Benefits of Meeting the Contraceptive Needs of Cameroonian Women

The ability to practice contraception is vital for protecting Cameroonian women's health and enables them to plan the size of their families and the timing of births. Yet low levels of contraceptive use have led to high levels of unintended pregnancies in Cameroon, a problem for which women and society pay

dearly—in women's lives, in the well-being of families and in needless expenditures.

Access to effective, modern contraceptives is essential for women to have the number of children they want, when they want to have them. However, in Cameroon, lack of access to quality reproductive health services contributes to large numbers of unwanted and mistimed pregnancies. Consequently, many Cameroonian women are exposed to the risks of childbirth without adequate obstetric care or of unsafe abortion, both of which threaten the lives, health and economic well-being of women and their families and puts a substantial burden on society. The increase in the maternal mortality ratio reported in the most recent Demographic and Health Survey (DHS) reports* is an important indicator of the seriousness of the problem, and urgent action is needed to reverse this trend.1

Use of modern contraceptives† promotes the health and well-being of women and their families, in part by reducing maternal and infant mortality and morbidity.^{2,3} Family planning directly contributes to

Key Points

- •In 2013, an estimated 40% of pregnancies in Cameroon were unintended.
- •More than six in 10 women who want to avoid pregnancy either do not practice contraception or use a relatively ineffective traditional method. These women can be said to have an unmet need for modern contraception.
- •Meeting just half of this unmet need would prevent 187,000 unplanned pregnancies each year, resulting in 65,000 fewer unsafe abortions and 600 fewer maternal deaths annually.
- •If all unmet need for modern methods were satisfied, maternal mortality would drop by more than one-fifth, and unintended births and unsafe abortions would decline by 75%.
- •Investing in contraceptive commodities and services to fulfill all unmet need among women who want to avoid pregnancy would result in a net annual savings of US\$5.4 million (2.7 billion CFA francs) over what would otherwise be spent on medical costs associated with unintended pregnancies and their consequences.
- •Expanding contraceptive services confers substantial benefits to women, their families and society. All stakeholders, including the Cameroon government and the private sector, should increase their investment in modern contraceptive services.

^{*}The maternal mortality ratio rose from 669 maternal deaths per 100,000 live births in the 2004 DHS report to 782 per 100,000 in the 2011 report. Maternal deaths are those that occur during pregnancy, or within 42 days of termination of pregnancy, from any cause related to pregnancy. ¹⁴

[†]By modern contraceptives, we mean male or female sterilization, oral contraceptives, IUDs, injectables, implants, and male or female condoms.

the attainment of three Millennium Development Goals (MDGs): reducing child mortality; improving maternal health; and promoting women's empowerment and equality by enabling greater school, workforce and political participation. Improving access to family planning services also makes three other MDGs—providing universal primary education, ensuring environmental sustainability and combating HIV/AIDS—more attainable. The United Nations has declared that "accelerated progress and bolder action are needed"—particularly in Sub-Saharan Africa—to achieve these goals.⁴

This brief describes current patterns of contraceptive use in Cameroon and documents the high costs of persistent unmet need for modern contraceptives. Building on prior work, ^{5–7} we use national data to estimate for 2013 the net benefits of averting unintended pregnancies, both with current levels of use and under two hypothetical scenarios of increased investment in modern contraception. While family planning provides many health, social and economic benefits to women and their families—such as increased productivity and greater accumulation of human capital^{8,9} – we focus on the health and financial savings gained by averting unplanned births and unsafe abortions.

The findings in this report provide evidence to help policymakers and international donors increase investment in contraceptive services to reduce maternal mortality and morbidity and alleviate unnecessary financial burdens on the health system. Unless otherwise specified, all data presented here are special calculations using the data sources and methodology listed in the Methods box (page 3).

Pregnancy and childbirth entail health risks for both women and newborns

Pregnancy and birth can be life-threatening for both woman and child, especially in the absence of adequate prenatal and delivery care. ^{10,11} In Cameroon, only 61% of women make the recommended four or more prenatal care visits, and just 66% of births are attended by a health care professional. ¹² The use of modern contraceptives enhances maternal and infant health by preventing pregnancies that result in high-risk births, such as those that are too closely spaced, that occur among women younger than 18 or older than 35, or that occur after a woman has already had many children. ^{2,3,13}

The first year of life is risky in Cameroon: Sixty-nine out of every 1,000 infants die before their first birthday. Because poor and rural women face steeper cultural and infrastructural barriers to receiving prenatal and delivery care, their infants are far more likely than other infants to die during the first year of life. For example, the mortality rate is nearly twice as high among infants born to women in the

METHODS

The estimates in this report are for 2013 and were projected from the most recent available data. Unless otherwise noted, the data were calculated using the following methods and sources. An Appendix that describes the methods and sources in more detail is available online at http://www.guttmacher.org/pubs/Cameroon-methodology.pdf or from the authors.

