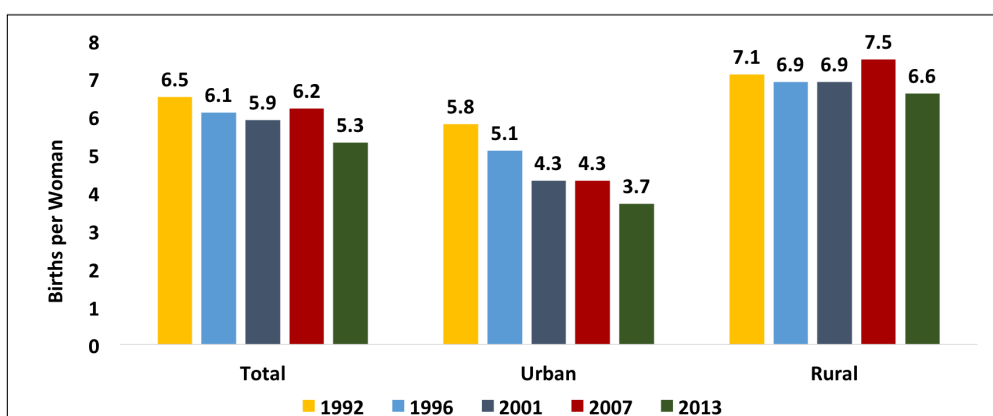
Fertility rate still remains high despite relatively high use of modern contraceptives

Family planning is one of the most successful development interventions, with wide-ranging benefits to maternal and child health outcomes, empowerment of women, economic growth, and environmental preservation^{8,9,10,11}. For example, it is estimated that contraceptive use has helped avert maternal deaths in Zambia by about 30.2 per cent and that if Zambia addressed all its unmet need for fam-

ily planning, maternal deaths would decline further by about 29%¹².

In Zambia, about 45% of married women and 38% of sexually active women were using modern family planning methods in 2013¹³. However, the total fertility rate marginally declined from 6.5 births per woman in 1992 to 5.3 in 2013. Fertility rates are particularly high in rural areas where they have hardly declined over the last two decades, and women have 3 children more than their urban counterparts (*Figure 3*).

Figure 3: Trends in total fertility rate, Zambia, 1992-2013



Source: : Source: Central Statistics Office et al. (2014)¹³

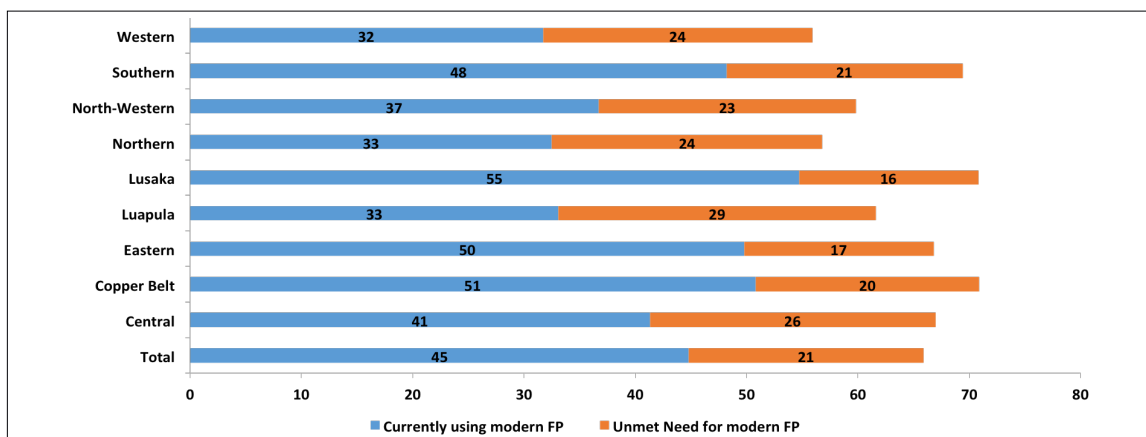
Zambian women have more children than they would like to have

Zambian women have about one child more than they would like to have. This gap is more pronounced among the poor and the rural residents. According to 2013/2014 data, poor women had one child more than they desire compared to rich women who had 0.4 of a child more¹³.

