

GIRLS' EDUCATION AND CHILD MARRIAGE IN WEST AND CENTRAL AFRICA

KEY FINDINGS AHEAD OF THE OCTOBER 2017 HIGH LEVEL MEETING ON ENDING CHILD MARRIAGE IN WEST AND CENTRAL AFRICA

QUENTIN WODON, CHATA MALE, ADENIKE ONAGORUWA, AND ALI YEDAN  
OCTOBER 2017





## GIRLS' EDUCATION AND CHILD MARRIAGE IN WEST AND CENTRAL AFRICA

# KEY FINDINGS AHEAD OF THE OCTOBER 2017 HIGH LEVEL MEETING ON ENDING CHILD MARRIAGE IN WEST AND CENTRAL AFRICA

QUENTIN WODON, CHATA MALE, ADENIKE ONAGORUWA, AND ALI YEDAN

## BACKGROUND

Despite substantial progress over the last two decades, girls still have on average lower levels of educational attainment than boys in West and Central Africa. This is in part because many girls in the region are married while still children, often before they may be physically and emotionally ready to become wives and mothers. Educating girls and ending child marriage is essential for girls and young women to have agency, not only as wives and mothers, but also beyond those roles. It is also essential to enable countries to reach their full development potential.

Low educational attainment and child marriage both affect girls' life trajectories in profound ways. Girls marrying or dropping out of school early are more likely to experience poor health, have children at younger ages and more children over their lifetime, and earn less in adulthood. This makes it more likely that their household will live in poverty. Other risks for women associated with a lack of educational attainment and child marriage include intimate partner violence and lack of decision-making ability within the household. Fundamentally, girls marrying or dropping out of school early are disempowered in ways that deprive them of their basic rights. This affects not only the girls themselves, but also their children. For example, children of very young

mothers face higher risks of dying by age five, being malnourished, and doing poorly in school. Overall, the economic and social costs of girls marrying and dropping out of school early are large for individuals and at the level of communities and societies.

Girls' educational attainment and child marriage are closely linked. Ending child marriage would improve girls' educational attainment, and conversely, improving girls' educational attainment would help reduce child marriage. This is why enabling adolescent girls to remain in school at the secondary level is one of the best ways to end child marriage, and ending child marriage is similarly essential to enable girls to remain in secondary school. To catalyze attention and investments in West and Central Africa towards promoting girls' education and ending child marriage, this note is part of a series that documents trends in girls' educational attainment and child marriage in the region, the factors that lead girls to marry or drop out of school early, and the associated impacts on a wide range of development outcomes. Selected economic costs resulting from girls marrying and dropping out of school early are also estimated. Finally, policies and programs that could help end child marriage and improve girls' educational attainment are discussed.

## KEY FINDINGS

This note provides a rapid summary of a first set of eight notes in this series on girls' education and child marriage in West and Central Africa. The eight notes were prepared ahead of the High Level Meeting on Ending Child Marriage in West and Central Africa held in Dakar on October 23-25, 2017. Several notes in this first set look at the economic impacts of girls' education and child marriage on a range of other development outcomes. The analysis in those notes builds on previous work prepared by the World Bank for a joint study with the International Center for Research on Women on the economic impacts of child marriage globally. The analysis of impacts in this set of notes focuses specifically on West and Central Africa and is extended to consider the impact of girls' education as well as that of child marriage (see the framework provided in appendix). Key results are highlighted below for each of the first eight notes individually.

“

*The secondary school is located a distance away and hundreds of students have enrolled there. But they return home ... unhappy about ... how they are treated where they are staying. Eventually they insist on staying home. Only two of the seven girls that entered the secondary school this year remain. The other five have already been withdrawn and married.*

”

Progress towards ending child marriage and ensuring that girls complete secondary school has been much slower than progress for primary and lower secondary education.

