

What Future for the Western Sahel?

**The region's demography
and its implications by 2045**

Richard Cincotta and Stephen Smith





Atlantic Council

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EXECUTIVE SUMMARY

The Western Sahel—a region stretching from Senegal and Mauritania to Mali, Burkina Faso, Niger, and Chad, and including the twelve sharia law states of northern Nigeria—is in a demographic impasse. Rather than yielding an economic dividend, the conditions spawned by the region’s persistently youthful, rapidly growing, high-fertility populations overwhelm the capabilities of state-run services, generate extensive urban slum conditions, slow if not stall economic and social progress, and aggravate ethnic tensions. Decades of exposure to these mutually reinforcing conditions have undermined the legitimacy of central governments and rendered the region’s states vulnerable to the spread of Islamic populism and regime instability.

Due to the growth momentum of their youthful age structures, from now through the 2040-to-2045 period (the time horizon of this study), the region’s states will be driven to respond to the urgent needs to build infrastructure, increase agricultural productivity, maintain security, and generate jobs in their attempt to employ and politically pacify young-adult cohorts of unprecedented size who, each year, vie to enter the already

underemployed Sahelian workforce. Yet these well-intentioned development efforts can never be sufficient unless the region’s governments prioritize policies and programs that address a key underlying impediment to development: sustained high fertility.

To work their way out of this dilemma, Sahelian governments must shift a significant part of their development focus and funding to policies and programs aimed at preventing adolescent marriages and childbearing, promoting girls’ education, securing women’s participation in public- and private-sector workplaces, and achieving small, healthy, well-educated families. However, the region’s persistent jihadist insurgency raises questions as to how far women-centered programs can be safely and successfully extended beyond the edges of the Western Sahel’s inland cities. Absent serious progress on these coupled crises, policy makers in the EU, the United States, and their non-European allies may eventually disengage (as they already have from Somalia today), concluding that containing the Western Sahel’s jihadist insurgency and out-migration at the region’s frontiers is a more viable option than continued development assistance.

Adjoining Discussion Paper: Regional Policy and Program Perspectives

To gain further insights and cover policy and program issues that extend beyond the authors’ expertise, the Atlantic Council’s Foresight, Strategy, and Risk Initiative commissioned Organizing to Advance Solutions in the Sahel (OASIS), a reproductive health policy organization based in Berkeley, California, to convene a series of consultative discussions among West African public health and education professionals. These professionals discussed the merits of current policy and programmatic approaches in the Sahelian states, identified the major obstacles encountered, and recommended areas for additional

effort and investment. A synopsis of these consultations appear in the OASIS discussion paper titled “Accelerating a Demographic Transition” (<https://oasis-sahel.org/resources/accelerating-a-demographic-transition>). An additional analysis of international assistance to the Sahel for reproductive health and girls’ education is available in an accompanying OASIS brief (<https://oasis-sahel.org/resources/a-fulcrum-for-the-future>). Several of their key points are discussed and cited in this report.



Photograph by Yvonne Etinosa.

Key Findings

- Age structure and the demographic window.** As a group, the Western Sahelian countries remain among the world's most youthful populations. Moreover, within the 20-to-25-year period of this report, none of the Western Sahelian countries are projected by the United Nations (UN) Population Division's medium-fertility projection to reach the demographic window, namely a period of socioeconomically and fiscally favorable age structures (the so-called demographic dividend). Over the past seventy years, it has been within this window—beginning at a median age of around 25 or 26 years—that countries generally have reached upper-middle levels of development (e.g., the World Bank's upper-middle income category and associated levels of educational attainment and child survival). Notably, Mauritania and Senegal will approach this demographic window by 2045 in the current UN's low-fertility projection—the most optimistic scenario in the Population Division's standard series.
- Population growth.** UN demographers estimate that the overall population of the six states of the Western Sahel has grown from nearly 21 million inhabitants in 1960 to about 103 million in 2020—an almost five-fold increase over sixty years. For the twelve states of northern Nigeria, the authors' modeled estimates suggest that the population trajectory has been comparably steep, reaching nearly 78 million in 2020. Those sources expect the combined populations of the six Western Sahelian countries and northern Nigeria to grow from today's estimate of about 181 million to somewhere between a projected high, in 2045, of about 415 million, and a projected low of about 370 million people. Much of this growth is produced by age-structural momentum, a largely unavoidable consequence of the region's extremely youthful age distribution.
- Fertility decline.** The region's total fertility rates currently range between about 4.6 children per woman in Senegal and Mauritania, to pretransition rates—above 6.5 children per woman—in Niger and the twelve sharia law states of northern Nigeria. Throughout the

Western Sahel, rates of adolescent childbearing remain extremely high, and ideal family size generally equals or exceeds realized fertility. Even in the recent past—up to and including the UN's 2010 data series—the Population Division's medium-fertility projections for the countries of the Western Sahel have proved overly optimistic. Yet, recent local surveys in the region indicate that the current version of its medium-fertility projection is not out of reach. That scenario assumes that, between 2040 and 2045, fertility will decline to between 3.4 and 4.0 children per woman in most of the Western Sahel's states, and near 4.7 in Niger. Significant differences in modern contraceptive use and patterns of childbearing are already evident between rural women and more educated urban women, but the differences are not yet as pronounced as in East or southern Africa, where fertility decline is proceeding at a faster pace.

- **Maternal and child health, as well as girls' education.**

Whereas childhood mortality has steadily declined in the Western Sahel, still one in ten children die before the age of five in Mali and Chad. Recent World Health Organization (WHO) estimates indicate that in Niger and Chad, more than 40 percent of children below age five exhibit stunting. According to the WHO, Chad's maternal mortality rate is the world's second highest, while Mauritania, Mali, and Niger are also among the twenty countries in which pregnancy and childbirth are the most dangerous. In Chad and Niger, just one in five eligible girls are enrolled in secondary school, and net secondary enrollment has yet to rise above 40 percent elsewhere in the region. Adolescent marriages remain the region's most serious deterrent to increasing girls' educational attainment.

- **Women's autonomy and rights.** Despite the advice of regional health professionals and the criticisms of UN agencies, successive governments have, so far, done little to enforce already existing laws that would reduce adolescent marriages, eliminate female genital cutting, protect women from forced marriages, restrict polygamy, and give women inheritance rights and custody of their own children in case of marital separation or widowhood. While women's advocates see these as key to a shift in preferences to smaller, healthier, and better-educated families, current Sahelian political leadership fears political blowback. High levels of organized resistance—such as the large demonstrations by Islamic organizations in Mali, in 2009, that turned back women's rights—have convinced some development professionals that for several states in the Western Sahel, the only route to change currently available may be through intensive investments in girls' education and financial support for women's health care networks, as

well as progressive legal, professional, educational, and cooperative societies.

- **Farming.** Despite rising temperatures and the recent slowdown of cropland expansion, the growth of grain production has, since 1990, exceeded the pace of the region's roughly three percent per year rate of population growth. However, due to erratic harvests on marginally productive croplands, armed conflict, and the presence of displaced populations, the region's states are regular recipients of substantial food aid. Whereas ground-water irrigation is likely to become a more important input in the future, the combined effects of future population growth, continued climatic warming, persistent insurgency, and periodic drought in the Western Sahel make food self-sufficiency highly unlikely in the foreseeable future.
- **Pastoralism.** After three decades of relatively steady increases in rainfall in parts of the region, livestock numbers (adjusted for species body-size differences) have grown significantly since the 1990s. Yet the most productive pastoral rangelands, put under the plow by growing populations of dryland farmers, have dwindled in the area. Meanwhile, the numbers of grazing-rights holders have proliferated and vegetation on the remaining rangelands have dramatically deteriorated in form and forage quality, precipitating shifts from cattle to sheep and goats. Across the Sahel, agro-ecologists have noted the emergence of what they call neopastoral production systems that feature wealthy absentee owners of large herds, the proliferation of light but sophisticated weaponry, and a growing impoverished and politically marginalized pastoral underclass that is increasingly vulnerable to radicalization.
- **Security.** The region is in the throes of rapidly growing Islamic insurgencies. Whereas demographic models of persistent non-territorial (revolutionary) conflict predict substantial declines in the risk of such conflict during the demographic window, none of the region's states are currently projected by the UN Population Division to reach that window during the period of this report. Thus, the authors' models suggest that ongoing conflicts in Niger, Burkina Faso, Mali, Chad, and northern Nigeria are statistically likely to continue, at some level, through the 2040-2045 period. Unlike the Marxist-inspired insurgencies that ignited across Southeast Asia and Latin America during the second half of the twentieth century, the jihadist presence in the rural portions of the Western Sahel restricts the educational progress of women, their autonomy, and delivery of the family planning services that could facilitate fertility decline and improve reproductive health and nutrition.

- **Urbanization.** The rapidly growing urban population of the six countries of the Western Sahel currently comprises about one-third of the region's population and is projected to approach half by 2045. Despite laudable investments in housing that have dramatically reduced the proportion of slum dwellers in the urban population in several states, these efforts have been outpaced by rapid urban growth. Consequently, the region's slum-resident population has nearly doubled since 1990. As income-generating opportunities evaporate in the agricultural and livestock sectors, the hopes of young men will rest on the urban job market and the educational opportunities that make them fit for employment. Yet employment in the formal sector of the economy will remain elusive throughout the region, and rapid urbanization is bound to present new housing, fresh water, energy, health, sanitation, and security challenges. Still, if governments and donors heavily invest, urban transformation could stimulate transitions to greater female autonomy and smaller, better educated, more well-nourished families with skills and prospects for urban employment in the region.

- **Migration.** Between 1990 and 2015, more than 80 percent of migrant flows that originated in the six Western Sahelian countries ended beyond the region's borders. During this period, slightly more than 60 percent of the net outward flows were added to populations in other African countries, whereas nearly 40 percent were added to populations in Europe, North America, and destinations elsewhere. Senegal and Nigeria in particular, represent significant migrant gateways to Europe and North America. This analysis does not even account for substantial refugee flows during the 2015-2020 period, which are associated with escalating conflict in the Lake Chad Basin, Niger, Burkina Faso, and Mali. For young Sahelians surviving on marginal rural livelihoods and in urban slums, episodic drought, looming conflict, and sustained economic hardship represent weighty "push factors" that readily tip personal decision-making toward migration. In this arid and poorly developed part of the world, the region's population size is clearly important. It adds to the ranks of those in marginal livelihoods who might be pressured to leave during episodic disasters and seek greater opportunities elsewhere, while creating few "pull factors" encouraging potential migrants to stay.

Models of demographic progress

This report highlights the pathways taken by three countries that politically, programmatically, and without coercion, facilitated relatively rapid fertility transitions and age-structural transformations: Tunisia, Botswana, and Bangladesh. While these states differ geographically, culturally, and economically from the Western Sahelian states, their demographic starting points were similar. Initially, each experienced a broadly pyramidal profile with a median age under twenty years and, in each, the total fertility rate was estimated at between six and seven children per woman. To these, the paper adds a discussion of ongoing programmatic efforts that are influencing the patterns of reproduction in Ethiopia, Malawi, and Rwanda.

- **Tunisia.** This North African country's rapid journey out of the age-structural transition's youthful phase was the product of the vision and leadership of Habib Bourguiba, the country's first president. His Neo-Destour political party legislated a package of pro-women reforms, including laws that compelled parents to send their daughters to school, raised the legal age of marriage, prohibited polygamy, gave women full inheritance rights, made divorce a judicial process, provided decentralized centers of voluntary family planning, mandated that women could work outside the home, opposed the veil, and curtailed the power of local imams.
- **Botswana.** From its inception, professional care and affordability have been key elements of this country's reproductive health effort. Family planning services, provided free of charge since 1970, were directly integrated into maternal and child health care at all local primary health facilities. Moreover, the country is one of the few in the sub-Saharan region where girls' secondary-school enrollment rates—now above 90 percent—exceed boys' rates. While Botswana shared the initial challenge of high rates of adolescent pregnancy and early marriage with Sahelian countries, its history of effective governance and wise use of mineral rents sets Botswana apart from most countries in sub-Saharan Africa.
- **Bangladesh.** This country's remarkable demographic turnaround was brought about by a dedicated health administration that mobilized tens of thousands of community-based health workers and volunteers, teamed up with a local non-governmental organization called Bangladesh Rural Advancement Committee (BRAC), and used an infusion of health commodities and funds from foreign donors. Begun in 1975, Bangladesh's successful donor-funded approach and its country-wide public-health communications program helped trigger demand for other long-term contraception methods (e.g., injectables and implants), countrywide expansion of the village worker program, and formalization of Bangladesh's public health supply chain.
- **Programs in East Africa.** Applying lessons learned from Asia and Latin America, reproductive health programs in Ethiopia, Kenya, Malawi, and Rwanda have attained strong support from national leaders, achieved high public profiles, and obtained strong financial commitments from foreign donors. Over the past three decades, greater attention to girls' educational attainment, organized efforts to augment women's reproductive rights and increase political participation, and effective public health communications have improved the effectiveness of donor-funded programs for maternal and child health as well as family planning. Significant service delivery and contraceptive acceptance challenges remain in each of these eastern African countries, including high contraceptive-discontinuation rates, and wide gaps in contraceptive use between the lowest-income households and wealthier, urban families.

Scenarios

In situations of crisis and uncertainty, scenarios help reduce the scope of options and unveil poorly visible possibilities that could, in the future, catch policy makers unaware. These fictitious futures allow analysts to depart from the most obvious event trajectories and explore other possibilities without having to imagine discontinuities or explain complex chains of events that, throughout history, have led to surprises. For the sake of didactic brevity, we present the following three scenarios under the guise of news dispatches, which shine a light on the situation in the Western Sahel in the early 2040s.

- **“More of the Same.”** In an interregional summit, held in 2043, the European Union (EU) and an organization of Sahelian states agree to a fourth five-year multilateral Migration Convention. The agreement limits and controls the flow of migrants from and through the Sahel in return for a generous increase in the EU’s regional aid package. Girls’ school enrollments continue to rise in the region, and modern contraceptive use increases slowly, spreading from the burgeoning urban areas into smaller cities and towns. However, governments make little serious effort to expand women’s rights or to perturb the patriarchal system that condones adolescent marriages and childbearing. Meanwhile, some Western Sahelian states have instituted cash income supplements for stay-at-home mothers, offering an alternative to women competing in the region’s crowded job market. Meanwhile, Sahelian states continue to pool military resources to contain jihadist groups that remain active across the rural Sahel.
- **“Breakthrough.”** A summit of the expanded group known as G7/Sahel, held in 2043, opens with the roll-out of a UN-sponsored report highlighting a reproductive turnaround in several member states in the region and outlines significant progress in others. A local representative of the UN Population Fund (UNFPA) reports on the results of demographic and health

surveys indicating that, in both Senegal and Burkina Faso, countrywide total fertility rates have fallen below three children per woman, and that Niger appears to be following on a similar path. Local surveys in several Sahelian cities provide evidence that fertility is near the two-child-per-woman replacement level and that maternal and childhood clinical caseloads as well as school class sizes have dramatically declined. Despite a slowdown in the region’s rate of population increase, ongoing growth due to momentum, increasing temperatures, periodic crop failures, and sporadic jihadist violence, grain imports and food aid remain critical elements of the food-security equation in the Sahel.

- **“Downward Spiral.”** In a UN Security Council session convened in 2043, the Sahel’s special representative calls for international action to address a multifaceted crisis unfolding across the Western Sahel. He describes Somalia-like state failures and territorial infighting among warlords in Mali and Chad, and further outlines deteriorating security conditions across the Hausa-speaking regions of northern Nigeria and Niger, where loosely affiliated jihadist groups have proliferated and, in some cases, gained political control. He also notes that airfields in the Sahel have become the interregional hub for moving contraband, including human trafficking. In his report, the Sahel’s special representative calls the Security Council’s attention to Niger, currently in the throes of a famine on a scale that occurred in the latter half of the twentieth century. This time, Niamey, the capital, is faced with feeding a population nearing sixty million, rather than the 5.2 million of the mid-1970s. Senegal, the region’s only gateway for food aid and other humanitarian assistance, is also the jumping-off place for illegal migration to Europe.