The number of women in each region, by marital status, desire to avoid pregnancy, and contraceptive use in 2013, were estimated using data from the 2011 Cameroon Demographic and Health Survey (CDHS) and regional estimates of the number of women aged 15–49 from the 2012 Demographic Projection of Central Bureau of Census and Population Studies.

The numbers of unintended pregnancies under current contraceptive use patterns and alternative scenarios were calculated using contraceptive use-failure rates and pregnancy rates for nonusers from the CDHS and other sources (references 22 and 27), adjusted to the estimated number of unintended pregnancies in each region in 2013.

Pregnancy intendedness and pregnancy outcomes were estimated from regional data on the planning status of recent births from the 2011 CDHS, from regional estimates of induced abortion rates in 2008 and from estimates of the number of miscarriages.

The number of pregnancy-related deaths was estimated using the national estimate of the maternal mortality ratio provided by the World Health Organization (WHO) for 2010. The WHO estimate, unlike that from the DHS, is adjusted for underreporting and misclassification of maternal deaths. Regional estimates of unsafe abortions used the regional estimate of the abortion rate published by researchers at the Guttmacher Institute. Regional infant death rates were estimated from the 2011 CDHS. National-level estimates of pregnancy-related disability-adjusted life years (DALYs) among women and of DALYs among newborns were calculated by adjusting the 2009 estimates from the WHO Department of Measurement and Health Information Systems.

Costs of contraceptive services and maternal and newborn health care were estimated from basic cost elements. For each contraceptive method or health care intervention, we combined the costs (in 2013 U.S. dollars) of drugs, supplies, and materials; labor and hospitalization; and program and system costs to arrive at a cost per user per year of protection against unintended pregnancy per woman receiving pregnancy-related medical care. Program and system costs, which are indirect costs (e.g., overhead and capital expenditure), were taken from the United Nations Economic and Social Council. Direct costs of drugs, supplies, materials and labor used for family planning and mother and newborn health care interventions were taken from the United Nations Population Fund's Reproductive Health Costing Tool, from cost studies conducted in Cameroon and from documents available in Cameroon.

poorest households (90 infant deaths per 1,000 live births) than among those born in the wealthiest (51 per 1,000). Another way to quantify poor health outcomes is to use disability-adjusted life years (DALYs)—a measure that expresses the burden of disease in terms of the number of healthy years of life lost to death or illness. In 2013 alone, perinatal complications contributed to the loss of one million healthy years of life among Cameroonian newborns.

The state of maternal mortality in Cameroon is similarly grave. In 2010, an estimated 690 women died from pregnancy- and delivery-related causes per 100,000 live births. ¹⁴ Annually, this translates to the

death of 5,900 Cameroonian women, many of whom had wished to avoid becoming pregnant. Preventing unintended pregnancy has the potential to substantially lower maternal mortality;¹⁵ expanding contraceptive use would limit women's exposure to the substantial risks inherent in pregnancy and childbearing in Cameroon, and especially help women avoid high-risk births.²

Research suggests that for every woman who dies from maternal causes, 20 others suffer a disability resulting from pregnancy or childbirth. Such morbidity impedes a mother's ability to care for her family or participate in the workforce. The DALYs lost to maternal conditions in Cameroon reached an estimated 153,000 in 2013; of these, 61,700 DALYs were lost as a result of unintended pregnancies.

A leading cause of maternal death and disability are the unsafe abortions many women resort to when their pregnancies are unwanted. Although reliable country-level data are not available, induced abortions are responsible for an estimated 12% of maternal deaths in Middle Africa, where Cameroon is located. Abortion is highly legally restricted in Cameroon—allowed only if a woman's health or life is at risk or in cases of rape or incest—yet approximately 36 of every 1,000 Cameroonian women aged 15–44 have an abortion each year. Because most abortions in Cameroon are performed in unauthorized locales by unlicensed practitioners, they carry a high risk of complications that endanger women's lives and exhaust scarce resources. We estimate that more than 46,000 Cameroonian women need postabortion care annually (not shown).

Current contraceptive use in Cameroon is deficient

In 2013, approximately 2.3 million Cameroonian women of reproductive age—43% of all women aged 15–49—were at risk of an unintended pregnancy; that is, they were married (or were unmarried but sexually active), were able to become pregnant and wanted to delay having a child for at least two years or wanted no more children at all (Table 1). These women form the basis for our analysis. Among married women, 47% (1.6 million) wanted to avoid pregnancy; 700,000 sexually active unmarried women also wished to avoid pregnancy, although this number may be an underestimate, as nonmarital sexual activity is stigmatized and hence underreported. 19–21

‡As no national-level study of the incidence of abortion in Cameroon exists, we use the regional average abortion rate for Central Africa. 18

[§] Tables and figures are presented at the end of this document.