## NOTE 1

### GIRLS' EDUCATIONAL ATTAINMENT AND CHILD MARRIAGE: AGGREGATE TRENDS OVER TIME

This note analyzes trends over time in educational attainment for girls and child marriage in West and Central Africa. The analysis is conducted for 22 of the 25 countries in the region using comparable household surveys implemented between 2010 and 2016, depending on the country. Key results at the time of the latest survey for each country are as follows:

- > Comparing girls aged 15-18 to women aged 41-49, primary completion rates increased on average across the 22 countries by 24.0 percentage points on average, from 28.7 percent to 52.7 percent.
- > Completion rates for lower secondary are at 29.3 percent on average for women aged 18-21. This is an increase of 13.5 percentage points in comparison to women aged 41-49.
- > At the upper secondary level, completion rates for women aged 21-24 remain very low at 13.5 percent, an increase of only 8.1 percentage points versus rates for women aged 41-49.
- > On average, the prevalence of child marriage has decreased by only 8.2 points in two and a half decades, from 46.8 percent for women aged 41-49 to 38.6 percent for those aged 18-22.
- > There is a strong negative relationship between secondary schooling and child marriage. Lower secondary completion rates explain almost 60 percent of the variance in child marriage rates.

## NOTE 2

# GIRLS' EDUCATION AND CHILD MARRIAGE: ANALYSIS OF MUTUAL IMPACTS BASED ON INDIVIDUAL LEVEL DATA

Marriage is a key reason for girls to drop out of school. Ending child marriage would help improve girls' educational attainment. Conversely, keeping girls in school is one of the best ways to end child marriage.

This note analyzes the relationships between educational attainment for girls and child marriage in West and Central Africa. The analysis is conducted at the individual level using household surveys for six countries that account for two thirds of the region's population. Key results are as follows:

- > Parents often report that typically 10 to 30 percent of school dropouts by girls are due to an early marriage or a pregnancy, with early marriages playing a larger role than pregnancies when both options are listed in survey questionnaires. These estimates may be on the low side.
- > Once a girl marries or becomes pregnant, it is often extremely difficult for her to return to school even if this is in principle allowed by schools.
- > Possibly due to small sample sizes for girls completing secondary schooling, child marriage has a statistically significant impact on secondary school completion in only two of the six countries. However, in sub-Saharan Africa as a whole, child marriage can be shown to reduce the likelihood of secondary school completion.

- > The probability of marrying as a child is reduced in a statistically significant way by seven percentage points on average in the six countries for every additional year of secondary schooling. Similar effects are observed for the probability of early childbearing.
- > Overall, these results point to the close relationships between dropping-out of school for girls and marrying early. Together with reviews of the literature, the results also suggest that keeping girls in schools is one of the best ways to delay child marriage.

## NOTE 3

# IMPACTS OF GIRLS' EDUCATION AND CHILD MARRIAGE ON FERTILITY AND MODERN CONTRACEPTIVE USE

This note summarizes results from an analysis of the potential impacts of girls' education and child marriage on fertility and modern contraceptive use in West and Central Africa. The analysis is carried for six countries accounting for two thirds of the population in the region. Key results are as follows:

- > Controlling for other factors affecting total fertility, ending child marriage would result in a reduction in the number of live births that women have over their lifetime of about 10 percent on average in six countries that account for two thirds of West and Central Africa's population.
- > Universal secondary education for girls could have an even larger impact, with a reduction in total fertility nationally of one fourth on average. This estimate does not include the additional benefit that should result from the impact of universal secondary education on child marriage.

- > The impact on total fertility of girls completing only primary education is not statistically significant. Universal primary education would not be sufficient to accelerate the demographic transition.
- > Controlling for other factors, ending child marriage or ensuring that girls complete their primary education would not have large impacts on modern contraceptive use. Universal secondary education for girls could increase contraceptive use more. Yet even with a large percentage increase from the base, modern contraceptive use could remain low in absolute terms.
- > Overall, ending child marriage and educating girls, especially at the secondary level, could help in substantially reducing fertility and thereby population growth. This would help countries increase standards of living and reap the benefits of the demographic dividend.

Ending child marriage and ensuring universal secondary school completion for girls would both have large effects on fertility. By contrast, only universal secondary school completion would have a substantial impact on modern contraceptive use in some countries.



## NOTE 4

# EARLY CHILDBEARING: AGGREGATE TRENDS AND RELATIONSHIP WITH CHILD MARRIAGE

This note summarizes results from an analysis of trends in early childbearing (a woman having a first child before the age of 18) in West and Central Africa. The analysis is conducted for 22 of the 25 countries in the region using comparable household surveys implemented between 2010 and 2016, depending on the country. The note also includes an assessment for a subset of countries of the share of early childbearing at the level of both mothers and children likely due to child marriage. Key results are as follows:

- > On average, at the time of the latest survey for each country, the prevalence of early childbearing has decreased by only 3.8 percentage points in two and a half decades, from 33.8 percent for women aged 41-49 to 30.0 percent for those aged 18-22. In five countries, most of which have been affected by conflict, there has been an increase over time in early childbearing.
- > The relationship is strong between child marriage and early childbearing across countries, with child marriage explaining close to half of the variation in early childbearing. But there are also exceptions, with in some countries higher rates of early childbearing than child marriages.
- > On average, across a subset of these countries, 61.5 percent of mothers having a first child before 18 probably did so because of child marriages. For children born of mothers younger than 18, the proportion likely due to child marriages is at two thirds.