Over a fifth of Zambian women have unmet need for family planning

A large number of women are still not able to access or use family planning, and are considered to have unmet need for family planning. In 2013, more than two fifths of married women were using family planning while about one fifth had unmet need for family planning¹³. In all provinces except Copperbelt, Eastern, Lusaka and Southern, the unmet need is higher than the national figure, with provinces such as Luapula having one third of the married women with unmet need for family planning (Figure 4). This unmet need partly explains the high level of unintended pregnancies and births in Zambia.

Figure 4: Married women using modern FP and those with unmet need for FP (%), Zambia, 2013-2014



Source: Central Statistics Office et al. (2015)¹³

Many Zambian women are not using contraceptives that match their fertility preferences

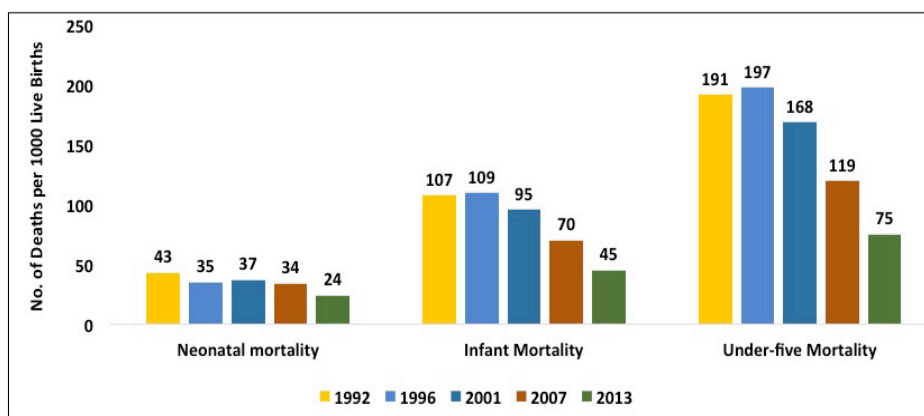
According to 2013 data, among women who had five or more children, about 64.5% did not want to have another child, and 45.5% were using modern contraceptives. However, only 27.9% were using permanent or long-acting contraception¹³. These data show that women are not using the contraceptives that match their reproductive needs. Without emphasising appropriate method mix that meets the reproductive needs of all women, it will be difficult for fertility to decline rapidly in Zambia.

To accelerate fertility decline, Zambia should step up progress in child survival

Improving child survival is an important prerequisite for fertility decline because parents are assured that the few children they have will not die prematurely. Zambia has made good progress in reducing child mortality, and is on track to achieving the MDG goal on child survival. In the last two decades, under-5 mortality declined by 60%, while infant mortality declined by 58%. However, limited progress has been made in reducing neonatal mortality, which declined by 44% during the same period (Figure 5). In 2013, about one third of all under-5 deaths occurred in the first month of life¹³.

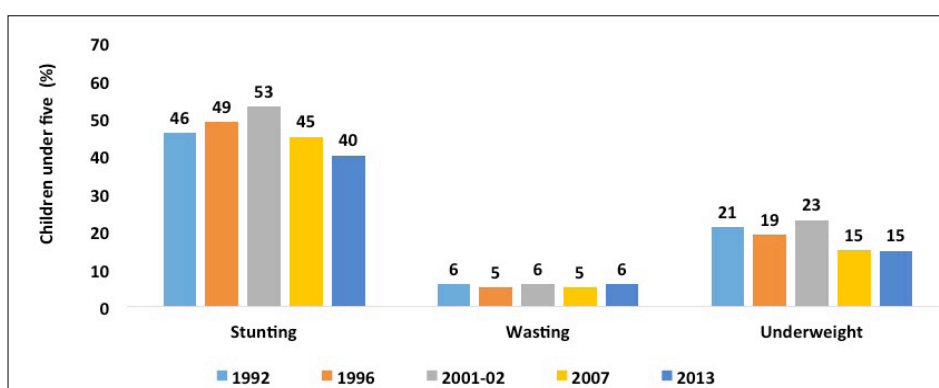
Compared to the East Asian Tigers and other African countries where fertility has declined rapidly, Zambia's child mortality rates remain unacceptably high³. The under-five mortality rate in Zambia is 75 per 1000 live births, compared to 46.4 in Botswana, 43.9 in South Africa, 8.5 in Malaysia, and 3.7 in South Korea.