Recommendations

For international aid donors, the report offers a general recommendation: Successful demographic turnarounds over the coming twenty to twenty-five years would feature at least one, and hopefully two, countrywide programmatic success stories, providing exemplars of best practices, a pool of local expertise, and models of community participation that might spread elsewhere. Senegal may be the best candidate to host such a model program. Another focused effort should be launched in an inland state—perhaps Burkina Faso, if its rural areas are pacified. In Niger, Mali, and Chad, the most effective interventions will likely be those that vastly improve urban services and expand a trained cadre of dedicated health workers to deploy in urban peripheries and refugee camps, where demands for education, family planning, and other reproductive services are typically high.

In addition to the more general take-aways, the report's specific recommendations are as follows:

- **Gain from urbanization.** By 2045, nearly half of the region's growing population is projected to live in urban areas. If services can be mobilized and funded, it will be in these urban centers that young Sahelians receive the vocational and professional education and attain the income-generating employment that could keep many of them from slipping into the illegal or extremist margins of their societies. It is imperative that girls' education and voluntary family planning—along with other reproductive, maternal, and child health services—are also in place in these expanding cities and towns, and that women gain access to both the private- and public-sector workforce.
- **Ramp up girls' education and family planning.** Governments in the region should reinvigorate their commitments to increasing levels of girls' educational attainment and, with the assistance of international donors, vastly increase levels of spending on family planning and other reproductive health services. States should elevate the administrative profile of family planning to a ministerial responsibility and augment its public profile through information campaigns. Education and health administrations should eliminate bureaucratic, traditional, and religious barriers to girls' school attendance and facilitate easy and affordable access to family planning services for both married as well as single individuals. Methods of delivery that directly bring basic reproductive health services to people in their urban neighborhoods and rural homes—including village health workers and mobile clinics—may prove most effective in Sahelian conditions. At this stage of development, it would be helpful if Sahelian professional societies develop an online library of local success stories that cover girls' education, family planning, as well as sexual and reproductive health.
- **Work with respected religious and political leaders, and other public figures; involve and inform men.** Exposure to supportive messages from religious leaders who address questions of religious acceptability is generally associated with higher levels of modern contraceptive use. Moreover, recent studies indicate that local programs that inform and involve men and seek the support of local leaders may be the most likely to succeed in the Western Sahel. For decades, health communicators have worked with television and radio producers as well as entertainers, particularly those involved in popular daytime dramas (i.e., soap operas) and talk shows to impart public service messaging concerning maternal and child health, nutrition, HIV/AIDS, family planning, women's rights, and sexual relationships.
- **Augment women's rights.** In the Western Sahel, much can be accomplished by protecting girls and women from multiple forms of discrimination and violence, and by expanding their rights in marriage. This effort begins by enforcing current national laws that already prohibit all forms of female genital cutting, that outlaw forced marriages, and prohibit marriage before the age of eighteen years. Once married, the region's women should deserve the rights to initiate divorce, obtain recourse against violence, and secure custodianship over their children in case of marital separation, divorce, or the death of their spouse. Women should have the right to legal recourse and equal treatment in state-run family courts of law, rather than being limited to the judgments of religious and traditional courts, which have generally failed to protect women and children from physical, psychological, and economic harm. Where political resistance has rolled back legislative efforts to augment women's rights (as it has been the case in Mali), government support and endorsement of women's legal, professional, cooperative, and educational societies may offer alternative routes for many Sahelian women to achieve greater autonomy and attain leadership positions.
- **Bring services to marginalized minorities.** Health and education ministries should ensure that significant programmatic efforts in girls' education, voluntary family planning, and women's rights be distributed, in some

form, among marginalized minorities—no matter how geographically or culturally isolated these minorities might be. Prior experiences in other regions suggest that regional, socioeconomic, ethnic, or caste fertility disparities later develop into hard-to-overcome social and economic inequalities that generate political tensions and exacerbate animosities.

- **Promote women-centered efforts in all agricultural, economic, and infrastructural development projects.**

All government, private, and donor-supported projects should contain components that facilitate extending girls' educational attainment and/or quality of education, improve access to reproductive health services, and promote women's rights and their economic autonomy. No donor-supported project should facilitate the efforts of governments, political parties, or traditional and religious leaders to impede women's progress in any sector of development.

- **Manage resource-related tensions between farming and pastoralism.** In a more-populous Western Sahel, the future of agricultural and pastoral livelihoods will depend on the development of ground-water irrigation and intensified agropastoralism (a

more deliberate integration of agricultural and grazing uses of land), as well as their relation to urban markets. In this more-populous future, the region's governments should consider enforcing schemes that restrict absentee rangeland users, protect rangelands from further agricultural encroachment, and help pastoralists deter cattle rustling. Meanwhile, governments in the Western Sahel should continue to develop industries that add value to agricultural and livestock products, promote cooperation between farmers and pastoralists, and develop more efficient transport to urban markets.

- **Protect development gains with investments in local security.** In an environment of rapidly spreading jihadist conflict, geographic pockets of progressive local leadership and popular support for girls' education and other women-centered programs could become

primary targets of militants. Affected communities and their leaders deserve special protection provided by police or anti-terrorist units.

INTRODUCTION

The Western Sahel, the vast swath of arid land in sub-Saharan Africa that stretches from the Atlantic shores of Senegal to the eastern confines of Chad, the most landlocked part of the continent, is confronting a confluence of mutually reinforcing crises, including extreme poverty and childhood malnutrition, rising food insecurity, detrimental agro-ecological and climatic shifts, and a rapidly growing Islamist-led insurgency that has already displaced more than two million people. At the core of this whirlpool of adversity lies a demographic crisis—a crisis so fundamental that it is unlikely that much social, economic, or political progress in the Western Sahel can be achieved and sustained without directly addressing it. Yet the core elements of this crisis—high rates of adolescent childbearing, large desired-family sizes, a very limited degree of autonomy among women, and their inextricable linkages to sustained high fertility as well as the rapid growth of an underserved and underemployed cohort of young Sahelians—are rarely brought up by the region’s political leaders. The principal goal of this report is to facilitate and inform a broader discussion, in the region itself and beyond, of the Western Sahel’s ongoing demographic stress.

The populations of the Western Sahel, including six francophone countries plus the twelve northern sharia states of Nigeria (see fig. 1), rank among the world’s most youthful and rapidly growing. Dozens of other poorly developed states around the world—first in East Asia beginning in the mid-1960s, then in turn in the Caribbean and Latin America, in South Asia, North Africa, southern Africa, and most recently in parts of eastern Africa—implemented sequences of progressive policies and programs that while respecting human rights, successfully reversed conditions sustaining high rates of childbearing. In contrast, those in the Western Sahel remain in the early stages of their eventual transition to a lower total fertility rate (an estimate of the average lifetime number of children born per woman).

The states of the Western Sahel, too, must navigate this critical transition. Yet it will not be easy. Whereas recent efforts to lengthen girls’ education and improve access to family planning have produced initially promising results in several Sahelian states, the region’s chronic deficiency of women’s autonomy and rights, its shortage of strong, visionary political leadership, and its escalating Islamist insurgency impose formidable impediments to a transition to a small-family norm.

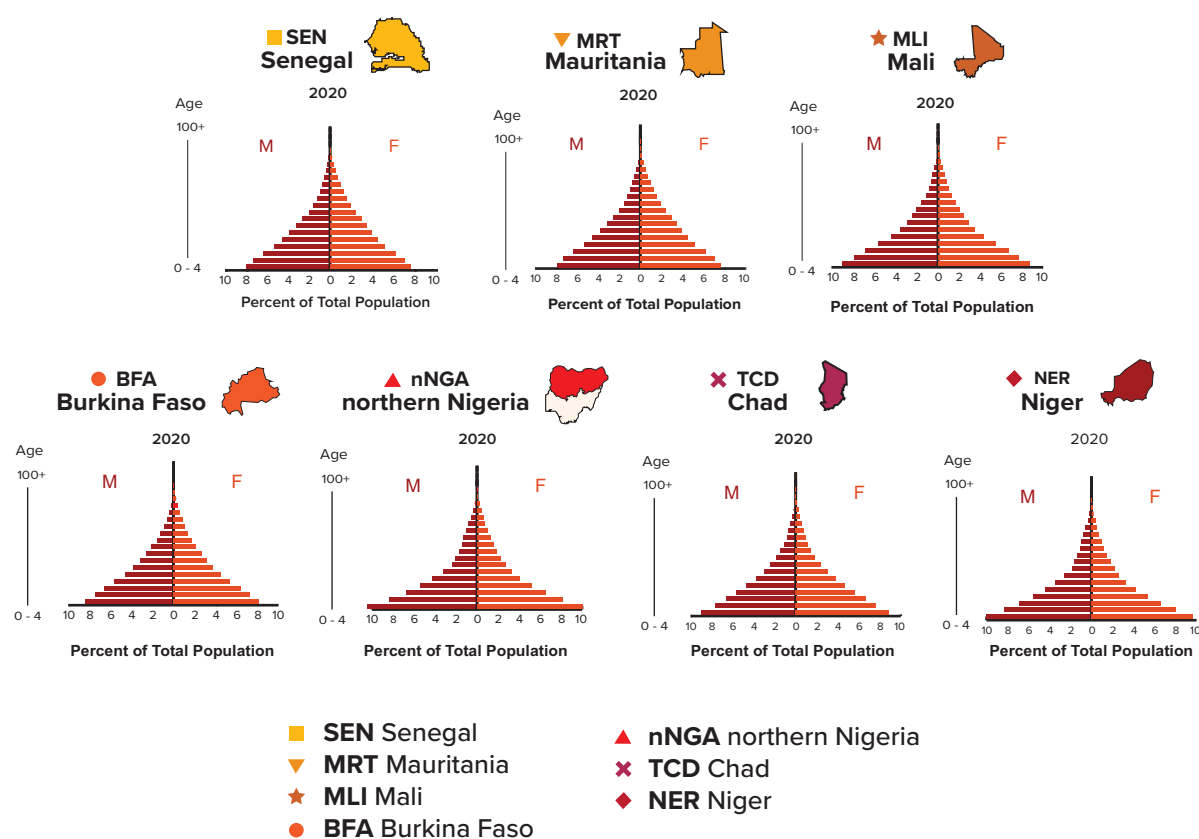
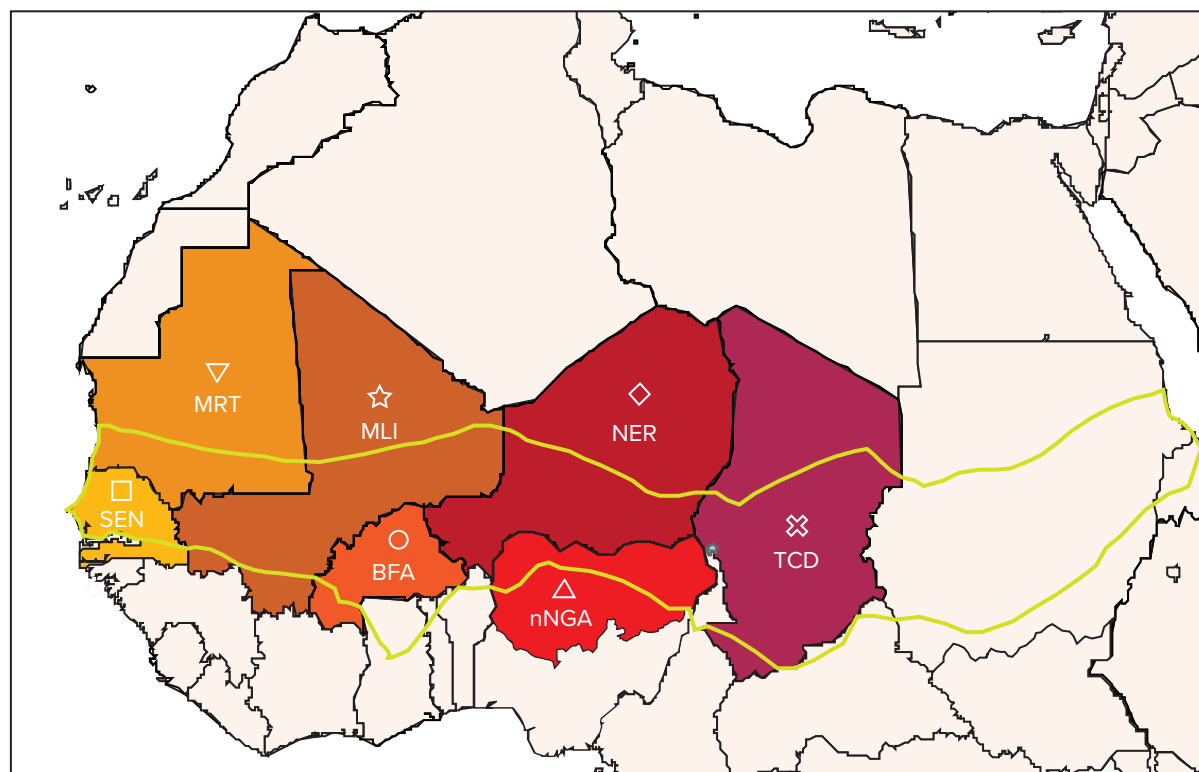
A review of the available research suggests that absent urgent, well-funded, and sustained action, the legitimacy and security of the Western Sahel’s states are almost certain to continue to be undermined by their demographic challenges, exacerbating tensions between ethnic and livelihood communities, and fueling the further proliferation of “theocratic populism.”¹

The enduring upheaval in the region continues to jeopardize hard-won development progress in the Sahel, and its spillover effects also threaten to destabilize the Maghreb (to the north) as well as coastal West Africa (to the south), and to heighten migratory challenges and security risks not only for these adjacent regions, but also for Europe and the United States. Among this report’s strongest recommendations is a focused international effort to produce one or two countrywide family planning successes—perhaps in Senegal and in Burkina Faso, and possibly in Mauritania—that provide exemplars of best practices, a pool of local expertise, and models of community participation, public health communication, and government support that could be replicated elsewhere.

This report, which is an effort of the Scowcroft Center’s Foresight, Strategy, and Risks Initiative, sketches three scenarios for the region between 2040 and 2045: a baseline scenario (“More of the Same”) of partial achievement and partial failure premised on current demographic trends and haphazard international involvement; second, a best-case scenario (“Breakthrough”) predicated on strong national and international support for a sustained development effort that includes policies and amply funded programs that facilitate rapid fertility decline and dramatically boost the levels of educational and health-related investments per child in several key countries in the Western Sahel; and third, a worst-case scenario (“Downward Spiral”) combining persistently high fertility rates and the continued marginalization of young people and women, with Western disengagement and pro-jihadist interference from outside the region.

The first chapter of this report lays out the present political and economic conditions in the Western Sahel. The second considers the elements of the region’s demographic crisis. The third, its future as a more populous, more urban region. The fourth, by way of best practices, adduces examples of states that have extricated themselves from similar crisis conditions. The fifth chapter is dedicated to the three scenarios. The report’s concluding chapter provides a summary and outlines a set of policy and program recommendations.

FIGURE 1. The Western Sahel and Sahel Climate Zone



Source: UNDESA/ Population Division, 2019; National Bureau of Statistics (Nigeria), 2017, author's model.