Early childbearing (a girl having a first child before the age of 18) has not decreased substantially in the region over time. In many countries, most early childbearing is likely due to child marriage.

## NOTE 5

# IMPACTS OF GIRLS' EDUCATION AND CHILD MARRIAGE ON UNDER-FIVE MORTALITY AND MALNUTRITION

Being born of a mother younger than 18 substantially increases the risk of under-five mortality and stunting for children. Yet ending early childbearing would not have a very large effect on national mortality and stunting rates because relatively few children are born of mothers younger than 18. Ensuring universal secondary education for girls and thereby mothers could have a larger impact.

In West and Central Africa, early childbirths (a child being born of a mother younger than 18) can be shown in most cases to result from child marriage. When very young mothers give birth, the health risks for them and their children increase substantially. This note summarizes results from an analysis of the potential impacts of ending early childbearing and improving educational attainment for mothers on the risks of mortality and malnutrition for their young children under the age of five. The analysis is carried for six countries accounting for two thirds of the population in the region. Key results are as follows:

- At the margin, controlling for other factors affecting child health, early childbearing is associated in most countries with a statistically significant increase in the risk for children of dying by age five. The average effect is large at five percentage points. For stunting, the impact is statistically significant in two thirds of the countries, with again large average effects at seven points.

- The effects of early childbearing are large at the margin, showing how children born of very young mothers are vulnerable. Nationally however, early childbearing is directly responsible for only one in 100 children being stunted, and four in 100 children dying by age five. This is because relatively few children are born of mothers younger than 18 at the time of their birth.
- There are indications that primary and secondary schooling can reduce under-five mortality and stunting, even if effects are not always statistically significant. The statistically significant impacts tend to be larger at the secondary level for stunting than for under-five mortality.
- When impacts are statistically significant, universal secondary completion would have larger impacts at the national level on under-five mortality and stunting than ending early childbearing in part because the number of children who would benefit would be also be much larger.
- Overall, these results demonstrate the benefits of ending early childbearing and educating girls, especially at the secondary level, for improving the health of young children.



## NOTE 6

# IMPACTS OF GIRLS' EDUCATION AND CHILD MARRIAGE ON WOMEN'S DECISION-MAKING, KNOWLEDGE OF HIV/AIDS, AND BIRTH REGISTRATIONS

*In some countries, child marriage has an impact on women's decision-making ability in the household. Impacts of child marriage on women's knowledge of HIV/AIDS, and whether children are registered at birth are less statistically significant. Secondary education for girls often has a positive impact on all three indicators.*

This note summarizes results from an analysis of the potential impacts of girls' education and child marriage on three indicators of women's agency: women's decision-making ability within their household, their knowledge of HIV/AIDS, and whether they register their children at birth. The analysis is carried for six countries accounting for two thirds of the population in the region. Key results are as follows:

- › Child marriage has a statistically significant impact on women's decision-making ability in half of the countries, but those impacts are not very large in most cases. Therefore, ending child marriage would probably not have a very large impact on decision-making ability, although some additional impact could be observed through the fact that child marriage affects educational attainment.

- › The effects of educational attainment on decision-making ability tend to be larger, at least at the post-primary level, and they are statistically significant in most countries. As a result, gains from universal secondary completion could be large, with a percentage increase from the base values of 14 percent on average across the countries with statistically significant impacts.
- › In most cases, child marriage does not have an impact on women's knowledge of HIV/AIDS. But completion of primary or secondary education do. Effects are larger at the secondary level with an increase from base values of 13 percent for countries with statistically significant impacts.
- › Early childbearing, which in most cases is due to child marriage, does not directly affect birth registration, but there may be indirect effects through education. Indeed, in some cases, completion of secondary education increases the likelihood that newborns will be registered.
- › Overall, the results suggest limited direct effects of child marriage (or early childbearing) on decision-making ability, knowledge of HIV/AIDS, and birth registration. The effects from primary or secondary education completion are more often statistically significant and are also larger.