Of all women who wished to avoid a pregnancy, 72% wanted to wait at least two years before having a child and 28% desired to stop childbearing altogether. However, only 37% of women who wished to avoid pregnancy were using an effective, modern contraceptive method. Another 18% relied on traditional methods, mostly withdrawal and periodic abstinence, and 45% used no method at all (Table 1). We define these 63% of women—those desiring to avoid pregnancy, but not using a modern method—as having an unmet need for modern contraceptives.**

Regionally, unmet need among women at risk is highest in the North and Far North regions (85% and 87%, respectively), possibly because women in these areas face especially great cultural and structural barriers to accessing contraception. Although women in other areas experience lower levels of unmet need (55–58%), substantial proportions of women in all regions of Cameroon face challenges in attaining their desired fertility goals. In addition, unmet need is substantially higher among the poorest women (89% of at-risk women in the lowest wealth quintile) than among those in the wealthiest households (50%). Poor women evidently face far greater barriers to accessing modern contraception than women with high wealth status.

Factors such as a large desired family size (women's average ideal family size is 5.5 children) lead more Cameroonian women to want to space births than to cease childbearing altogether. Thus, there is a greater need for reversible contraceptive methods than for permanent methods. Condoms are the most commonly used modern method; they are used by 46% of women practicing family planning and account for 68% of all modern method use. The injectable and the pill are used by 10% and 7% of women who want to avoid a pregnancy, respectively; fewer than 2% rely on sterilization, and similarly low proportions use IUDs or implants. Despite the high efficacy of modern methods for preventing unintended pregnancies, women seeking to space childbirths are more likely than those who wish to stop childbearing altogether to be using a modern method (71% vs. 59%). 12

A variety of factors explain the low use of modern methods in Cameroon. Commonly cited reasons for nonuse include infrequent or lack of sexual activity, concerns about side effects or health risks, postpartum amenorrhea or breastfeeding, and costs and other barriers to access.²⁴ These barriers include insufficient training of providers, frequent stock outs of contraceptive commodities and limited choice of methods.^{25,26}

^{**}This definition of unmet need differs from the standard definition used in DHS surveys. We include women using traditional methods in our definition of those with unmet need, because traditional methods have relatively high failure rates, leaving women vulnerable to unintended pregnancy and its negative consequences (see reference 22).

Nonuse accounts for the vast majority of unintended pregnancies

A woman's likelihood of experiencing an unintended pregnancy depends directly on whether and how effectively she and her partner use modern contraceptive methods. The risk is lowest with sterilization and long-acting reversible methods (such as IUDs, implants and injectables), and highest when no method is used. The pill is more effective than the condom, and both are more effective than traditional methods, such as periodic abstinence and withdrawal.²⁷

In Cameroon, an estimated 493,000 unintended pregnancies occurred in 2013. Unsurprisingly, the majority of unintended pregnancies (79%) occur among women who are not using contraceptives. However, of the remaining 21% of unintended pregnancies—those caused by method failure—slightly more than half occur among women who are using relatively ineffective traditional methods. Only 9% of unintended pregnancies occur among women using modern methods. The large majority of pregnancies caused by the failure of modern methods are experienced by condom users (86%); by contrast, only 7% occur among women using the pill. Overall, only 1.3% of all unintended pregnancies in Cameroon occur among women using a modern method other than condoms (not shown).

Many women have more children than they want

Low use of modern contraceptives in Cameroon, and widespread use of less effective methods, has led to high levels of unplanned births—those that occur too soon or when a woman wants no more children at all. In 2011, 21% of births were unplanned. This proportion remained roughly constant from 1991 to 2011. Cameroon's average family size has declined only marginally in recent years, from 5.2 children per woman in 1998 to 5.1 currently. However, on average, women report wanting to have only 4.1 children (Figure 1); the difference between these figures indicates that the typical woman has one more child than she wants, and underscores the need to improve women's access to quality family planning services.

Poorer women in Cameroon are especially disadvantaged in their ability to achieve their reproductive goals. While they generally desire a larger family than their wealthier counterparts do, low-income women have the largest gap between their wanted and their actual fertility. The poorest women have, on average, 2.0 more children than they desire, whereas the wealthiest women, who likely have better access to contraception, have only 0.7 more children than they want (Figure 1).