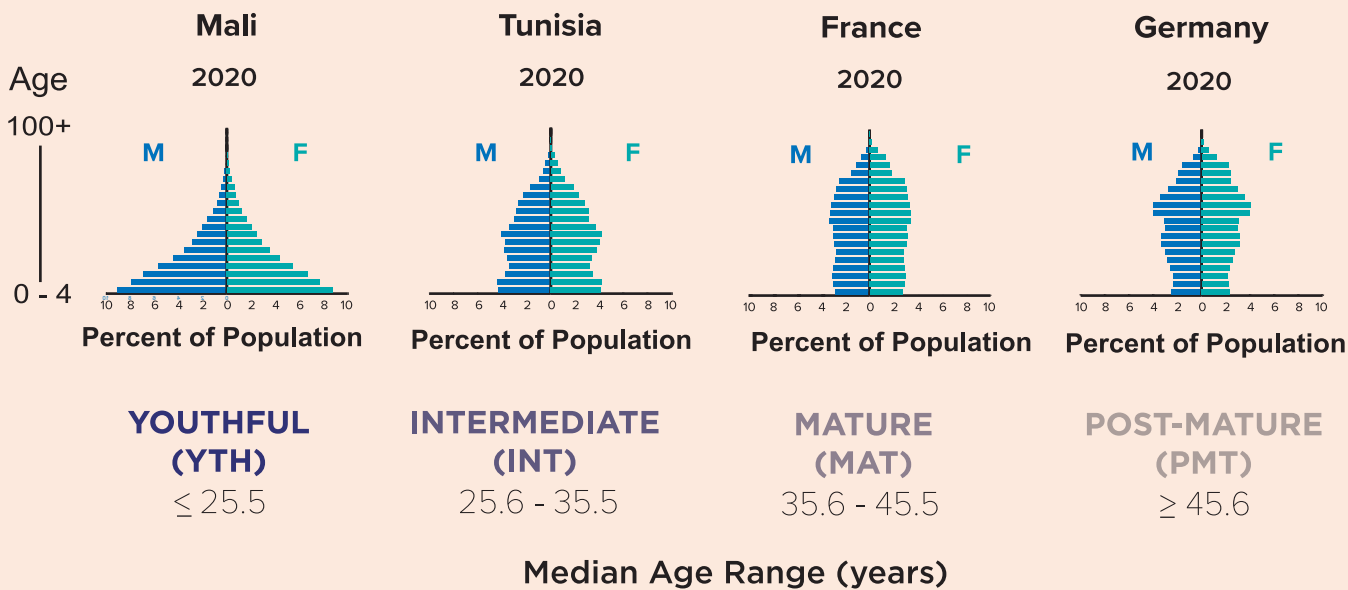
POPULATION AGE STRUCTURE: A PRIMER

In this report, the sequential shift in population age structure (the distribution by age) is measured by median age (the age of the person for whom half of the population is younger) and categorized using a schema adopted by the US National Intelligence Council in its Global Trends series of publications. To facilitate mapping and simplify analysis, the Global Trends schema divides the age-structural transition into four phases (fig. 2): youthful, intermediate, mature, and postmature.²

Whereas their explanatory narratives often differ, there is a broad consensus among political and economic demographers that a persistently youthful age structure constrains the most fundamental indicators

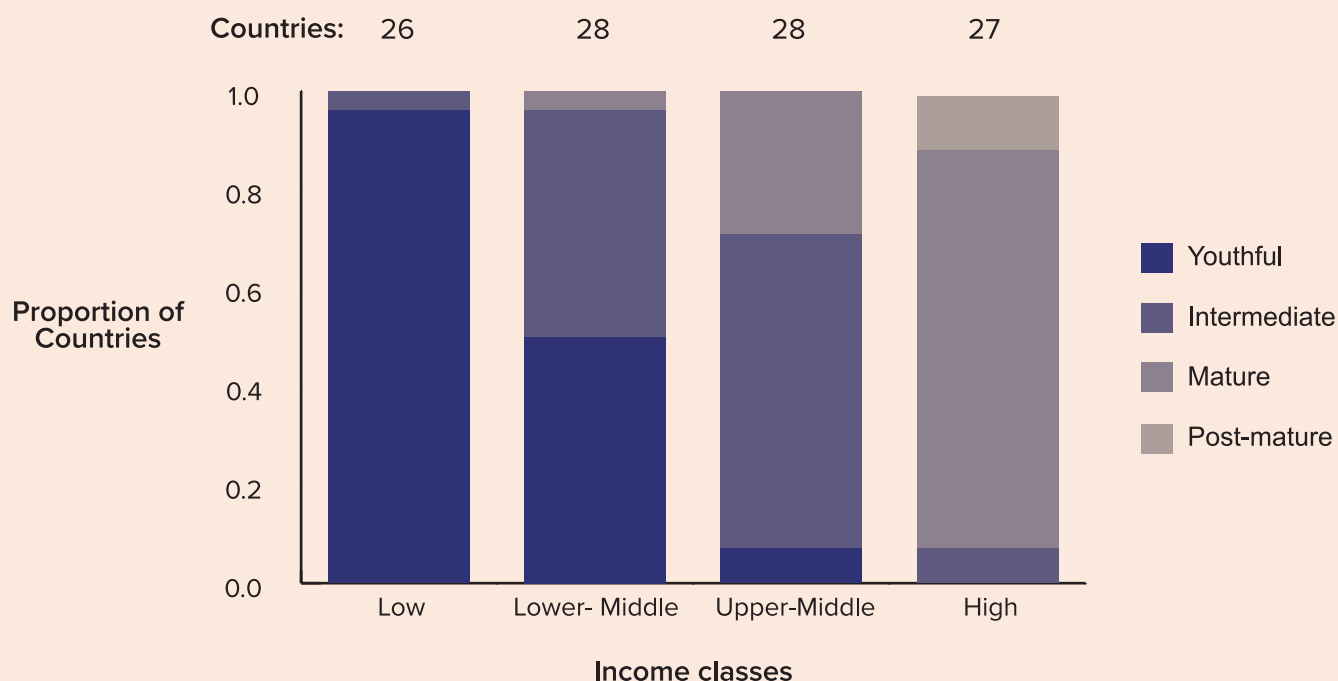
of development. The rare exceptions are among states with a resource-rich economy, and among those with fewer than five million residents—referred to, in this report, as the least populous states, many of which are small island states and coastal outposts, benefiting from tourism, remittances, and/or a lucrative port facility.³ If this relationship holds true in the future, until the world’s remaining youthful countries shift to the intermediate phase of the age-structural transition, they face a low probability of entering the World Bank’s upper-middle income category (fig. 3),⁴ or achieving correspondingly high levels of child survival and educational attainment.

FIGURE 2. Phases of the Age Structural Transition



Each bar in a population profile represents the proportion of the total population in a five-year group (males on left, females on right; infants at the bottom, the most elderly at the top).
Source: UNDESA/ Population Division, 2019.

FIGURE 3. Age Structure and Income Class, 2018



World Bank income classification for countries with a population greater than five million residents. States with oil and/or mineral rents that are regularly greater than 15 percent of gross domestic product (GDP) are omitted.

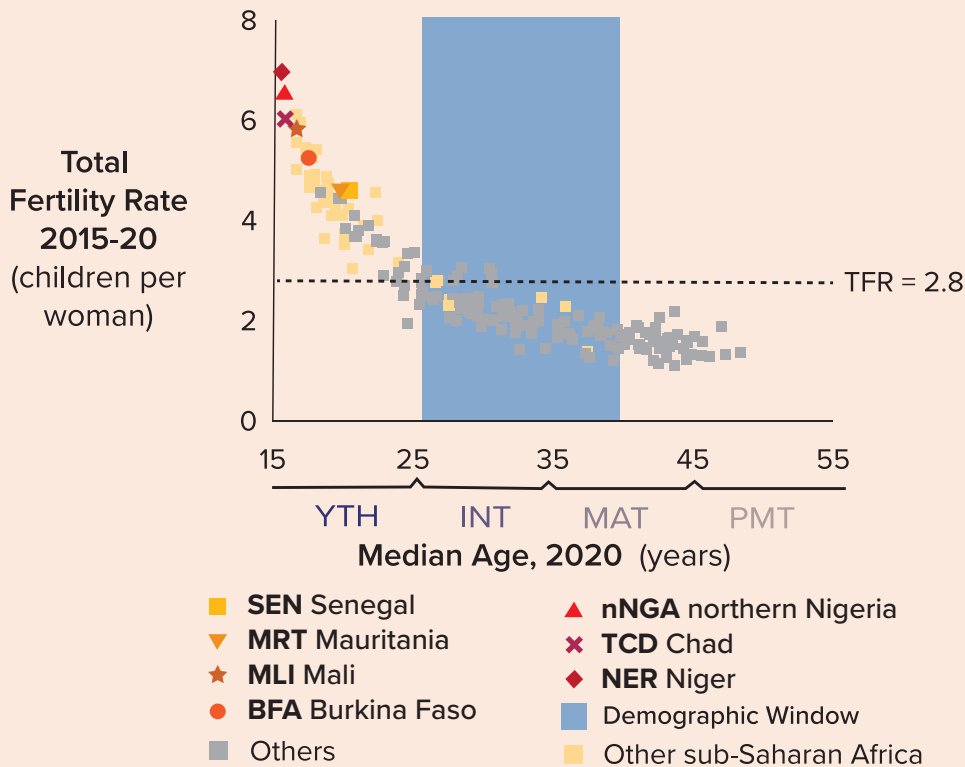
Source: World Bank/WDI, 2020; UNDESA/ Population Division, 2019.

Graphics in this report also note the position of the demographic window, a portion of the age-structural transition whose beginning coincides with the onset of the intermediate phase. First described in 2004 by the UN Population Division as the “demographic window of opportunity,” this portion of the age-structural transition encompasses a period during which countries are in a position to benefit from a series of favorably distributed age structures, collectively known as the demographic dividend.⁵

Cross-national analyses indicate that the demographic window represents a portion of the age-structural transition stage in which states, free of the myriad constraints associated with youthful populations, tend to achieve higher levels of development. Nearly

85 percent of all countries that have traversed a significant portion of the age-structural transition have attained the World Bank’s upper-middle income class only after entering the demographic window.⁶ Generally, these favorable conditions are first reached at a median age around 25 to 26 years, peak just beyond a median age of 30 years, and then fade when the age structure surpasses a median age of about 40 years.⁷ To ultimately attain that window requires a decline in the total fertility rate to or below 2.8 children per woman (fig. 4).⁸ In chronological time, passage through the demographic window usually takes from three to five decades.

FIGURE 4. Fertility in the Demographic Window

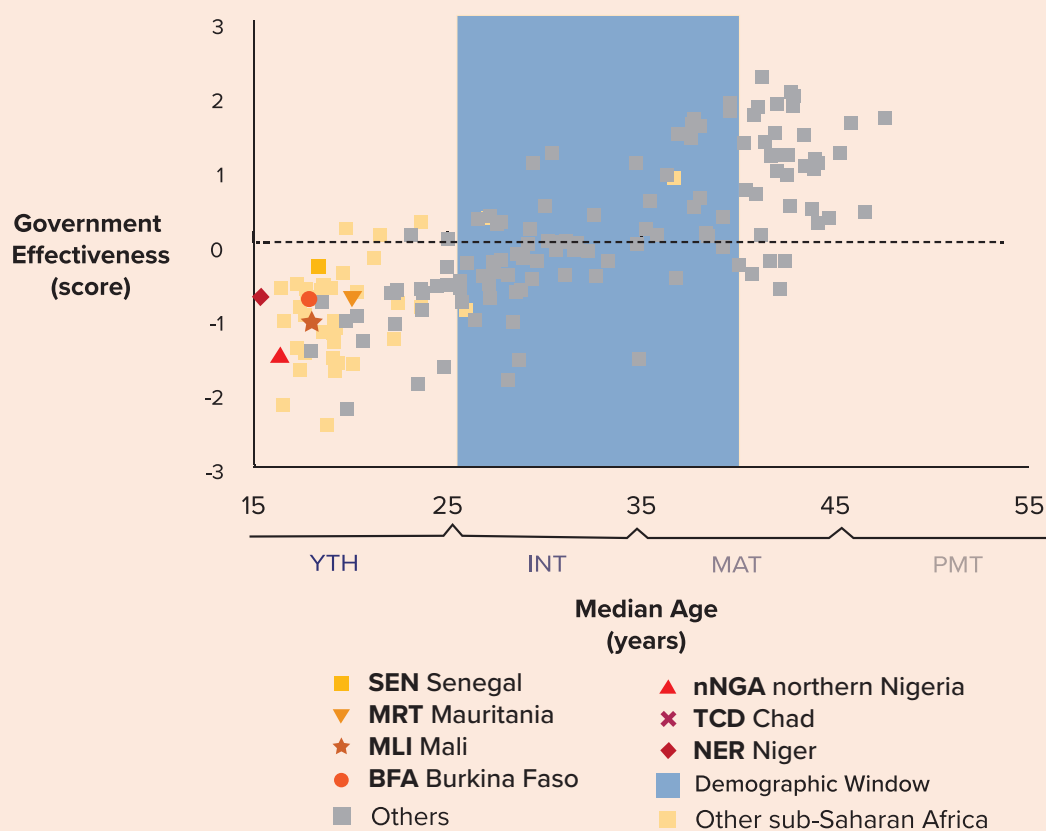


Source: UNDESA/Population Division, 2019.

Advancement through the age-structural transition's phases is associated with political development, as well. Among youthful countries with a population greater than five million, the advent of liberal democracy—measured as Free rather than Not Free in Freedom House's annual assessment—is a low-probability event. In fact, revolts meant to overthrow autocrats in youthful countries generally end with an autocrat in power. When the Free rating has been achieved in a persistently youthful country (as it was previously in Mali and Senegal), the liberal regime tends to grow vulnerable to backsliding or being deposed (Ghana, in coastal West Africa, remains a rare exception). Among the least populous states, liberal regimes in youthful countries are statistically more stable than those in more populous countries.⁹

Data from the World Bank's World Governance Indicators Database show that youthful countries are generally scored lowest in government effectiveness—a measure of the quality of public services and policy implementation (fig. 5).¹⁰ It is not surprising. Education and health services are in high demand, while a relatively narrow productive tax base of working-age adults means that service-providing institutions will be poorly funded and chronically short of adequately trained personnel (human capital) and equipment.¹¹ Moreover, youthful countries are more vulnerable to internal conflict than those in the demographic window or beyond (see box 2), and are, thus, less attractive to foreign investment.

FIGURE 5. Age Structure and Government Effectiveness, 2018



Source: UNDESA/Population Division, 2019; World Bank, 2020.

CHAPTER 1

THE WESTERN SAHEL

Historically, the Western Sahel has been the contact zone between North Africa—Dār al-Islam, since the Arab invasions of the seventh century—and coastal West Africa to which access remained limited until the invention, in the fifteenth century, of the caravel, a lateen-rigged ship capable of sailing against the trade winds that permanently blow east-to-west along the continent's western seaboard. Expansive Sahelian kingdoms arose between 800 and 1600 CE, building their fortune on a quasi-monopoly of the trans-Saharan trade, including the slave trade. Subsequently, these kingdoms were challenged by new coastal states thriving on their rapidly intensifying exchanges with Europe thanks to supply stations, trading posts, and slave ports that sprang up along West Africa's shoreline. In the wake of traders came explorers, Christian missionaries, empire

builders, and eventually colonialism. By the late nineteenth century, the gravitational center of commerce and power had shifted from the Western Sahel to coastal West Africa.

Having achieved independence from France or, in the case of Nigeria, from the United Kingdom in 1960, the states of the region have since been governed by a varied array of political regimes. For several decades, military dictatorships and civilian one-party rule dominated the region's political sphere. Since the early 1990s, most have been replaced by multiparty, less-than-liberal electoral democracies. During this latter period, political researchers recognized two electoral regimes as liberal democracies: one in Mali, until a civil war and coup in 2012; and another in Senegal, until 2019, when its regime status was reassessed and listed at a marginally lower rating in some databases.¹²

Through it all, the populations of the six Western Sahelian states have grown remarkably, from less than 21 million in 1960 to more than 103 million today. Similarly, the northern sharia law states of Nigeria, which probably supported around 18 million people in the early 1960s, are today populated by about 78 million inhabitants—comprising nearly 40 percent of Nigeria's total population.¹³ Each of the Sahelian states, as well as northern Nigeria, continue to experience rapid rates of population growth and retain an extremely youthful age structure (discussed in further detail later in this report).