## NOTE 7

# ECONOMIC COSTS OF CHILD MARRIAGE RELATED TO POPULATION GROWTH, HEALTH RISKS FOR YOUNG CHILDREN, AND EARNINGS FOR WOMEN

The economic costs of child marriage related to population growth, health risks for young children, and lower earnings for women are large. By 2030, the benefit from ending child marriage could reach well above \$60 billion in purchasing power parity in the region. This is an order of magnitude as opposed to a precise estimate given the many assumptions involved.

This note summarizes results from an analysis of selected economic costs of child marriage for countries in West and Central Africa (a similar analysis of the cost of not educating girls in the region is underway and will be shared in a separate note). The focus is on costs associated with higher population growth, lower earnings for women, and higher health risks for young children. Key results are as follows:

- > The cumulative reduction in population growth from ending child marriage or early childbearing are significant. On average, across six countries accounting for two thirds of the region's population, population sizes would be 3.4 percent smaller by 2030 if early childbearing had been ended in 2015. The impact of ending child marriage would be slightly lower as not all early childbearing is due to child marriage.

- > By 2030, the annual welfare benefits in terms of higher GDP per capita that would result from lower population growth by ending child marriage could reach \$59 billion in purchasing power parity terms. This estimate is computed for 21 of the 25 countries in the region. It is meant to represent an order of magnitude, as opposed to a precise estimate given the many assumptions involved.
- > By 2030, annual benefits from reduced under-five mortality and stunting from ending child marriage could reach more than \$5 billion in purchasing power parity terms. This estimate covers seven countries that account for close to two thirds of the region's population.
- > Today, the loss in earnings for women associated with past child marriages is estimated at \$8.3 billion in purchasing power parity in six countries that account for two thirds of the region's population. Due to economic and population growth, this estimate would probably increase in the future unless the prevalence of child marriage were to be reduced substantially.

## NOTE 8

# UNDERSTANDING AND ENDING CHILD MARRIAGE: INSIGHTS FROM HAUSA COMMUNITIES

This note summarizes results from a combined quantitative and qualitative analysis of factors leading to girls dropping out of school and marrying early in rural Hausa communities in Niger and Nigeria, and the role that education programs can play in improving outcomes for girls. Key results are as follows:

- > Rural Hausa communities have very high rates of child marriage in both Niger and Nigeria. In those communities, at least three in four girls in those communities marry before the age of 18.
- > Parents want to avoid the risk of a pregnancy out of marriage. If a girl becomes pregnant before marriage, the social cost to her and her family can be tremendous.

- > Most parents care about the well-being of their daughters. But in communities where the prevalence of child marriage is high, schools are weak or even inexistent, and the risks for girls not to marry are real, there are few viable alternatives to having their daughter marry young.
- > There is near consensus among parents that daughters need to be consulted during the marriage decision-making process. This does not mean that there is no pressure to marry and silence on the part of daughters is too often taken by parents as consent to marry.
- > Girls drop out of school due to poor learning outcomes and cost, failure at primary completion exams, lack of secondary schools, forced withdrawal of married adolescents, never enrolling in school or enrolling too late, the influence of relatives, and demands on first daughters.
- > When girls do not learn much in school, it is difficult for parents to make the monetary and other sacrifices that are needed to enable them to remain in school.
- > Lessons can be learned from successful interventions. An evaluation of the Center for Girls' Education in Nigeria suggests that the program keeps girls in school and delays marriage.

Lack of schools, poor learning while in school, the pressure to find a suitable husband, and parental fear of sexual activity outside of marriage are some of the drivers of child marriage. To delay marriage, girls and parents need a viable alternative. Schooling can be this alternative, with examples of successful interventions.

## CONCLUSION

This note has provided a rapid summary of a set of a first set of eight notes in a new series on girls' education and child marriage in West and Central Africa. Progress towards ending child marriage and early childbearing (a girl having a first child before the age of 18), as well as ensuring that girls complete their secondary education, has been slow over the last two and a half decades in many countries of the region. Marriage at an early age appears to be a key reason for girls to drop out of school. At the same time, in many communities, keeping adolescent girls in school is seen by parents as the only viable alternative to marriage, at least in countries where fear of sexual activity outside of marriage is a major driver of girls marrying early. The implication is that ending child marriage would help improve girls' educational attainment substantially and, conversely, keeping girls in school is one of the best ways to end child marriage. As to early childbearing, it is in most cases likely due to child marriage.