The difference between desired family size and actual fertility also varies by region. The gap is largest (2.4 more children than desired) in the North region—which is one of the poorest—and smallest in the the South region (just 0.4 more children than desired). One reason that women in the South come closer to achieving their desired fertility may be their greater reliance on modern contraceptive methods: Approximately 45% of women in Sud who want to avoid pregnancy use a modern method, compared with the national average of 37%. 12

Gaps between wanted and actual fertility are directly related to high levels of unintended pregnancies among Cameroonian women. Of the estimated 1.2 million pregnancies in 2013, 40% were unintended (Table 1). Of these, 39% were mistimed pregnancies ending in births, 12% were unwanted pregnancies ending in birth, 36% ended in abortion and 14% ended in miscarriage. Although the proportion of pregnancies that were unintended varied only slightly among regions, big differences are evident by economic status: Thirty-three percent of pregnancies among the poorest women in Cameroon were unintended, compared with 44% among women in the highest wealth group. While the wealthiest women have the lowest fertility in Cameroon, their desire to adopt a modern, low-fertility pattern of family formation has apparently changed even more dramatically.

We estimate that 36% of unintended pregnancies ended in abortion in 2013, totaling around 175,000 such procedures. The proportion varied by region, from 30% in Far North to 42% in Littoral. More notably, the poorest women terminated 33% of their unintended pregnancies, while the wealthiest women terminated 45% of theirs (percentages derived from Table 1).

Contraceptive use promotes health and saves lives

Since unsafe abortions and other maternity-related risks can be drastically reduced by preventing unintended pregnancies, what are the quantifiable contributions of family planning to women's health and well-being? We explore this issue by estimating the extent to which the number of unintended pregnancies would decline as levels of contraceptive use increase. First, we compare the status quo with a scenario in which there is no use of modern contraceptives. Currently, Cameroonian women have roughly 493,000 unintended pregnancies annually, of which approximately 318,000 end in unplanned births and miscarriages, and 175,000 in induced abortions (Table 2 and Figure 2). If there were no modern contraceptive use at all, however, the country would be faced with 742,000 unintended pregnancies, of which 473,000 would likely end in unplanned births and miscarriages, and 269,000 in

abortions—almost all of which would be unsafe. Thus, the current level of modern family planning already averts around 249,000 unintended pregnancies and 94,000 abortions each year.

Because childbirth in Cameroon carries risks, and unsafe abortions are particularly perilous, these pregnancies—averted through the current level of contraceptive use—translate into the prevention of 900 maternal deaths annually and provide an additional 29,000 healthy years of life for women each year by reducing the number of maternal disabilities. Overall, the current level of contraceptive use reduces these negative maternal outcomes by 11–17% compared to a scenario of complete absence of modern method use.

Ideally, all women who want to plan their families would use modern methods of contraception. In such a hypothetical scenario, there would be only 120,000 unintended pregnancies (those caused by method failure)—373,000 fewer than currently occur. In turn, the numbers of unplanned births, abortions and miscarriages would all be reduced by 75–76%, the number of maternal deaths would drop by 22% and approximately 46,000 healthy years of life would be restored to women. Moreover, 1,300 fewer women would die in pregnancy and childbirth annually, the number of induced abortions would decline by 131,000 and 13,000 fewer infant deaths would occur.

Of course, fully meeting the need for modern contraceptives would be difficult and require large investments in infrastructure, personnel development and outreach services. A more realistic scenario may be to meet half of the current unmet need. In this case, 69% of women who want to avoid pregnancy would use a modern method. Even in this more modest scenario, the benefits over the current situation are striking. If just half of unmet need were met, there would be 187,000 (38%) fewer unplanned pregnancies each year, resulting in 95,000 fewer unplanned births, 65,000 fewer induced abortions and 600 fewer maternal deaths than currently occur. Women would gain an extra 16,000 years of disability-free life (Table 2).

Modern contraception also saves money

Every dollar spent on family planning—in any scenario—saves money that would otherwise be spent on maternal, newborn and postabortion care resulting from unintended pregnancies. In Cameroon, the estimated total expenditure on family planning in 2013 was US\$13.7 million (Figure 3). It would cost US\$25.5 million to fulfill half of all unmet need for modern contraceptives and US\$37.2 million to supply

all women in need with a modern method. These are total costs, which include the costs of contraceptive commodities, staff salaries, overhead, upgrades to the country's health infrastructure, counseling, and information, education and communication activities.