Figure 5: Trends in childhood mortality, Zambia, 1992-2013



Source: Central Statistics Office et al. (2014)¹³

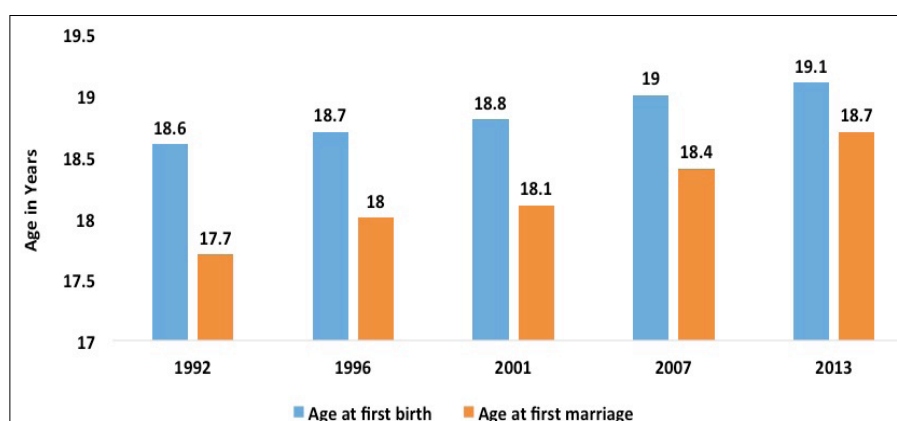
Figure 6: Trends in nutritional status, Zambia, 1992-2013



Source: Central Statistics Office et al. (2014)¹³

Child malnutrition is a key risk factor for childhood illness and mortality, but limited progress has been made. The level of malnutrition has hardly changed, particularly stunting, which undermines cognitive development and physical work capacity, and exposes children to several adult-onset chronic diseases. In 2013, 40% of children under age 5 were stunted, while 6% and 15% of children under age five were wasted and underweight, respectively (Figure 6)¹³.

Figure 7: Trends in median age at first birth and marriage for women aged 20-49, Zambia, 1992-2013



Source: Central Statistics Office et al (2014)¹³

Improving girls' education will facilitate fertility decline

Keeping girls in school and ensuring they have access to comprehensive sexuality education and services delays marriage and child-bearing. Early marriage and child-bearing increases fertility and hinders education attainment and economic productivity for women. It is estimated that delaying marriage and child bearing by 5 years can slow population growth by as much as 15% to 20%^{14,15}. In addition, keeping girls in primary school for one extra year increases their wages by 10-20%¹⁶.

Zambia is facing serious challenges related to high school dropout, teenage pregnancies and early marriages. According to the Education Statistical Bulletin for 2013, only 35.8% of girls who enrol in grade one are expected to reach grade nine. This means that up to 64% are likely to drop out along the way¹⁷. Some of the factors driving the high dropout rates include early pregnan-

cy and marriage among girls, high cost of education (particularly at secondary and tertiary levels), and limited secondary education facilities. Ministry of Education data for 2013 shows that 12,753 girls at primary level and 2,096 girls at secondary level dropped out of school due to pregnancy. However, more than half of them did not return to school after giving birth¹⁷.

According to 2013 data, half of Zambian girls were married by 18.7 years, (Figure 7). Additionally, 28.5% of those aged 15-19 have had a child or are pregnant¹³.