Ending child marriage would help improve girls' educational attainment. Conversely, keeping girls in school is one of the best ways to end child marriage. This also means that overall development impacts and costs are likely to be larger than those obtained when considering only child marriage, or only educational attainment, and not the interaction between both.

The economic and development rationale for improving girls' education and ending child marriage is strong. Ending child marriage and ensuring universal secondary school completion for girls would both have large effects on fertility and population growth, leading to higher standards of living for the population. For children, being born of a mother younger than 18 increases the risk of under-five mortality and stunting. Ending early childbearing would not have a very large effect on national mortality and stunting rates, but many children would still be saved and avoid stunting. Ensuring universal secondary education for girls and thereby mothers could have a much larger impact towards reducing rates of under-five mortality and stunting nationally. In some

countries, child marriage has an impact on women's decision-making ability in the household, but the impacts of child marriage on women's knowledge of HIV/AIDS and whether children are registered at birth tend to be less statistically significant. Secondary education for girls often has a positive impact on all three indicators.

One of the notes prepared for the High Level Meeting on Ending Child Marriage in West and Central Africa provides estimations of the economic cost of child marriage (a similar analysis is being prepared for the economic cost of not educating girls). The results are striking. By 2030, solely due to lower population growth, the benefit for the population from ending child marriage could reach \$59 billion in purchasing power parity in the region. Additional benefits would be reaped in terms of higher earnings for women thanks to a better education, and lower risks of under-five mortality and stunting for children. In addition, by ending child marriage and early childbearing and thereby reducing population growth, governments could increase the quality of the services provided to the population because lower population growth would reduce the strains imposed on national budgets to provide such services.

Educating girls and ending child marriage is not only the right thing to do, it is also a smart economic investment. What can be done in practice? Subsequent notes in this series will discuss the role of laws, policies, and interventions in ending child marriage and educating girls. There are great examples of successful interventions that can be replicated at larger scale. Investing in such interventions, piloting and evaluating new initiatives to learn about what works, and more generally aiming to empower girls and women will be key to the future development and economic well-being of the region.

## APPENDIX: FRAMEWORK FOR ANALYZING IMPACTS AND COSTS OR BENEFITS

Apart from discussing trends in girls' education and child marriage, as well as factors leading to those outcomes and policies that could improve outcomes, one of the aims of this series of notes is to document the impacts of girls' education and child marriage in West and Central Africa and economic

costs associated with those impacts. For the analysis of impacts and costs, a simple framework guides the analysis. As shown in the top part of Figure 1, which is adapted from a previous global study on the economic impacts of child marriage, girls' education and child marriage are linked. The literature as well as estimates from this series suggest that keeping girls in school is one of the best ways to delay marriage. By contrast, marrying early almost always leads girls to drop out of school.

In turn, both girls' educational attainment and child marriage matter for other development outcomes. Four main outcomes are considered in this series: fertility, health (including nutrition and the risk of exposure to intimate partner violence), work (including labor force participation, land ownership, and earnings), and agency (including decision-making and other impacts). While some of these impacts are estimated for girls marrying or dropping out of school early, others are estimated for their children.

Selected economic costs or benefits associated with the impacts of girls' education and child marriage are then estimated. The framework distinguishes four types of benefits from educating girls and ending child marriage: income gains, welfare gains, budget savings, and other benefits. Examples of benefits include (1) higher growth in GDP per capita thanks to lower population growth; (2) higher labor earnings for women in adulthood; (3) higher labor earnings for children in adulthood thanks to less stunting; (4) benefits associated with the valuation of children's lives saved; and (5) reduced budget needs thanks to lower population growth. This list of benefits is by no means exhaustive, but it includes some of the largest economic benefits that can be expected from educating girls and ending child marriage.