While these costs may seem high at first, they are less than the savings that would be realized by avoiding medical care expenditure related to unintended pregnancies and unplanned childbearing. For example, in 2013, the estimated cost to the health system of providing prenatal, delivery and routine newborn care, covering all obstetric emergencies and treating postabortion complications was US\$110 million. The costs would be substantially higher—US\$132 million—without any modern contraceptive use, because the numbers of unintended pregnancies and unplanned births would be higher. Since this saving of US\$22 million is greater than the cost of providing family planning (US\$13.7 million), the current level of contraceptive use already provides a net saving of US\$8.1 million (4.0 billion CFA francs) annually to Cameroon. In making this comparison, we consider only short-term savings in health care costs; longer-term savings would also be experienced in other areas, such as education, water, sanitation, immunization and malaria control.⁹

If the health system were able to meet all unmet need for modern contraceptives, a greater number of unintended pregnancies would be averted, and the reduction in health care costs would be even more dramatic. The total cost of pregnancy-related medical care would fall by US\$28.9 million if all women who wanted to delay or limit childbearing used modern methods, and by US\$14.5 million if just half of unmet need for modern contraceptives were met.

Although reducing unmet need would require greater expenditure on family planning services, considerable net savings would result. Compared with current expenditures on contraceptive services and maternal, newborn and postabortion care, meeting just half of the need for modern contraceptives would result in a net saving of US \$2.7 million (1.3 billion CFA francs), and fulfilling all unmet need would save US\$5.4 million (2.7 billion CFA francs), despite the additional expenditure in family planning to eliminate unmet need. The bottom line is that every franc spent on contraceptive services will save the health system 1.23 francs on maternal and newborn care.

Expanded contraceptive use especially benefits poor women

Compared with the poorest women, economically well-off women have better access to contraceptive services and, consequently, benefit more from the advantages that result from contraceptive use. Thus, poor women stand to gain more from increased access to family planning. For example, if unmet need were fully satisfied, poor women would avert almost four times as many pregnancies as would well-off women (341 vs. 89 pregnancies per 1,000 women who want to avoid pregnancy). Similarly, the reduction in maternal mortality would be most pronounced among the poorest women. Fulfilling all unmet need for modern contraceptives would avert 138 maternal deaths per 100,000 poor women who wish to avoid pregnancy, compared with 23 per 100,000 among the wealthiest women (not shown). Investments toward meeting women's reproductive needs will dramatically reduce existing reproductive inequities.

Additional funding is needed now

The Cameroon government has committed itself to the African Union Commission and United Nations Population Fund's Campaign for Accelerated Reduction of Maternal Mortality in Africa (CARMMA), which has identified family planning as a key component of the strategy to improve public health.²⁹ Furthermore, the government has approved a strategic plan for reproductive health in which a key goal is to increase the prevalence of modern contraceptive use from 16% to at least 30% by 2020.³⁰ However, expenditures on maternal health have been inadequate, averaging only US\$960,000 (\$0.20 per woman of reproductive age) annually from 2007 to 2009.³¹ Achieving significant reductions in maternal and infant mortality and their associated costs will require greater investments in health care infrastructure and the provision of quality family planning services. The total outlay for reproductive health care translates to just 1.1% of the government's total health expenditure.³¹ Much of the needed funding will likely have to come from international donors.

As this report has shown, an effective strategy for reducing maternal and infant deaths and disability is to lower women's exposure to the risks of pregnancy and childbirth in the first place. As women and couples increasingly desire to have smaller families, the demand for family planning will only grow. The responsibility for fulfilling this demand will have to be shared by various stakeholders, including the government, the private sector and the international community. Improving publicly funded family planning is especially important for the economically disadvantaged strata of the population.

Increased contraceptive use will enable the country to attain the MDGs—especially those that focus on mothers' and children's health—more quickly and affordably. Overall, every extra franc spent on family planning will lower expenditure on mother and newborn care by 1.23 francs. Increased contraceptive use will also increase labor productivity by improving the health of working women and allowing women more opportunity to participate in the workforce. Furthermore, the savings generated by averting unintended pregnancies can be directed to other development-enhancing investments. The benefits of improved quality of life and lives saved would be an incalculable gain to Cameroonian families.

References

- 1. Institut National de la Statistique et al., *Cameroun Enquête Démographique et de Santé et à Indicateurs Multiples 2011*, Calverton, MD, USA: ICF International, 2012.
- 2. Cleland J et al., Contraception and health, Lancet, 2012, 380(9837):149–156.
- 3. Stover J and Ross J, How increased contraceptive use has reduced maternal mortality, *Maternal and Child Health Journal*, 2010, 14(5):687–695.
- 4. United Nations, The Millennium Development Goals Report 2013, New York: United Nations, 2013.
- 5. Singh S and Darroch JE, Adding It Up: Costs and Benefits of Contraceptive Services Estimates for 2012, New York: Guttmacher Institute and United Nations Population Fund (UNFPA), 2012.
- 6. Sundaram A et al., Benefits of meeting the contraceptive needs of Ethiopian women, *In Brief,* New York: Guttmacher Institute, 2010, No. 1.
- 7. Vlassoff M et al., Benefits of meeting the contraceptive needs of Ugandan women, *In Brief,* New York: Guttmacher Institute, 2009, No. 4.
- 8. Cleland J et al., Family planning: the unfinished agenda, Lancet, 2006, 368(9549):1810–1827.
- 9. Moreland S and Talbird S, *Achieving the Millennium Development Goals: The Contribution of Fulfilling the Unmet Need for Family Planning*, Washington, D.C.: U.S. Agency for International Development, 2006.
- 10. Ronsmans C and Graham WJ, Maternal mortality: who, when, where, and why, *Lancet*, 2006, 368(9542):1189–1200.
- 11. Starrs AM, Safe motherhood initiative: 20 years and counting, *Lancet*, 2006, 368(9542):1130–1132.