Promoting the general empowerment of women and adolescent girls should be at the centre of efforts to facilitate fertility decline. Empowered women and adolescent girls have greater autonomy to make informed decisions that positively influence their reproductive health.

“Early marriage and child-bearing increases fertility and hinders education attainment and economic productivity for women”

Policy Actions to accelerate fertility decline in Zambia



An African family. Photo: Isaac Singleton/Flickr

Increase use of effective family planning methods within an integrated Reproductive and Maternal Health programme

- The programme should intensify its communication and educational programmes, and develop innovative outreach services to promote the benefits of the use of family planning and the resultant planned family sizes.
- Improve the quality of, and equitable access to services, with focus on promoting increased family planning method choice including long-acting and permanent methods, and ensure reproductive health commodity security.
- Improve the quality and equitable access to high impact maternal health services such as skilled attendance at birth and emergency obstetric care.
- Reinforce political will and increase government investment in family planning, building on the FP2020 commitments, which includes doubling of budgetary allocation for family planning interventions as articulated in the 8 year FP scale-up plan (2013 to 2020).
- Encourage and reinforce male involvement in Reproductive Health programmes, including family planning.
- Encourage and reinforce public-private partnerships in delivery of Reproductive Health programmes, including family planning services.
- Strengthen government institutions responsible for coordinating Reproductive Health programmes, including family planning programmes.
- Pay particular attention to marginalised population groups and underserved provinces, districts and constituencies.

Improve child survival

- Intensify on-going interventions to further reduce child mortality, including immunisation campaigns, integrated management of childhood illnesses (IMCI), use of insecticide treated nets, prevention of mother-to-child transmission of HIV, deliveries by skilled birth attendants, and improving child nutrition including Vitamin A supplementation.
- Pay particular attention to interventions addressing neonatal mortality and stunting.
- Target vulnerable population groups and underserved provinces, districts and constituencies.

Keep girls in school for longer

- Address the cultural, social and economic barriers that increase school dropout, including financial barriers to accessing quality education.
- Enforce laws on legal minimum age of marriage – Constitution/Marriage Act - and sensitise communities to value education of girls with its benefits at household, community and national levels.
- Address the stigma, misconceptions and financial constraints that prevent girls from taking advantage of the school re-entry policy after giving birth.
- Scale-up comprehensive sexuality education and referral services for in and out of school adolescents, including removing the age consent barrier to accessing contraception and other reproductive health services.

Conclusion

Zambia's young age structure can be turned into a valuable asset for achieving the socio-economic transformation envisaged in Vision 2030 if birth rates decline rapidly. Zambian women and their partners want to have fewer children than they are having. In addition, many women have unintended pregnancies due to failure to access and use family planning. Addressing all barriers to access and use of family planning, reinforcing child survival and keeping girls in school will enable Zambia create a population with more working-age people than children, which can accelerate economic growth if accompanied by investments in education, health, economic reforms to create quality jobs, and accountability in service delivery and use of public resources.



Sena from Zambia, who was forced to marry at just age 15. Photo: DFID/Flickr

“Addressing all barriers of access and use of family planning, reinforcing child survival and keeping girls in school will enable Zambia create a population with more working-age people than children”

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The Ministry of Finance led the Core Technical Team (CTT), which comprised representatives from Central Statistical Office (CSO), Ministry of Education, Ministry of Health, Ministry of Justice, University of Zambia, Zambia Institute for Policy Analysis and Research (ZIPAR), and United Nations Population Fund (UNFPA) country office and East and Southern Africa Regional Office. The CTT provided technical oversight of the study and validated and approved the study report before submission to the Ministry of Finance. The Secretary to the Treasury and the Permanent Secretary provided overall policy oversight to the project. The report was presented to and benefitted from feedback and advice from a multisectoral stakeholder workshop involving representatives from government, development partners, University of Zambia, and civil society organizations held in December 2014.

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