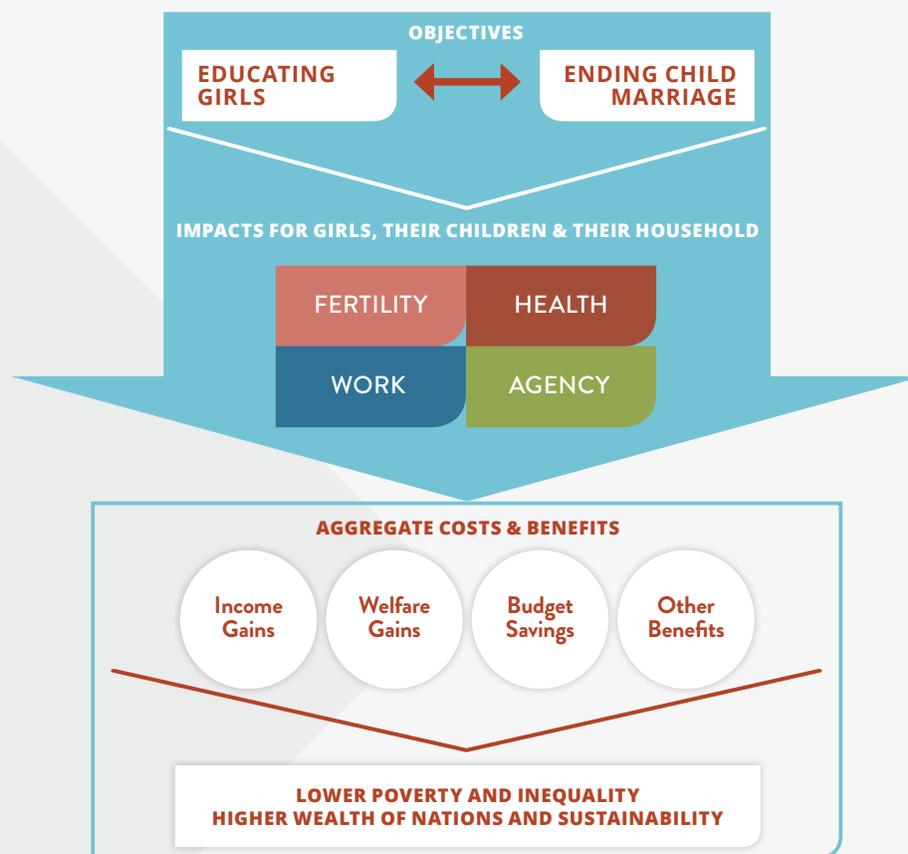
Finally, we note that the benefits from educating girls and ending child marriage at the level of individuals and households have broader implications at the national and even global level. By raising standards of living (through higher GDP per capita with lower population growth and higher earnings for women), educating girls and ending child marriage will reduce poverty as well as inequality.

The benefits from educating girls and ending child marriage can be measured as flows from one year to the next. This is for example the case when looking at impacts on GDP per capita. But they can also be measured as stocks through the concept of the wealth of nations. While a country's

GDP is an aggregate measure of annual production or income, wealth is a measure of the assets base of a country. A country's assets or wealth is what enables it to produce income. Research suggests that worldwide, human capital accounts for two thirds of global wealth, with produced and natural capital accounting together for the rest. Educating

girls and ending child marriages contributes to increasing a country's human capital, and thereby its wealth and its long-term capacity to generate future incomes for the population. Said differently, by increasing human capital, educating girls and ending child marriage helps in ensuring the long-term sustainability of a country's development path