A Complex Insurgency

Over the past decade, the Western Sahel has become the epicenter of an extremely rapidly growing Islamist-led insurgency. The regional toll from violence unleashed by al-Qaeda and Islamic State of Iraq and al-Sham (ISIS) affiliates has risen from about four hundred deadly incidents in 2010 to just under five thousand in 2019 (fig. 6).¹⁴ Jihadism in the Western Sahel has not been contained despite sustained efforts including the French military intervention that began in January 2013; the deployment of some fifteen thousand United Nations (UN) blue helmets in Mali;¹⁵ the creation of a regional military alliance known as the G5 Sahel,¹⁶ involving Mauritania, Mali, Burkina Faso, Niger, and Chad, and ultimately meant to replace these foreign contingents; and the pooling of military resources among the Lake Chad Basin states,¹⁷ targeted at fighting Boko Haram (a self-declared ISIS affiliate). To the contrary, the effective reach of state governance has receded from vast rural sections of the region, the threat of violence has gained momentum, and the hardship among civilians has been amplified.¹⁸ In January 2021, according to the UN Agency for Refugees (UNHCR), the number of internally displaced people in Mali, Burkina Faso, Niger, and Chad alone, had risen to more than two million, in addition to some 850 thousand refugees originating from these four countries.¹⁹

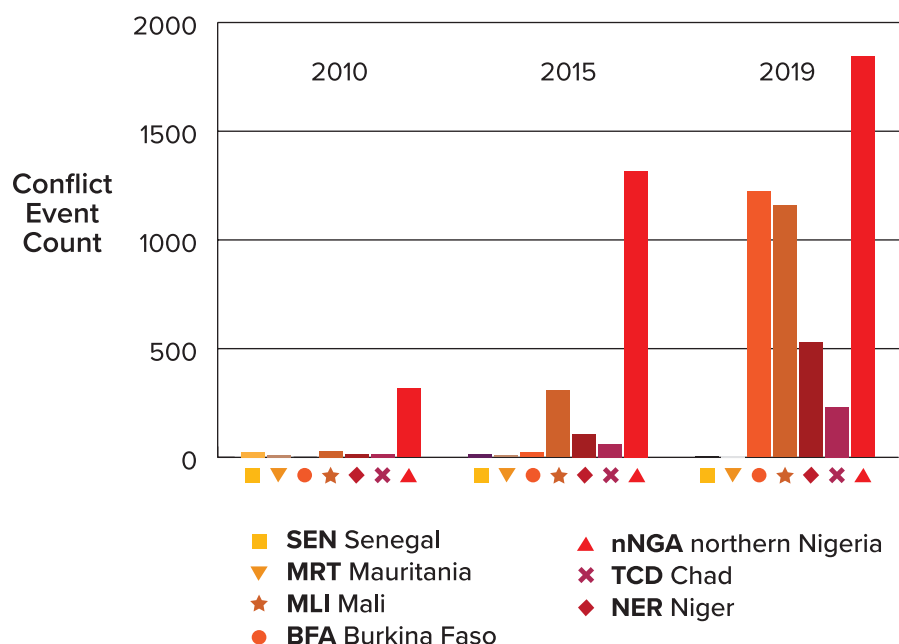
The outside perception of a global jihadist threat emanating from the Western Sahel has been blurred on the ground by theocratic populism, in this case, militant Islamic populism. Across the region's inland states,

jihadist forces are tipping the balance in local conflicts between ethnic groups, rival clans, pastoralists, and farmers. Land tenure disputes, intergenerational grievances, cattle rustling, cigarette and drug smuggling, as well as human trafficking all have rendered additional complexity to the pattern of communal violence. In parallel, the reputations of the most beleaguered regimes in the Western Sahel have been stained by frequent allegations of abuses of power, corruption, and civilian deaths at the hands of security forces and state-aligned militias.²⁰ Where state power has receded from large parts of the country, such as in Mali, infighting between ISIS and al-Qaeda affiliates is already underway. The emergence of rival jihadist caliphates can no longer be ruled out as the next whorl of this downward spiral.

Measured by their demographic characteristics, the Western Sahel and northern Nigeria hardly differ from the youthful societies of postcolonial states in Southeast Asia, from the 1950s through the 1970s, and Latin America, from the 1960s through the 1980s—the peaks of their Marxist-led insurgencies. In each case, a youthful age structure and rapid population growth coincided with the narrowing of opportunities in the traditional agricultural sector, an outpouring of rural youth into urban slums and abroad, an insufficiency of urban employment alternatives, and the failures of successive regimes to manage this volatile confluence of conditions.

However, the analogy ends here. Marxist insurgents demanded equity over the course of modern economic development for traditional farmers and workers, as well as for women. In contrast, the Western Sahel's jihadists regard that same course of development as un-Islamic. As a means to deter “Westernization,” these insurgents actively support, strengthen, and expand patriarchal institutions—including adolescent marriage, female genital cutting, and polygamy—while suppressing secular education, limiting women's autonomy, and encouraging high rates of childbearing. Thus, the persistence of al-Qaeda and ISIS affiliates in the Western Sahel affords jihadists the ability to circumscribe the activities of women and intimidate local leaders, teachers, parents, and students—a situation similar to the role played by ISIS in the Middle East and the Taliban in Afghanistan.

FIGURE 6. Violence Linked to Militant Islamic Groups



Source: Armed Conflict Location & Event Data Project (ACLED), 2020.

AGE STRUCTURE AND INTRASTATE CONFLICT

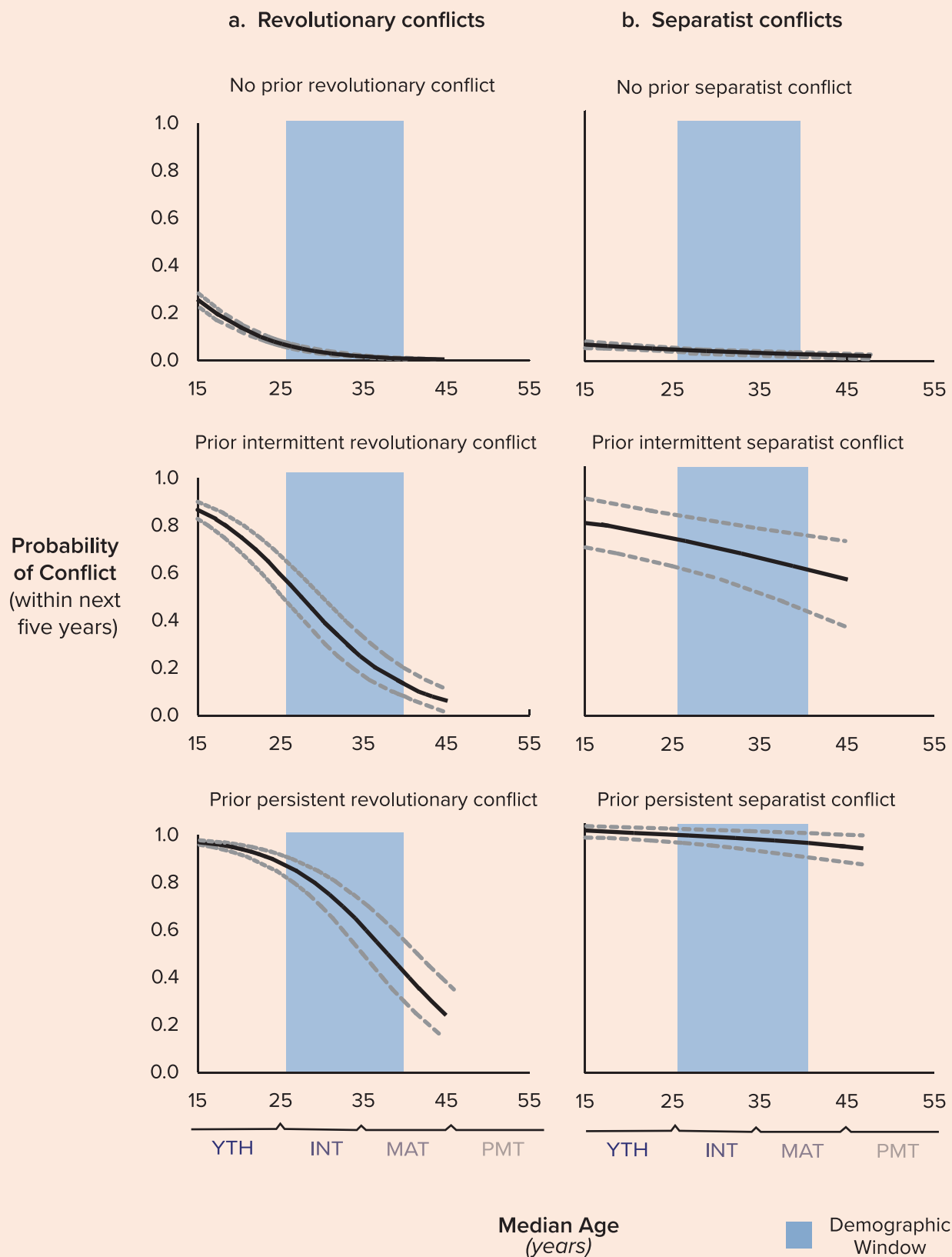
No security theory resonates more deeply with conditions in the Western Sahel than the youth bulge theory, which splices together two well-worn conceptual relationships: (a) the relationship between a youthful age structure and high levels of entry-level job competition as well as youth unemployment (known as Easterlin's hypothesis);²¹ and (b) the ease at which young men, lacking opportunities and/or seeking peer approval, are recruited into opposition forces, the state security sector, or ethnic militias (Möller's hypothesis).²² First proposed more than a half-century ago, the theory's proponents have demonstrated that youthful countries are statistically more vulnerable to experiencing an armed intrastate conflict than their more mature neighbors.²³

Conflict history and conflict type are instrumental in this demographic relationship. Youthful countries in conflict tend to remain in conflict. More mature age structures are associated with lower risks. In the case of ongoing revolutionary conflicts (nonterritorial intrastate conflicts) reaching the demographic window initiates steep declines in the risk of continued conflict.

Ongoing separatist conflicts (territorial intrastate conflicts) are somewhat less sensitive to similar advances in the median age²⁴ (fig. 7).²⁵

Population size can also be important. The least populous countries (fewer than five million residents) are consistently less vulnerable to a new outbreak of revolutionary conflict than more populous youthful countries. In more advanced phases of the age-structural transition, revolutionary and separatist conflicts are virtually absent from the least populous countries.

What do these demographic models predict for the future of intrastate conflict in the Western Sahel? For the persistent and intermittent conflicts in the region's inland states and northern Nigeria, they indicate that these conflicts have a high probability of continuing as long as age structures remain youthful. If the Western Sahel performs like other developing regions, an age-structural shift into the demographic window should reduce the risk of continued intrastate conflict, whether revolutionary or separatist.

FIGURE 7. Age Structure and Armed Intrastate Conflict

The graphs statistically portray the five-year risk trends for (a) revolutionary and (b) separatist conflicts. For each, three conflict-history types are shown based upon their past four-year history: no prior conflict (zero conflict years); prior intermittent conflict (one or two conflict years); and prior persistent conflict (three or four conflict years).

Source: UCDP/PRIO Armed Conflict Dataset, 2019; UNDESA/Population Division, 2019.

An Uphill Struggle to Develop

Since 2010, the region's proliferating jihadist insurgency, the resultant human displacement, and rising radicalization have prompted Western donors to increase aid levels, setting a new premium for the region.²⁶ In order to provide a development-focused response to the challenges facing the G5 Sahel member countries, the Sahel Alliance was founded by development agencies within the European Union (EU) in 2017. Now at eleven members, the agency coordinates development assistance to the region from bilateral, international, and private-foundation sources.

Despite annual official development assistance (ODA) expenditures of about US \$2.3 billion (the average for 2012-2018) to the six Western Sahelian states in development and humanitarian assistance,²⁷ widespread nutritional inadequacies and deficiencies in public goods and basic infrastructure have proved sadly persistent across the region. At least 85 percent of the local population subsists on the equivalent of US\$5 per day or less.²⁸ Childhood stunting—a signpost of pervasive poverty—is observed in more than 35 percent of children under five years old in Niger and Chad.

Only Senegal has reduced this proportion to a level below 20 percent.²⁹

Nonetheless, the region's governments and the donor community can point to glimmerings of progress over the past two decades. Since 2000, growth in purchasing power parity-adjusted per-capita income, while slow and erratic, has been generally positive and on par with most of coastal West Africa.³⁰ Primary school enrollments have risen to just above 70 percent in all but Niger, Mali, and Nigeria, where growth in that indicator, disrupted in zones of conflict, has stalled between 60 and 65 percent.³¹ Promisingly, rates of under-age-five mortality (childhood mortality) across the six Western Sahelian states and northern Nigeria have declined to about one-quarter of the region's rate in 1960, when about one in three children died before the age of five. Yet, in Chad and Mali, still one in ten children die before age five—unacceptably high levels when compared to nearby North Africa, where childhood mortality ranges between one in forty and one in sixty (in contrast, European countries average around one childhood death in 350 births).³²

CHAPTER 2

ELEMENTS OF A DEMOGRAPHIC CRISIS

Public health analysts had expected recent positive trends in child survival to accelerate the region's hitherto slow pace of fertility decline. It hasn't happened. As elsewhere in sub-Saharan Africa, the effect of child survival on childbearing, while not negligible, has varied, while recent economic gains in the Western Sahel have yet to translate into measurable declines in either women's or men's preferences for large families. The following chapter reviews the region's fertility trends and current projections, as well as the region's nascent and ongoing policy and programmatic responses. The latter part of this chapter discusses the implications of the region's persistent youthfulness, and the potential magnitude of its population's rapid and prolonged growth.