- 12. Special tabulations of data from the 2011 Cameroon Demographic and Health Survey.
- 13. Govindasamy P et al., *High-Risk Births and Maternity Care*, Columbia, MD, USA: Institute for Resource Development/Macro Systems, 1993.
- 14. World Health Organization (WHO), Trends in Maternal Mortality: 1990–2010, Geneva: WHO, 2012.
- 15. Graham WJ et al., Maternal and perinatal conditions, in: Jamison DT et al., eds., *Disease Control Priorities in Developing Countries*, 2nd ed., Washington, DC: World Bank and Oxford University Press, 2006, pp. 499–529.
- 16. United Nations Children's Fund (UNICEF), *The State of the World's Children, 2009: Maternal and Newborn Health*, New York: UNICEF, 2008.
- 17. WHO, Unsafe Abortion: Global and Regional Estimates of the Incidence of Unsafe Abortion and Associated Mortality in 2008, Geneva: WHO, 2011.
- 18. Sedgh G et al., Induced abortion: incidence and trends worldwide from 1995 to 2008, *Lancet*, 2012, 379(9816):625–632.
- 19. Beninguisse G, Sexualité prémaritale et santé de la reproduction des adolescents et des jeunes en Afrique Subsaharienne, in: Ferry B, ed., *L'Afrique Face à ses Défis Démographiques: Un Avenir Incertain*, Clamency, Cameroon: Karthala, 2007, pp. 289–327.
- 20. Sawadogo N et al., *Pauvreté et Besoins Non Satisfaits en Santé de la Reproduction des Adolescents et des Jeunes en Afrique Centrale, Rapport Enquête Qualitative—Yaoundé*, Yaounde, Cameroon: IFORD, 2012.
- 21. Tchoumkeu A, *Prévention des comportements sexuels à risque chez les jeunes à Ouagadougou*, Saarbrücken, Germany: Éditions Universitaires Européennes, 2013, p. 93.
- 22. Ali M, Cleland J and Shah IH, Causes and Consequences of Contraceptive Discontinuation: Evidence From 60 Demographic and Health Surveys, Geneva: WHO, 2012.
- 23. Rwenge JR, Comportements sexuels parmi les adolescents et jeunes en Afrique Subsaharienne Francophone et facteurs associés, *African Journal of Reproductive Health*, 2013, 17(1):49–66.
- 24. Sedgh G and Hussain R, Reasons for contraceptive nonuse among women having unmet need for contraception in developing countries, *Studies in Family Planning*, 2014, 45(2):151–169.
- 25. Fonkwo P, *Report on the evaluation of family planning services in Cameroon*, Yaounde, Cameroon: Ministry of Public Health, Republic of Cameroon, 2011.
- 26. Unpublished data from the Ministry of Health, Government of Cameroon, March 25, 2014.
- 27. Trussel J, Contraceptive efficacy, in: Hatcher RA et al., eds., *Contraceptive Technology,* 19th ed., New York: Ardent Media, 2007, pp. 747–826.

- 28. Special tabulations of data from the 1991, 1998, 2004 and 2011 Cameroon Demographic and Health Surveys.
- 29. United Nations Family Planning Fund, What is CARMMA?, no date, http://africa.unfpa.org/public/site/africa/cache/offonce/pid/8804;jsessionid=857CE4C27BACA7C BF1C70771E7A9AE90.jahia02>, accessed Feb. 10, 2014.
- 30. Ministry of Public Health, Republic of Cameroon, *Plan Strategique National de la Santé de la Reproduction, Maternelle, Neonatal et Infantile (PSN/SRMNI) 2014–2020*, Yaounde, Cameroon: Republic of Cameroon, 2014.
- 31. Ministry of Public Health, Republic of Cameroon, *Cadre De Depenses a Moyen Terme Sante 2011–2013*, Yaounde, Cameroon: Government of Cameroon, 2010.