**FIGURE A1: CONCEPTUAL FRAMEWORK**

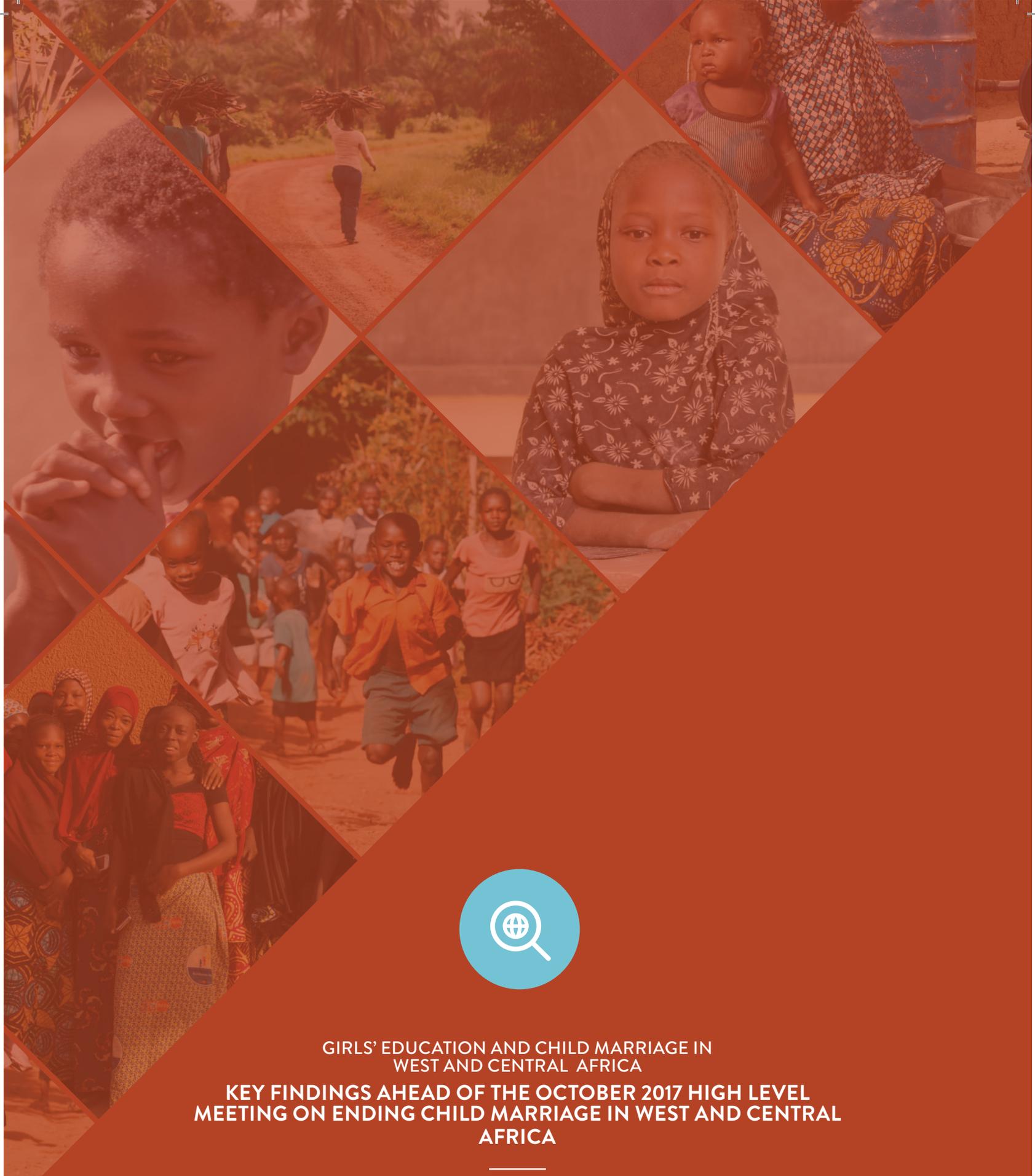


**Recommended citation for this note:**

Wodon, Q., Male, C., Onagoruwa, A., and Yedan, A. 2017. Key Findings Ahead of the October 2017 High Level Meeting on Ending Child Marriage in West and Central Africa, *Girls' Education and Child Marriage in West and Central Africa Notes Series*. Education Global Practice. Washington, DC: The World Bank.

This note is part of a broader series at the World Bank on *Girls' Education and Child Marriage in West and Central Africa*. Funding for the series was provided by the Children's Investment Fund Foundation and the Global Partnership for Education. The part of the series related to impacts and costs builds on previous estimates of the economic impacts of child marriage prepared by the World Bank for a joint study with the International Center for Research on Women. The findings, interpretations and conclusions expressed in this note are entirely those of the authors and should not be attributed in any manner to the World Bank, to its affiliated organizations or to members of its Board of Executive Directors or the countries they represent. The World Bank does not guarantee the accuracy of the data included in this work. Information contained in this note may be freely reproduced, published or otherwise used for noncommercial purposes without permission from the World Bank. However, the World Bank requests that this note be cited as the source.

© 2017 The International Bank for Reconstruction and Development / The World Bank, Washington, DC.



GIRLS' EDUCATION AND CHILD MARRIAGE IN  
WEST AND CENTRAL AFRICA

**KEY FINDINGS AHEAD OF THE OCTOBER 2017 HIGH LEVEL  
MEETING ON ENDING CHILD MARRIAGE IN WEST AND CENTRAL  
AFRICA**

 CHILDREN'S  
INVESTMENT FUND  
FOUNDATION

 GLOBAL PARTNERSHIP  
for EDUCATION

 THE WORLD BANK  
IBRD • IDA | WORLD BANK GROUP