A Reluctant Fertility Decline

Successive US Agency for International Development-funded Demographic and Health Surveys (DHS) indicate that, unlike most eastern

African countries or residual high-fertility populations of Asia, women's desired family size in the Western Sahel remains exceptionally high—on average, even higher than current levels of fertility. Moreover, among married women, the proportion using modern contraception ranges from very low—between 5 and 10 percent in Chad and northern Nigeria—to moderately low, with levels rising to near 20 percent in Mali, Mauritania, and Niger, and approaching moderate levels in Senegal and Burkina Faso, around 25 and 30 percent, respectively (contraceptive use rates of 55 to 65 percent are typically considered high). Whereas demand for modern contraceptives in Senegal and Burkina Faso climbed rapidly over the past decade, the trend has recently flattened.³³

For women's health, the patterns of childbearing in the Western Sahel are among the riskiest. Niger, Mali, and Chad currently retain the world's highest levels of adolescent childbearing (births per woman, aged 15 to 19 years) and—along with Mauritania, Nigeria, Senegal, and Chad—rank among the highest rates of

childbearing for middle-aged women (aged 40 years and older) (fig. 8).³⁴ In Chad, which currently reports the world's highest maternal risk, one in fifteen women can expect to die from causes related to pregnancy or childbearing (in Europe, maternal risk is universally below one in three thousand). Only in Burkina Faso (one in fifty-seven) and Senegal (one in sixty-five) has maternal risk been reduced below the sub-Saharan average (one in thirty-eight).³⁵

Despite the risks involved in childbearing, total fertility rates in the region have stayed high and only in Senegal and Mauritania have the respective rates declined slightly below the level of five children per woman (fig. 9).³⁶ The frequency of childbearing remains highest in Niger and northern Nigeria, where total fertility is currently estimated at above 6.5 children per woman—a level reflecting persistent preferences for large families and adolescent marriages among Hausa-, Fulani-, and Kanuri-speaking households.³⁷

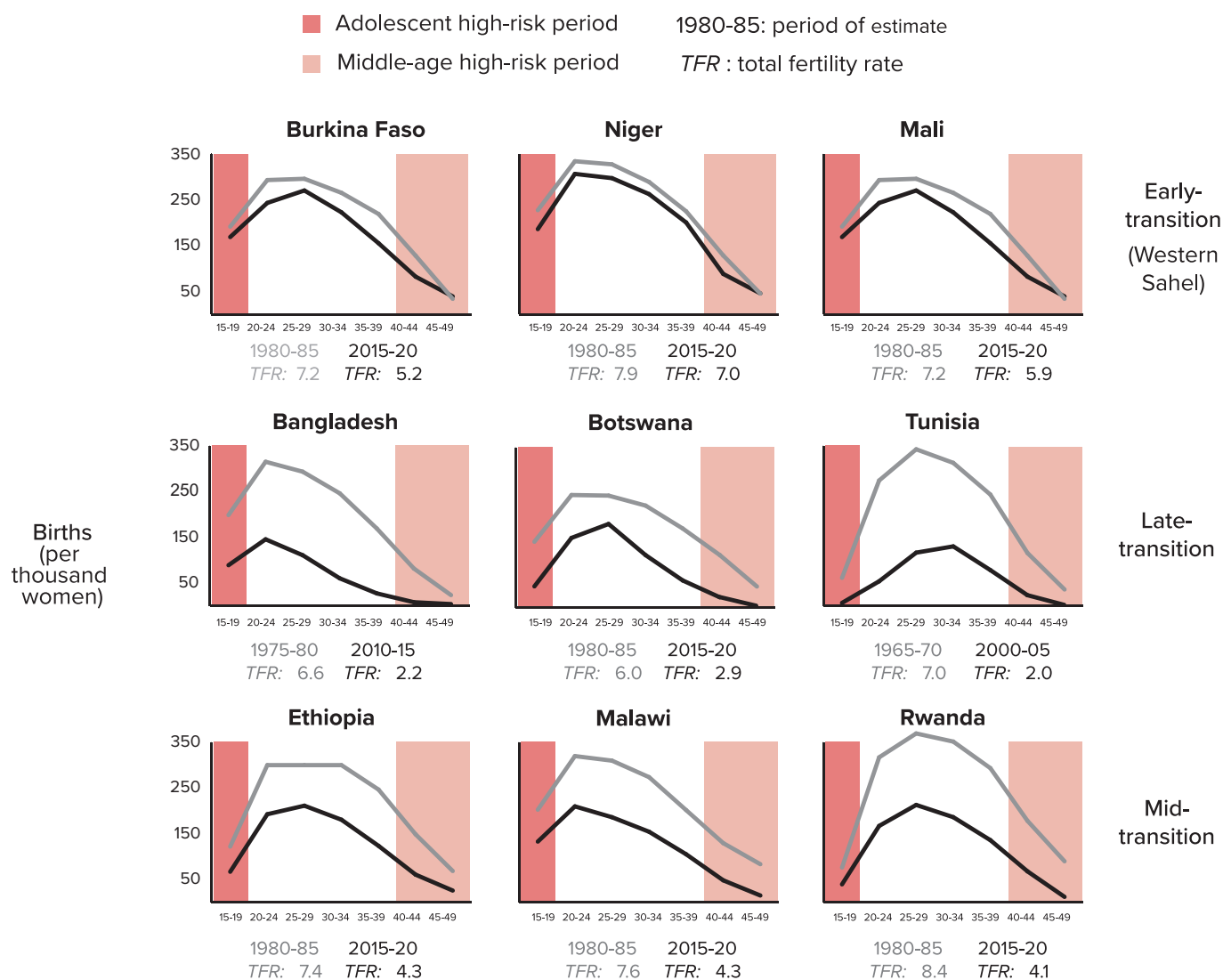
The UN Population Division's medium-fertility projection—the middle path among a multitude of previously traversed country trajectories—provides a statistical best-guess scenario for the region's demographic future. In the UN's latest revision of its data series, its medium-fertility projection assumes that, by the 2040-2045 period, today's high rates of fertility will decline to levels between 3.4 and 3.8 children per woman in all Western Sahelian countries except

for Niger, where UN demographers foresee total fertility at about 4.7 children per woman.³⁸ Notably, this fertility scenario resembles the gradually declining path traversed, over the past two-and-a-half decades, by a cluster of states in eastern Africa (as discussed in Chapter 4; also see figs. 8 and 9).

For the Western Sahel, demographers tend to view the fertility declines assumed by the UN's medium-fertility projection with cautious optimism. On the one hand, there is evidence that some of these declines are, indeed, in motion. In fact, recent trends in contraceptive use in several states, Senegal and Burkina Faso among them, suggest those states might achieve an even faster fertility decline than the UN's assumed Kenya-like medium-fertility projection.

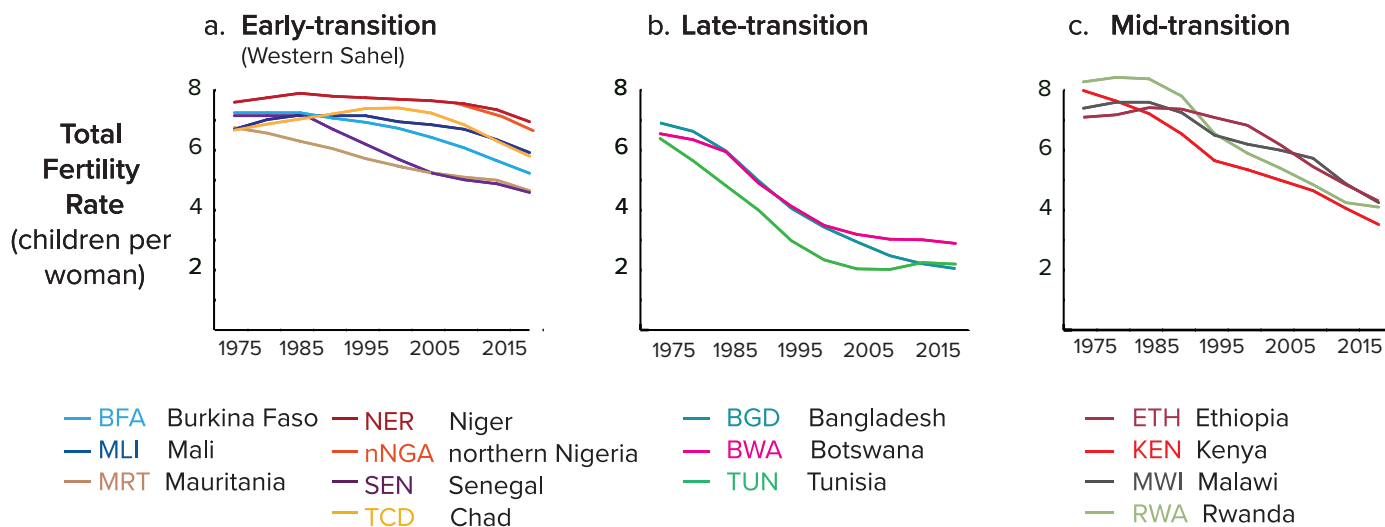
On the other hand, the UN's medium-fertility projection has consistently been overly optimistic for the Western Sahel—a characteristic that women's advocates attribute to Sahelian women's limited autonomy and their lack of life options. In fact, looking retrospectively at the Population Division's projections made twenty and twenty-five years ago, the same period for which this report looks forward, paints a rather bleak picture. By 2020, no country in the Western Sahel had yet declined to the total fertility rate previously assumed by even the UN's 1996 high-fertility projection. Likewise, the 1996 high-fertility projection for Nigeria turned out to be overly optimistic.

FIGURE 8. Patterns of Childbearing



In each graph, the recent and past patterns of age-specific fertility are separated by thirty-five years. Source: Data: UNDESA/ Population Division, 2019.

FIGURE 9. Comparing Fertility Trends



Source: Data: UNDESA/ Population Division, 2019; northern Nigeria's 2016 TFR is estimated using data published by the National Bureau of Statistics (Nigeria), 2017, and Nigeria Demographic and Health Surveys, 2018.

For the people of the Western Sahel, their states, and the states in neighboring regions, the repetition of this demographic history would likely have unfortunate consequences. In the coming decade, the region's demographic future and, therefore, its development future, hang in the balance.

Policy and Program Responses

Unfortunately, the policies and programs facilitating the moderately paced fertility decline in eastern Africa do not currently garner the same degree of political and administrative support in the Western Sahel. In fact, the gap is substantial and can be visualized by graphing two separate aspects of social development (fig. 10).³⁹ The first aspect, girls' educational attainment, has positive effects on child nutrition and survival, and is strongly associated with delayed pregnancy, higher levels of demand for contraception, and ultimately the shift to a small-family norm. The second aspect, a measure called the family planning effort score, was developed to provide an integrated assessment of the quality, accessibility, affordability, and administrative competence of voluntary family planning programs, which are associated with use of contraception for both spacing and limiting births, and continuity of use.⁴⁰ This graphic makes an important point. Despite recent progress in several states of the Western Sahel, as a group, they have not sufficiently developed or enforced women-focused policies that might stimulate greater demand for smaller families; nor have they—along with their donor partners—dedicated sufficient funding to build a comparable community-level, technical, and professional reproductive-health workforce or an equally well-funded family planning program infrastructure.

Which deserves higher priority in the Western Sahel? Whereas demographers, public health professionals, and women's health advocates generally recognize the essentiality and complementarity of both dimensions, they rarely agree on priorities. However, there is a broad consensus among the region's public health professionals that, for the Western Sahel, more focused efforts are needed to encourage conditions—including high levels of girls' educational attainment and employment opportunities—that would offer women greater autonomy and economic mobility, and might help shift their preferences to smaller, healthier, better-educated families.

Yet despite the advice of regional professionals and the criticisms of UN agencies, successive governments have, so far, done little to enforce already

existing laws that would reduce adolescent marriages, eliminate female genital cutting, protect women from forced marriages, restrict polygamy, and give women inheritance rights and custody of their own children in case of marital separation or widowhood.⁴¹ Obviously, they fear political blowback. In fact, an effort in Mali, in 2009, to legislate a package of reforms to family law that would enhance women's rights and opportunities was met by large, popular protests organized by the head of the country's High Islamic Council. Despite then-President Amadou Toumani Touré's stated desire to sign the reform bill into law, he returned it to the legislature for revision. Since then, these reforms have not been reconsidered.⁴² Such high levels of organized resistance have convinced some development professionals that, for several states in the Western Sahel, the current path of least resistance may lead through intensive investments in girls' education and financial support for women's health care networks, and progressive legal, professional, educational, and cooperative societies that enhance women's ability to improve their own status and apply continuous pressure for incremental reforms.⁴³

Even with the impressive progress of family planning programs over the past decade, particularly in Burkina Faso, Senegal, and Niger, there is still much to be accomplished in providing reproductive services. Sahelian women's health professionals have advocated for bringing voluntary family planning services and basic reproductive health care directly to the Western Sahel's rural communities and urban peripheries via community health workers and mobile clinics. Similarly, there is a relatively broad consensus among health professionals that family planning workers and volunteers must seek to involve men, including spouses, teachers, and traditional leaders. At the national level, such communications and education efforts typically work to enlist the vocal support of progressive religious leaders, ethnic and national political figures, women's rights advocates, male and female sports and entertainment figures, and respected business leaders.⁴⁴

Attitudes toward reproductive issues began to change among the Sahelian leadership and development donors to the region in 2011 with the founding of the Ouagadougou Partnership, a multi-partner collaboration linking Francophone West African governments, including those in the Sahel, with African public health professionals, civil society organizations, and international public health donors. The partnership has helped increase the availability and staffing of voluntary family planning services in the region and set standards for program evaluation. Until the founding of the Ouagadougou Partnership, even France, the region's

principal education and economic development donor, had not provided direct assistance for sexual and reproductive health as well as voluntary family planning.⁴⁵

Despite such progress, this reproductive cornerstone of development remains underfunded. All of sexual and reproductive health (including HIV/AIDS funding) as well as family planning funding comprises roughly about 6 percent of total annual ODA to the region. Of that, a recent estimate suggests that an annual average (from 2013 to 2017) of around US\$43 million went to family planning in the G5 Sahel states (which, as mentioned above, includes Mauritania, Mali, Burkina Faso, Niger, and Chad). Annual average levels of funding for girls' education in the G5, similarly calculated, was estimated at about US\$375 million.⁴⁶

Yet, even with an increased preference for smaller families and the dedication of public health professionals, non-governmental organizations, and a trained cadre of community providers, the buildup of services may not be enough to guarantee a more rapid fertility transition in the Western Sahel's inland states. Much like conditions that remain in parts of Afghanistan, and among jihadist-influenced pockets of the Middle East, the Western Sahel's ongoing insurgency presents risks to the safety of local health workers and erects formidable barriers to the delivery of reproductive health care and girls' education. Moreover, local radicalization places additional constraints on women's autonomy and their physical safety. Across much of the Western Sahel and northern Nigeria, adequate security will be vital to the successful expansion of reproductive health services.

Ethnic Fertility Gaps

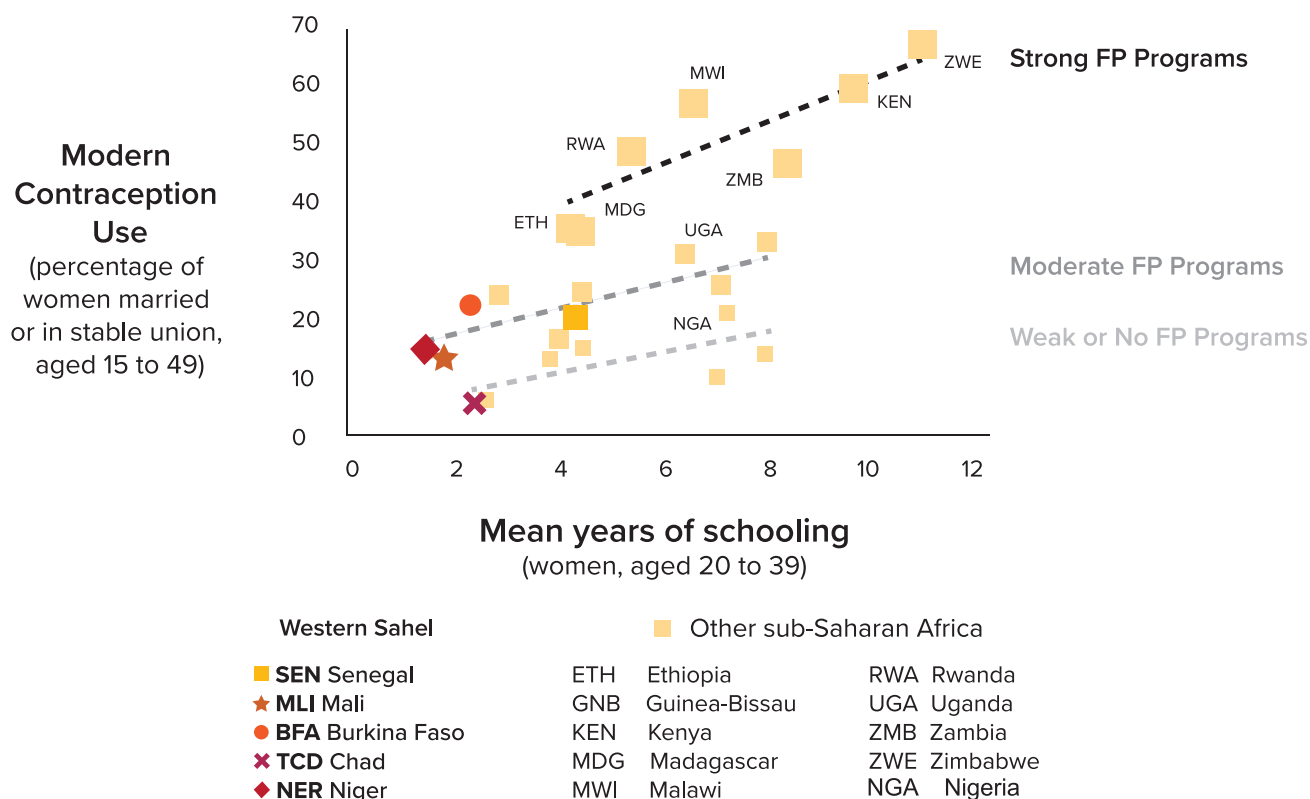
Large differentials in ethnic fertility tend to surface when the most urban, educated, and secular ethnoreligious groups advance first and fastest in their transition to low fertility. This social phenomenon generally exacerbates gaps in maternal and child health, educational attainment, employment, and income, which ultimately lead to differences in ethnic population growth rates and age structures. This set of inequities tends to amplify ethnic tensions, grievances, and political animosities, and becomes difficult for states to manage.⁴⁷ Wide ethno-religious gaps in fertility, growth, and age structure have appeared as precursors of ethnic separatism in numerous multi-ethnic states in the Middle East, Europe, South Asia, and Southeast Asia.