Credits

This report was originally published in French as part of the Guttmacher Institute's *In Brief* series. It was written by Michael Vlassoff and Jenna Jerman, both of the Guttmacher Institute, and by G. Beninguisse, Floriane Kamgaing and F. Zinvi-Dossou of IFORD, Yaounde, Cameroon. It was edited by Peter Doskoch. The authors are grateful for suggestions provided by Lea Monda, Population Services International; Sharif Egal, United Nations Population Fund; Parfait Eloundou-Enyegue, Cornell University; and Nathalie Nkoume, International Planned Parenthood Federation. The authors also thank the following Guttmacher colleagues for their contributions: Suzette Audam, Akinrinola Bankole, Sneha Barot, Jessica Malter, Susheela Singh, Gustavo Suarez and Aparna Sundaram. This report was made possible by a subgrant from Population Services International (PSI), under the Dutch Ministry of Foreign Affairs' *Choices and Opportunities Fund*.

Suggested citation: Vlassoff M et al., Benefits of meeting the contraceptive needs of Cameroonian women, *In Brief*, New York: Guttmacher Institute, 2014, No. 1.

Unmet Need and Unintended Pregnancy

Table 1. Unmet need for modern contraception among Cameroonian women aged 15–49 who want to avoid a pregnancy, intendedness of pregnancies and outcomes of unintended pregnancies, by region and wealth, 2013

Region or wealth quintile	No. of	Women who want to avoid pregnancy*				All pregnancies†					
	women aged _ 15-49 (in 000s)	No. of women (in 000s)	% using no method	% using traditional method‡	% with unmet need for modern method§	No. of pregnancies (in 000s)	% intended	% unintended	% ending in mistimed births**	% ending in unwanted births††	% ending in induced abortions
All	5,210	2,260	44.5	18.0		1,220	59.8	40.2	15.7	4.8	14.3
Region											
Adamaoua	260	80	63.3	5.7	69.0	60	60.1	39.9	15.7	4.8	13.9
Center	1,020	560			56.3		58.5	41.5	15.3	4.7	
East	200	90			74.4		60.6	39.4	15.9	4.9	
Far-North	830	210	83.6	2.9	86.5	250	62.2	37.8	16.3	5.0	11.2
Littoral	900	470	30.8	25.9	56.6	170	56.7	43.3	14.8	4.6	18.3
North	540	160	84.9	0.5	85.3	160	62.0	38.0	16.2	5.0	11.4
North-West	480	220	32.2	24.5	56.6	100	58.1	41.9	15.2	4.7	16.4
West	440	190	29.4	28.4	57.9	110	60.8	39.2	15.9	4.9	13.0
South	160	90	38.7	16.7	55.4	40	59.0	41.0	15.4	4.7	15.2
South-West	390	190	28.7	28.3	57.0	70	57.4	42.6	15.0	4.6	17.3
Wealth quintile											
Poorest	840	210	84.9	3.8	88.6	260	67.3	32.7	11.7	5.3	10.9
Second poorest	930	330	58.8	15.0	73.8	260	61.8	38.2	15.8	5.1	12.0
Middle	990	430	49.3	17.9	67.2	250	59.4	40.6	16.5	5.3	13.2
Second wealthiest	1,190	610	37.4	20.1	57.5	240	53.1	46.9	19.5	4.6	16.5
Wealthiest	1,270	680	28.2	22.2	50.4	210	55.9	44.1	15.1	3.5	20.0

^{*}Women who are married (or are unmarried and were sexually active within past three months), are able to become pregnant and do not want any children in the next two years or ever.

§Includes nonusers and users of traditional methods. The pill, IUD, injectable, implant, male condom, and male and female sterilization are classifed as modern methods.

[†]Includes miscarriages, which are estimated to occur in 16% of known pregnancies. Because we do not show miscarriages separately, the sum of the final three columns does not equal the percentage of all pregnancies that are unintended.

[‡]Rhythm, withdrawal and folk methods.

^{**}Mistimed births are those to women who did not want a child for at least two years when they became pregnant.

††Unwanted births are those to women who wanted no more children when they became pregnant.

Notes: Percentages may not add to totals because of rounding. Wealth quintiles are defined according Demographic and Health Surveys household rankings.

Sources: Available at http://www.guttmacher.org/pubs/appendices/IB-2014-1.pdf.

Scenarios for Fulfilling Unmet Need

Table 2. No. of pregnancies and related outcomes, by contraceptive use scenario, and % reduction in events, 2013

Outcome		No. of events (% reduction in events				
	No	Current	Half of	All need	Current	Half of need	All modern need met
	contraceptive	contraceptive	need for	for	use vs.	for modern	
	use	use*	modern	modern	no use	methods met	use vs.
			methods	methods		vs. current	current
			met‡	met†		use	use
Unintended pregnancies	742	493	306	120	34	38	76
Unintended births	372		155	59	33	38	_
Induced abortions	269	175	110	44	35	37	75
Miscarriages**	101	68	42	16	33	38	76
Maternal deaths	7	6	5	5	13	10	22
Infant deaths	66	59	52	45	11	11	23
Maternal DALYs	184	153	137	107	17	10	30
Perinatal DALYs	1,145	1,003	914	780	12	9	22

^{*}Method mix among women wanting to avoid a pregnancy is 37% modern, 18% traditional and 45% none.

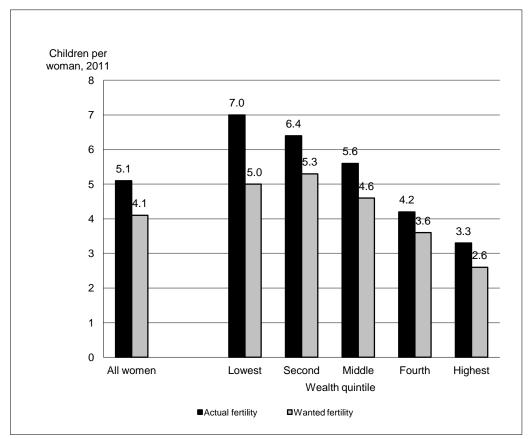
Notes: Numbers may not add to totals, or match the text, because of rounding. DALY=disability-adjusted life year. *Sources:* Available at http://www.guttmacher.org/pubs/appendices/IB-2014-1.pdf.

[‡]Method mix among women wanting to avoid a pregnancy is 69% modern, 9% traditional and 22% none.

 $[\]ensuremath{^\dagger 100\%}$ modern method use among women at risk of unintended pregnancies.

^{**} Miscarriages from unintended pregnancies.

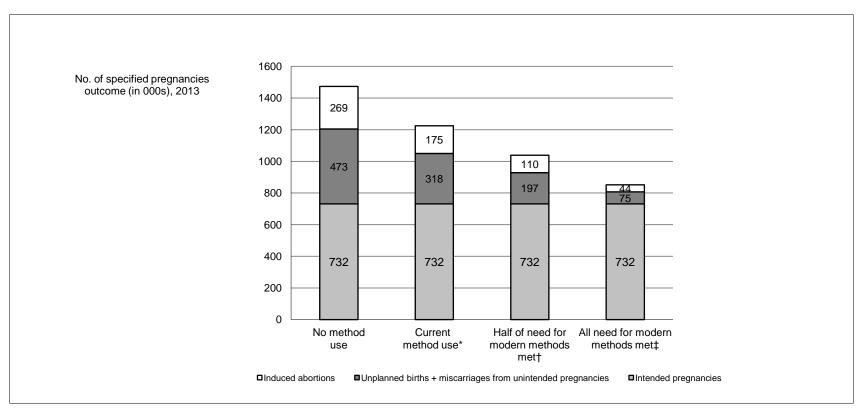
Figure 1. Cameroonian women are having more children than they want, especially if they are poor



Note: See Table 1 for definition of wealth quintiles.

Source: Reference 12.

Figure 2. Use of contraception, especially modern methods, reduces abortions and unplanned births



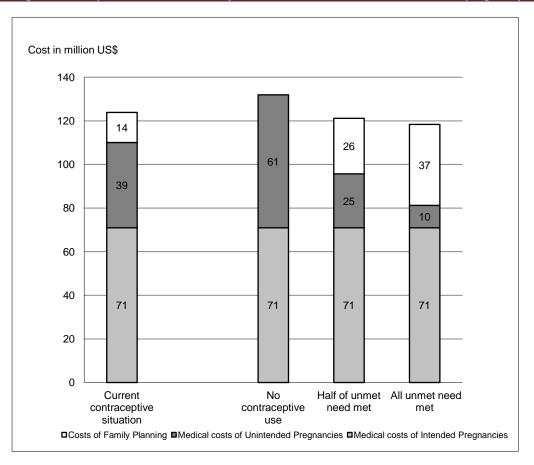
^{*}Method mix among women wanting to avoid a pregnancy is 37% modern, 18% traditional and 45% none.

Sources: Available at http://www.guttmacher.org/pubs/appendices/IB-2014-1.pdf.

[†]Method mix among women wanting to avoid a pregnancy is 69% modern, 9% traditional and 22% none.

^{‡100%} modern method use among women at risk of unintended pregnancies.

Figure 3. Investing in contraception could substantially reduce costs associated with unintended pregnancy



Note: Cost components may not sum to totals because of rounding. Medical costs include costs for prenatal care, routine newborn care, professional delivery care, obstetric emergency care and, for unintended pregnancies, treatment of complications from unsafe abortion. *Sources:* Available at http://www.guttmacher.org/pubs/appendices/IB-2014-1.pdf.