A gap in fertility has opened between Hausa-, Fulani-, and Kanuri-speaking populations in northern Nigeria—in the twelve states where sharia law has been adopted as an official form of statewide jurisprudence—and the collection of ethnic groups in Nigeria's more southerly states. Data from Nigeria's most recent DHS round suggests a total fertility rate of about 6.7 children per woman in the twelve northern Nigerian states. In contrast, fertility has declined to about 4.4 children per woman in the remaining southerly states (including the Abuja capital district), leading some analysts to point to sharia law as a contributor to the widening gaps in fertility and growth. Notably, levels of fertility among Muslim women living in the country's more southerly regions, although higher than their non-Muslim neighbors, have been declining at a pace similar to non-Muslims.⁴⁸

Urban Fertility

If patterns of childbearing in the Western Sahel ultimately follow those now crystalizing in Ethiopia, Rwanda, Malawi, and Kenya, a small-family norm will be approached first in the region's cities. Urban livelihoods are less dependent on child labor than are either farming or pastoralism, and children are typically more expensive to raise and educate, in preparation for an urban livelihood. At the same time, women can forestall childbearing for the possibility of extending education and gaining access to wage labor. Urban services tend to be of higher quality and less distant than rural services. Moreover, ideational notions of the benefits of small families are likely to spread more readily through urban communities, via observation and informal networks, as well as through public health communication efforts.⁴⁹

Nonetheless, as an indication of changing norms, so far, the Western Sahel's urban fertility decline appears relatively modest. The notion of a large family remains appealing among both men and women, even in urban households.⁵⁰ Moreover, while recent surveys indicate that, in general, the use of modern contraception rises among women with high levels of education and wealth — two principal drivers of urban fertility decline—these relationships are, as of yet, not as strong in the Western Sahel as in either eastern or southern Africa. In Nairobi, Johannesburg, and Addis Ababa, the total fertility rate in each urban center has declined near, or even below, the two-child-per-woman average.⁵¹ Senegal, where a recent survey indicated that urban fertility has reached 3.2 children per woman, versus 5.5 in rural areas, is the Western Sahel's most hopeful exception.⁵²

FIGURE 10. Girls' Schooling, Family Planning, and Contraceptive Use, 2018

Employing mean years of schooling as an independent determinant of modern contraceptive use, statistically different relationships become apparent among sub-Saharan African countries with strong, moderate, and weak/no family planning (FP) programs (measured by the family planning program effort index). Modern contraception does not include withdrawal, rhythm, other traditional methods, or induced abortion. Data sources: Wittgenstein Center, 2018; UNDESA/Population Division, 2019; original graph by John Bongaarts and Karen Hardee, "Trends in Contraceptive Prevalence in Sub-Saharan Africa: The Roles of Family Planning Programs and Education," *African Journal of Reproductive Health*, 2019.

A Distant Dividend

Like policy makers in other parts of the continent, those in the Western Sahel have, almost universally, shown great interest in securing the benefits of the so-called demographic dividend (see p. 21-24): the set of favorable age structures that emerge during the demographic window, replacing those that characterize the earlier youthful phase of the age-structural transition. Their interest is statistically well grounded. For states in the demographic window, the odds of attaining the high category of the human development index (HDI, a composite of performance indicators of life expectancy, educational attainment, and per-capita income compiled by the UN Development Programme) are more than thirty times greater than for youthful countries.⁵³

Yet, according to the UN Population Division's current medium-fertility projection, unless fertility declines at a more rapid pace, the majority of countries in the Western Sahel, and most in tropical Africa, are unlikely to enter the demographic window before 2060—four decades or more in the future.⁵⁴ Even if the UN's optimistic low-fertility projection were to be realized across the Western Sahel, only Mauritania and Senegal would reach the demographic window before 2050 (table 1).

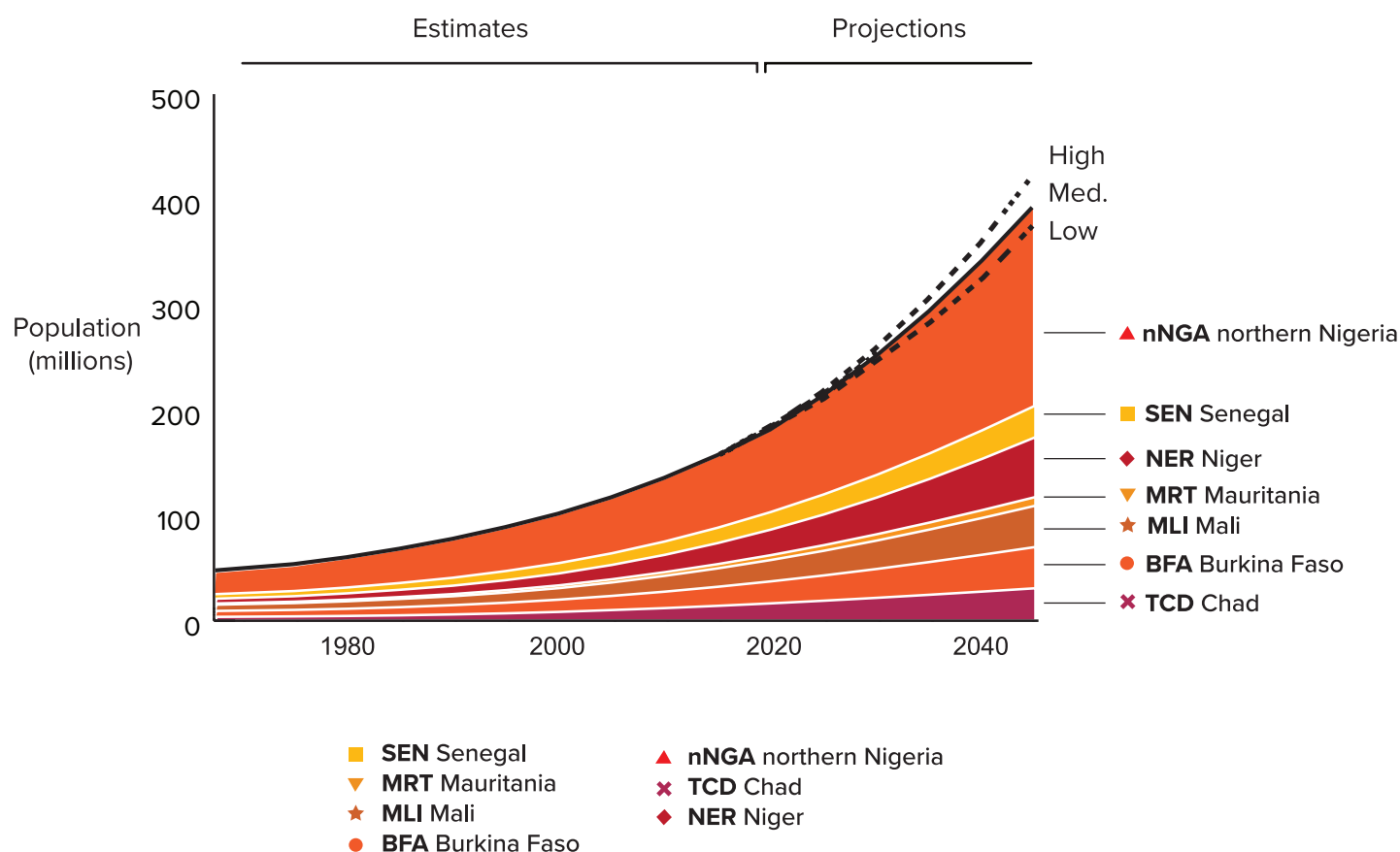
Apparently, policy makers in the Western Sahel, as well as their donor partners, have so far misunderstood demography's contribution to development. They seem to have underestimated the level of sustained programmatic investment, political action, and public education needed to ultimately reshape a country's youthful age profile. Many still do not appreciate how central women's status, autonomy, and rights are to this effort.

TABLE 1. Opening the Demographic Window

Country	Current		Year of the predicted entry into the demographic window (median age of 25.6 years)		
	Total Fertility Rate	Median Age Estimate	UN Projection (fertility variant)		
	2015-20	2020	Medium	Low	High
Senegal	4.7	18.5	2055-60	2045-50	2070-2075
Mauritania	4.6	20.1	2055-60	~ 2045	2070-75
Mali	5.9	16.3	2065-70	2055-60	2075-80
Burkina Faso	5.2	17.6	2060-65	2055-60	2075-80
Niger	7.0	15.2	2075-80	~ 2070	~ 2090
Chad	5.8	16.6	~ 2065	2055-60	2075-80

Source: UNDESA/Population Division, 2019.

FIGURE 11. Population in the Western Sahel and Northern Nigeria



Source: Data: UNDESA/ Population Division, 2019 (six Western Sahelian states); authors' model of northern Nigeria.

A Populous Sahel

Until very recently, much of the Western Sahel's political leadership favored large families, arguing that the region was too sparsely populated, and that higher rural densities and urbanization would accelerate economic growth and modernization. For the most part, development economists have not objected to this argument. In a review of population and development, published in 1986, the US National Research Council noted that, historically, the growth of human population has driven agricultural intensification and investment in irrigation (Boserup's hypothesis),⁵⁵ while stimulating industrialization and infrastructural expansion. However, the authors of this study acknowledge that during periods of dramatic population growth, natural ecosystems and the renewable resources they support, as well as some human-made public goods, have generally been degraded. This report therefore warns that to advance human development during a period when population is growing rapidly—at rates in the neighborhood of the Western Sahel's 3.1 percent annual growth, and urban growth rates over 4 percent—requires a scale of adjustment and efficiency of governments that is typically beyond the capacity of low-income states.⁵⁶

Do these conclusions justly apply to the Western Sahel? Could irrigation, urbanization, increased out-migration, and a generous diaspora allow these states to accommodate such extraordinary growth? Or will the future evolve as the most pessimistic analysts fear, rendering political conditions even more brittle, human development more difficult, and the region more dependent on foreign funds and more vulnerable to military intervention?

We will soon find out. The Western Sahel is about to undergo a demographic stress test. From a combined 2020 population estimated at about 103 million residents, the six Western Sahelian states could wind up at somewhere between the UN's low projection of nearly 190 million, or as much as the UN high-fertility projection of nearly 220 million residents by 2045. Assuming that northern Nigeria follows the UN's trajectory for Niger, this report's model projects that the northerly portion of Nigeria, populated by around 78 million people in 2020, will be home to between 180 million and 200 million residents by 2045 (fig. 11).⁵⁷ Thus, for this entire region, the projected gap between the totaled low-fertility projections, in 2045, at about 370 million, and the totaled high-fertility projections, at about 420 million—some fifty million people—is substantial, and significant in a food-insecure environment. However, it is certainly not the demographic turnaround for which the region's policy makers and economic analysts might hope.

Rather than a statement of demographic pessimism, that modest gap in 2045, between the current high and low-fertility projections, is the product of momentum created by the region's youthful age structure. Even if fertility declines steadily, progressively larger cohorts of adolescent females and girls, already born, will continue to enter their prime childbearing years (in their early twenties), bear children (although at a lower rate than the previous generation), and —because there are many more new families — contribute to substantial population growth. In fact, the UN Population Division's most recent projections indicate that if the medium-fertility projection unfolds, the Western Sahel's age-structural momentum would account for about 70 percent of its population growth over the next twenty to twenty-five years.⁵⁸

Such momentum can be expected to buffer the impact of fertility decline on the region's population trajectory. However, ultimately fertility decline dramatically slows growth. Should the UN low-fertility projection be attained, a truly substantial divergence from the corresponding high-fertility projection—a gap exceeding one hundred million people—would emerge between three and four decades (by 2060). Under that low-fertility scenario, population growth in several Western Sahelian states would slow, by 2070, to annual rates approaching one percent, a rate currently experienced by South Africa, Indonesia, Mexico, and other emerging economies. Moreover, achieving the low-fertility projection in any of the Sahelian states would yield other payoffs: a narrowing of the base of its youthful population age structure, virtually eliminating future age-structural momentum; and an age-structural shift, bringing the demographic window a decade closer than the medium-fertility projection.

Yet, a substantially more populous Western Sahel—twice today's residents by 2045, and at least three times the current population by the end of the century—is virtually inevitable. For decades to come, the crucial question will be whether the region's states can generate enough collective wealth to finance sufficient “demographic investments”⁵⁹—the construction of housing, roads, schools, hospitals, sanitation systems, and agricultural as well as industrial infrastructure—to turn its rising generations into productive citizens, and thus lay the groundwork for economic progress and political stability. Or, instead, will these generations be left to scrape their income primarily from an unfettered informal sector—all of it untaxable and much of it illegal—and from remittances sent by the Sahelian diaspora laboring in the near and far abroad? Will greater numbers of young Sahelians strike out on a perilous route to Europe, or search for some form of identity, mobility, and meaning among the warring parties of the region's escalating conflicts?

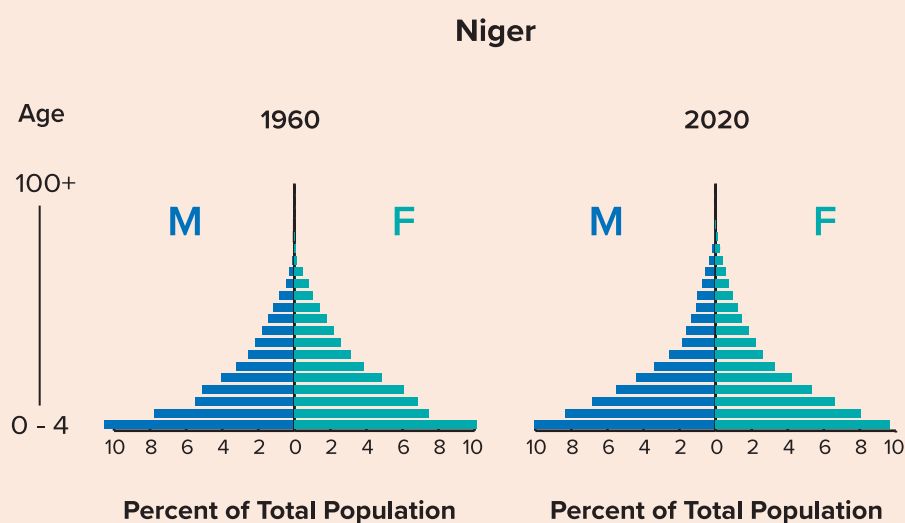
NIGER, A CASE IN POINT

Few states are currently less capable of absorbing the social, political, environmental, and economic stresses induced by sustained high fertility, a persistently youthful population, and rapid population growth than Niger. The World Bank's most recent estimates indicate that more than 90 percent of Niger's population survives on an income of US \$5 per day or less.⁶⁰ The female mean age of first marriage appears virtually stalled at just

over seventeen years of age,⁶¹ maternal mortality remains among the world's twenty highest, and childhood stunting—an indication of malnutrition that has implications for later health and educational outcomes—is observable in more than 45 percent of Niger's children under age five.⁶² Since 1990, Niger has ranked last among the more than 180 countries assessed in the UN Development Programme's HDI.⁶³

Whereas the frequencies of childbearing and

FIGURE 12. Niger's Age Structure, 1960 and 2020

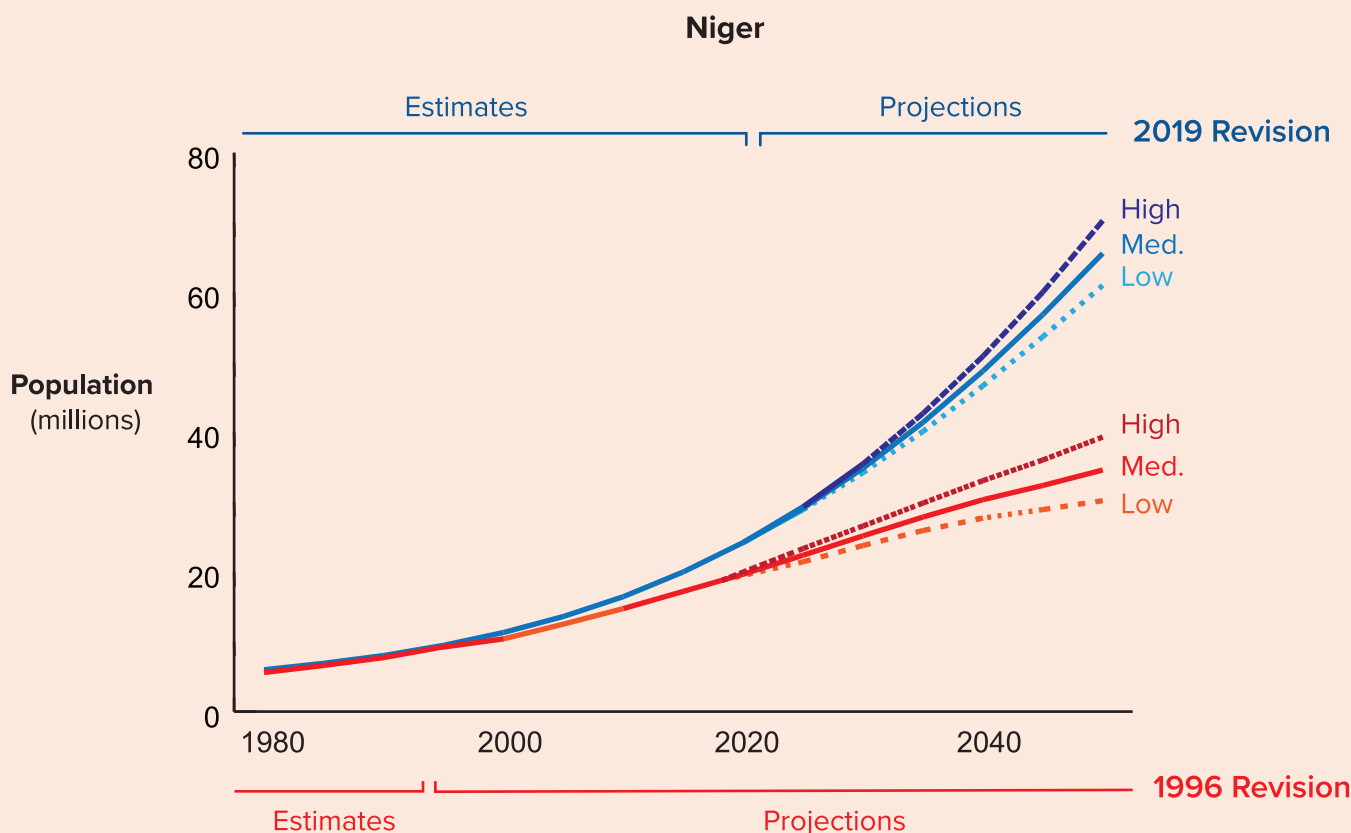


Source: Data: UNDESA/ Population Division, 2019.

childhood mortality in Niger have clearly begun their long-awaited decline, the country continues to experience the world's highest rate of total fertility, just barely under seven children per woman. Niger's population, more than half of which is younger than age 16 (fig. 12) and overwhelmingly rural, is currently growing at above 3.8 percent per year—among the world's most rapid rates of growth. At independence from France in 1960, the population within Niger's borders was estimated at less than 3.4 million people. By 2020, that figure had risen above 24 million. Assuming that Niger follows the demographic trajectory currently laid out by the UN Population Division's medium-fertility

projection, its population will pass 50 million residents between 2040 and 2045 and continue to grow.

Reaching the UN's medium-fertility projection—the Population Division's best-guess scenario—is by no means a fait accompli. Realization of such a scenario would require Niger's total fertility rate to decline by close to two children per woman over the next two decades—a rate that the country has never before achieved. In fact, Niger's 2020 population adds up to four million more residents than even the UN's high-fertility projection had generated in the Population Division's 1996 demographic dataset (fig. 13).⁶⁴

FIGURE 13. Compared Projections, 1996 and 2019

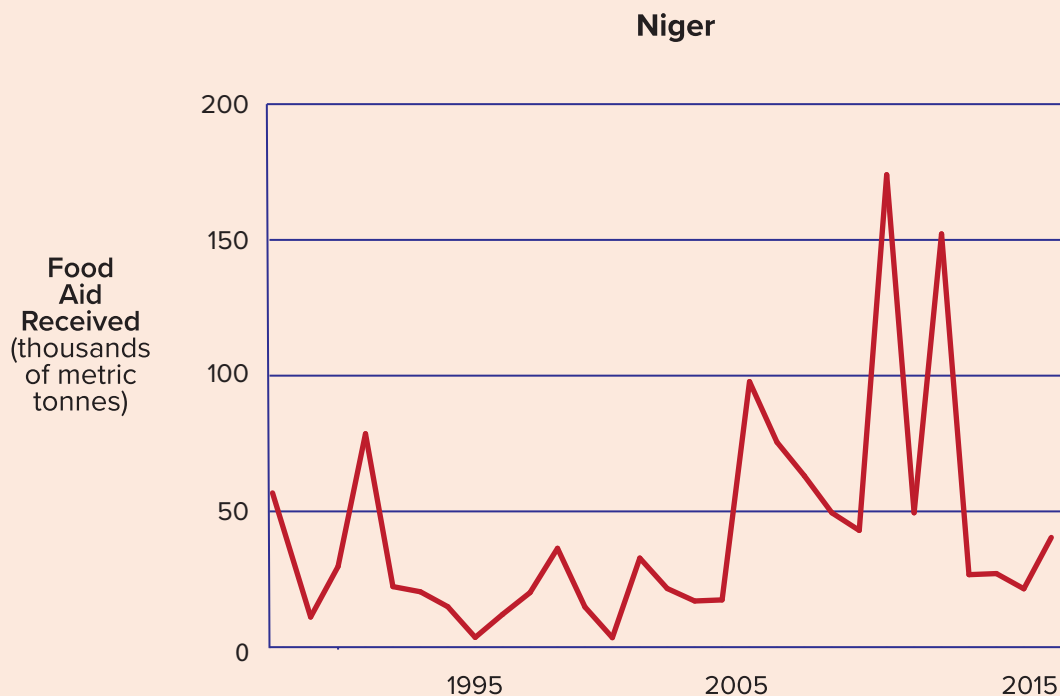
Source: Data: UNDESA/ Population Division, 1997, 2019.

Niger has consistently been a major recipient of international food aid (fig. 14).⁶⁵ Shipments of this type of humanitarian aid have greatly varied over time, responding largely to needs created by erratic rainfall and armed conflict. By 2035, according to a recent study, the country's annual dry cereal deficit is projected to increase to almost one-third of Niger's current yearly consumption—a deficit that even heroic investments in irrigation may not fully stem.⁶⁶ As prospects in agricultural and livestock-related livelihoods diminish, young adults will increasingly look to rural non-agricultural and urban sectors for employment, where job growth so far has been slow. A recent labor assessment suggests that about two-thirds of the country's 15-to-24 year-olds are not, at present, being educated, employed, or trained.⁶⁷ By 2045, today's population of

Nigerien children, adolescents, and young adults is projected to expand the country's prime-aged workforce (aged 25 to 54 years) to nearly three times its current level.⁶⁸

Demographers see the results of recent cell-phone surveys in Niger as a hopeful harbinger of changing reproductive behavior. In Niamey, the country's capital city, about one-third of married women are currently using modern contraception. As elsewhere, the wealthiest and most educated women are contraception's most frequent users.⁶⁹ Despite these signs of progress, many analysts wonder if contraceptive use might be spreading too slowly in Niger and if fertility decline is emerging several decades too late.

FIGURE 14. Food Aid, 1988 to 2016



Source: Data: FAO (reported by World Food Programme), 2020.

CHAPTER 3

A DEMOGRAPHICALLY DRIVEN FUTURE

How rapid the region's population growth will be, how long this growth will persist, and how that growth will be accommodated—or transformed into a diaspora—will be influenced by the policy and program initiatives that the region's individual governments fulfill and donors choose to fund. Yet even if women-focused efforts are expanded and succeed in the face of the region's

escalating conflicts, a substantially more populous Western Sahel and northern Nigeria are virtually guaranteed. The following chapter briefly reviews a set of demographically driven challenges—agricultural transformation, rapid urbanization, and migration—that await the states of the Western Sahel over the coming period of 20 to 25 years.

Rural Transformation

Available satellite imagery and landscape surveys depict the past three decades in the Western Sahel as a period of unprecedented agricultural expansion. Rain-fed maize, groundnut, and cowpea farming has virtually saturated the region's southern zone, prompting the cultivation of common pastures and woodlots, while cultivation of millet

and sorghum—crops tolerant of intermittent dryness and poorer soils—has expanded northward across the region's savannas.⁷⁰ In Burkina Faso, for example, rain-fed cropland has displaced the country's grazed savanna as the most dominant cover type, spreading over nearly 40 percent of the country; much of it is only marginally productive and vulnerable to erratic

rainfall. Whereas the growth of cereal production and livestock have generally exceeded the pace of human population growth over the past three decades, cropland expansion has slowed to a crawl (fig. 15).⁷¹

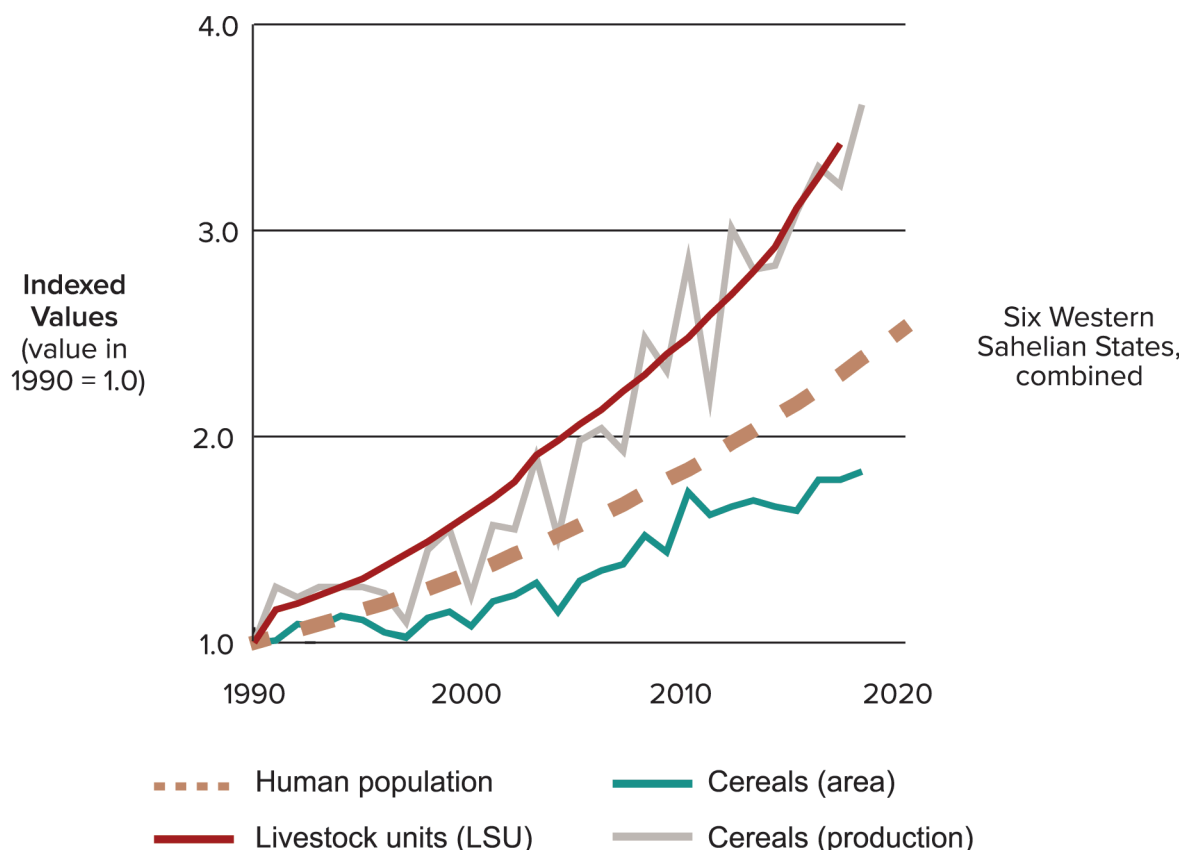
Despite this pace of progress, all the Western Sahel's states have consistently received food aid over this period. Niger and Chad have occasionally ranked among the World Food Programme's top-ten annual recipients. Alongside population growth, armed conflict, population displacement, climate warming, and periodic drought loom large over the region's quest for food-security. Even assuming slowed growth under the UN's low-fertility projection, the region's future will almost certainly include substantial irrigation, a more expansive regional agricultural trade network, and frequent infusions of food aid.

According to some estimates, four-fifths of the region's potential for irrigated agriculture—including the waters of the Niger, Senegal, Lake Chad, and Volta River Basins—remain underdeveloped. Moreover, despite the Western Sahel's surface aridity, the region sits on some of Africa's most expansive aquifers. Yet little is known about whether its groundwater can be

naturally replenished, how much can be pumped sustainably, and how resilient this supply is to the region's changing climate. Whereas small-scale irrigation schemes have shown the greatest returns on investments, pressures exerted by climate change, increased urban demand for food and drinking water, and the fiscal and political considerations of foreign assistance will likely pressure governments, aid donors, and lenders to aim for large-scale projects.⁷²

The region's pastoral communities have been structurally transformed by the loss of their most productive traditional rangelands, the relatively high density of grazing-rights holders, and a powerful economy of scale in these opportunistic production systems. In contrast with a more egalitarian past, a small proportion of extended pastoral families presently own the lion's share of Sahelian livestock, and they (with their hired armed herders and vehicles) control vast areas of rangeland and livestock markets, run farms, and own businesses in nearby towns and cities. This shift to what agroecologists call a neopastoral production system has spawned a large and growing underclass of herders who survive by contracting their family's

FIGURE 15. Agricultural and Livestock Trends



Values in 1990 are represented by the index value (1.0). Source: Food and Agriculture Organization Corporate Statistical Database (FAOSTAT), 2019; UNDESA/Population Division, 2019.

labor to wealthy absentee herd owners and by performing occasional informal income-earning activities and seasonal labor for farmers, town dwellers, and entrepreneurs.⁷³

This neopastoral underclass could figure in the ethno-political future of the Western Sahel. The region's traditional rangelands have seen a sharp rise in armed conflict—particularly in Mali and Burkina Faso—and the history and evolution of farmer-herder tensions are frequently considered key to understanding the rapid rise of the region's Islamic insurgency. Whereas this herder underclass is, indeed, justifiably replete with grievances and particularly vulnerable to radicalization, militant Islam as a political resource is not the monopoly of any one group, livelihood community, or ethnicity. Across the Western Sahel, Islam is acknowledged as the civilizational matrix in which both local and global grievances can be expressed.⁷⁴

The Urban Future

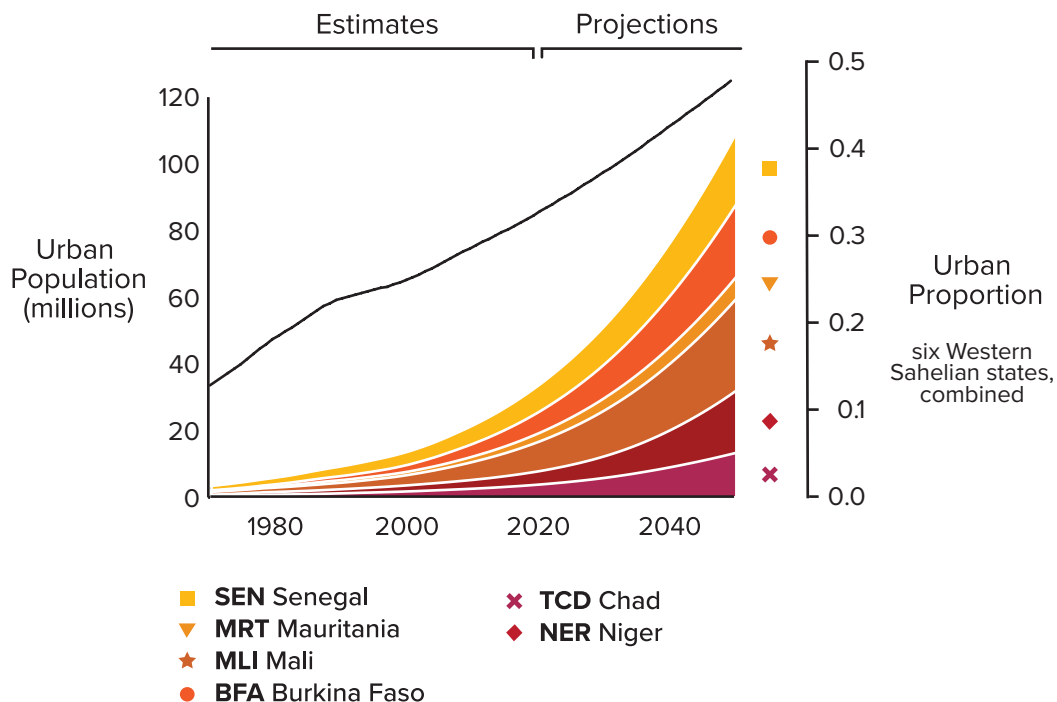
The great expansion of Sahelian cities is already well underway, fueled by rural-to-urban migration, net growth among urban families, and geographical absorption of adjacent towns and settlements. The rapid rate at which urbanization is proceeding in the Western Sahel outstrips the capacity of the region's low-income states to manage settlement and mediate their environmental and social risks. N'Djamena, the Chadian capital, has grown fifty-five-fold since 1960, from around 23,000 inhabitants then to about 1.4 million in 2020. Over the same period, the populations of Dakar and Ouagadougou have increased by factors of, respectively, fifteen and twenty.

In high-fertility, rapidly growing regions, demographers expect the rate of urban population growth to substantially outpace country-level growth rates. Across the six states of the Western Sahel, urban population growth amounts to about 4.4 percent per year, 1.4 times the regional rate of growth (3.1 percent per year). In Burkina Faso, Mali, and Mauritania, urban population growth is estimated at 1.6 times the country-level growth rate or even higher.⁷⁵ To the credit of the region's states, the proportion of slum dwellers in the Western Sahel has dropped dramatically since 1990, from above 80 percent to just under 55 percent today. Yet, it's not enough. In absolute numbers, due to rapid urban population growth, the region's slum populations nearly doubled during that time period,⁷⁶ consuming and polluting valuable agricultural land and fresh water, while amplifying the human toll of violent crime and infectious diseases.

Overurbanization is a term applied to the Western Sahel, and it describes trends driven principally by rural push factors—elevated rural densities, dwindling opportunities in either dryland agriculture or pastoralism, the proliferation of armed conflict and banditry, and often-idealized perceptions of rural-urban differences—rather than the palpable pull factors of expanding industrial development and rapid job growth that heralded urban growth in Europe and Asia. In the Western Sahel, over-urbanization has generated a patchwork of stark inequalities, characterized by sprawling slums, juxtaposed to islands of upscale apartments and wealthy, gated neighborhoods.⁷⁷

The rural proportion of the population in the six Western Sahel states has dropped from 85 percent in the 1970s to about 67 percent in 2020. The UN Population Division expects this group of countries to be close to one-half urban between 2040 and 2050. Thus, from about three million in 1970, the number of urban residents in the six Western Sahelian countries grew to about 34 million in 2020, and is expected to pass 90 million by 2045 and continue to climb rapidly (fig. 16).⁷⁸ However, the region's rural-urban balance varies dramatically. The proportion of urban dwellers ranges, today, from 55 percent in Mauritania—a country with a long Atlantic coastal strip and a largely inhospitable desert interior—to just 17 percent in Niger, an inland country with borders enclosing the most productive croplands within the Niger River and Lake Chad Basins.

Should urban growth slow, urbanization in the Western Sahel offers a possible economic path to manufacturing and service-sector development, and—if governments implement coherent policies and donors invest more significantly—a conduit to an expanded pool of formal housing, improved access to education and health services, affordable contraception, and the possibility of progressive societal changes in behavior that permit women more autonomy and more access to the workplace. Moreover, it will be in these urban centers that young men will receive the vocational and professional education, and attain the income-generating employment, that would favor the emergence of a middle class that is the sociological pillar of (liberal) democracy. Sahelian governments can neither afford to dismiss mass urbanization's approaching challenges, nor ignore opportunities that will accelerate three transitions that go hand-in-hand: to a society of small, well-nourished, well-educated families; toward women's autonomous participation in society; and to a slower-growing, more highly skilled workforce that can readily find employment or start legitimate enterprises.

FIGURE 16. Urban Population Trends

Urban population trends in the six Western Sahelian countries are shown in solid curves, with the proportion of urban residents in their combined populations depicted by the line. Estimates range from 1970 to 2020; projections cover the period from 2020 to 2050. Source: UNDESA/Population Division, 2018.

Leaving the Sahel

Migration—whether from rural to urban communities within the same country, to more distant urban hubs in the regional neighborhood, or far abroad beyond Africa’s shores—is a complex process that social scientists have found difficult to characterize and account for. The mix of migration flows in the Sahel is among the world’s most complex. Some peoples of the Western Sahel are the inheritors of a centuries-long tradition of seasonal, cyclical migration that is associated with transhumant pastoralism, seasonal agricultural labor, or trade, often extending beyond the Sahel. For example, as much as a third of Niger’s population is involved in seasonal labor migration and many travel out of the region to work in commercial plantations or in urban centers in coastal West Africa before making the journey home. Whereas Senegalese and Malians have migrated in growing numbers overseas, mainly to France, this is far less the case for Mauritians, Burkinabé, Nigeriens, and Chadians. Postcolonial migration to the United Kingdom out of northern Nigeria also has been proportionally less frequent than from the southern parts of that former British colony.

According to calculations for this study, based on

data recently modeled by Abel and Cohen, more than 80 percent of all intercountry out-migration from the six Western Sahelian states (averaging more than 880,000 per five-year period, between 1990 and 2015) has ended in a journey outside of the region; around 60 percent of average net migrant flows from the six Western Sahelian states were added to other African destinations (table 2).⁷⁹ The remaining 40 percent were added to the populations of Europe, North America, and other less-frequented non-African destinations. These data, unfortunately, omit the large refugee flows reported by news media during the most recent five-year period.

Several country-to-country flows are notable for being consistently large or unusually episodic: Burkinabé into coastal West Africa; and the punctuated exodus of Malians to Niger, Nigeria, other African destinations, and to Europe. In the past, migratory episodes to coastal West Africa, instigated by drought and/or conflict (e.g., in the 1960s through the early-1980s), have generally been followed by a significant return migration. Among the Western Sahelian countries, Senegal has served as a gateway for migrants destined

for Europe and North America, while Nigeria has been a significant recipient of migrants from the Sahel, as well as a substantial point of departure to other parts of sub-Saharan Africa (i.e., southern and eastern Africa), Europe, and North America. According to these data, so far, North Africa has been a relatively minor destination for Sahelian migrants, although a significant point of departure for Africans destined for Europe. Among the six Western Sahelian states, Chad has been the only country where foreign in-migration has exceeded out-migration. These in-migrants have largely been refugees fleeing from complex humanitarian crises in neighboring states, including Central African Republic, Sudan, Libya, and the other countries in the Lake Chad Basin. The International Organization of Migration estimates that more than a half-million refugees and internally displaced persons have recently been residing on Chadian soil.⁸⁰

How will a much more populous Western Sahel affect its migration future? In the eventuality of forced migrations triggered by conflict or drought-related famine, the region's neighbors can expect much larger refugee flows. The less punctuated, less spontaneous flows of labor migrants, however, are more difficult to gauge. For now, the vast majority of the Western Sahel's population may still be too poor, or too poorly educated, to gamble on a long, risky, and costly journey to North Africa, South Africa, Europe, or beyond.⁸¹ Though, as Sahelian cities grow more economically vibrant, the region's urban populations promise to become a more significant source of international out-migrants, perhaps in the style of Addis Ababa: a city of Ethiopian citizens intent on migration and equipped with the education, resources, and networks among their ethnic diaspora to secure a livelihood outside the continent.⁸²

TABLE 2. Net Migration

5-Year Net Flows (average of five successive year periods, 1990-95 to 2010-15)
(thousands of migrants)

		DESTINATION (to)						
		Western Sahelian States	Nigeria	Non-Sahel West Africa (excluding Nigeria)	Other sub-Saharan Africa	North Africa	Europe	United States, Canada
SOURCE (from)	Senegal	3	1	14	18	3	128	19
	Mauritania	14	2	9	3	2	20	1
	Mali	74	32	22	24	~0	37	1
	Burkina Faso	2	1	112	3	~0	14	2
	Niger	26	2	22	3	~0	4	1
	Chad	1	2	20	31	109	5	1
	Nigeria	36	---	55	54	3	130	98
		Net Migrant Outflow	Net Migrant Inflow					

Net Migrant Outflow

Net Migrant Inflow

Values represent five-year average estimates of net migration (in thousands) in the Western Sahel drawn from five estimates of gross (single-direction) flows, from 1990-95 to 2010-15. The estimation method, described as “demographic accounting, pseudo-Bayesian, closed,” generates country-to-country flow estimates from migrant stock data maintained by the World Bank and UNDESA/Population Division. Source: Abel and Cohen, 2019.

RIISING TO THE DEMOGRAPHIC CHALLENGES

The past five decades are notable for the dozens of instances in which poorly developed states—first in East Asia in the late 1960s and 1970s, and then in turn in the Caribbean and Latin America, in South Asia, North Africa, and southern Africa—launched women-centered policies and programs that ultimately led to the establishment of a small-family norm. Among these initiatives were programs that encouraged extended periods of birth spacing and breast-feeding; policies that put more girls in schools and kept them studying longer; legal reforms that improved women's rights and protections, both in marriage and more broadly; communications efforts that helped counter misinformation and change public opinion; and programs that provided women and their sexual partners with affordable access to contraceptives and other reproductive health services—technologies that allowed couples to safely delay, time, and limit pregnancies.

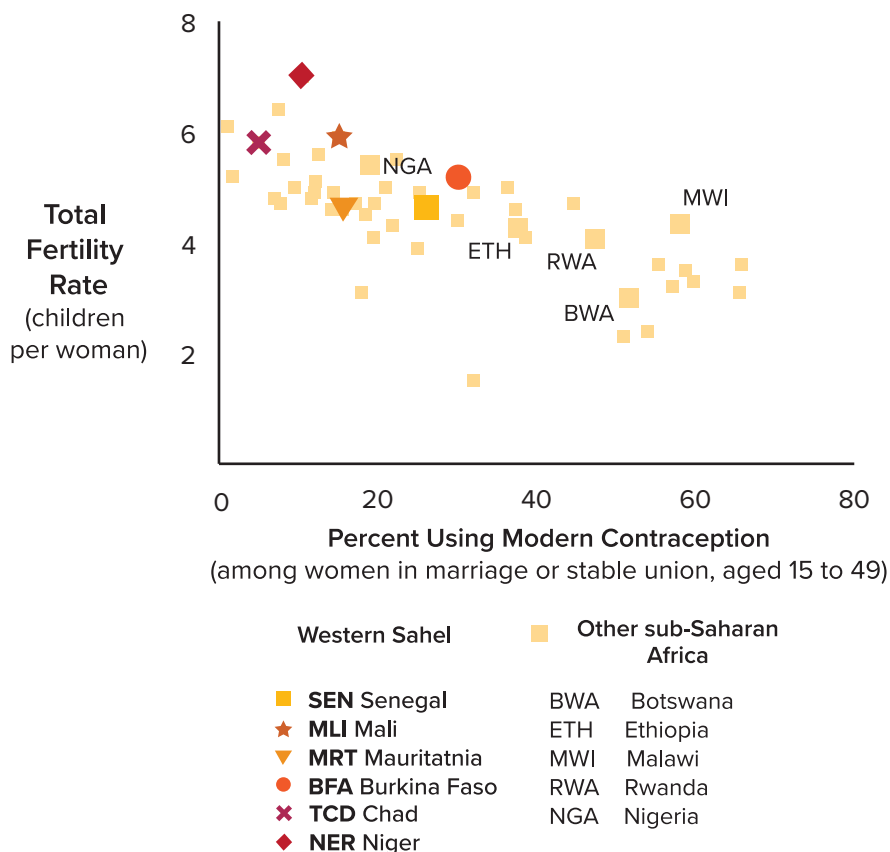
This chapter begins by briefly reviewing fertility transitions in Tunisia, Botswana, and Bangladesh: two of them Muslim-majority states, two fellow African countries. These states politically, programmatically, and without coercion, facilitated relatively rapid fertility transitions and age-structural transformations over a roughly thirty- to forty-year period. Their demographic starting points were similar. Each experienced a broadly pyramidal profile with a median age under twenty years, and in each, total fertility was estimated at between six and seven children per woman. At the onset of their transitions, childhood mortality rates in these three states well exceeded those currently reported in the Western Sahel. Moreover, knowledge and use of modern contraceptives were generally low, and typically confined to married couples with high incomes in urban areas. Yet, from the early 1970s onward, their fertility trajectories rapidly diverged from the Sahelian states.

Each took its own political pathway to overcoming sustained high fertility. Tunisia's path to a more mature population, and more gradually to slower population growth, was the result of a broad top-down package of reforms to women's rights that were introduced by the secular-nationalist central government shortly after independence. Botswana's slower decline was the product of focused public health priorities, maintained over the long term, by a well-functioning central government and professional health workers. In contrast, Bangladesh's extraordinary success was rooted in a well-run and adequately funded health bureaucracy as well as its ability to maintain long-term partnerships, both with committed foreign donors as well as with Bangladeshi non-governmental organizations. In both Tunisia and Botswana, the state family planning program was given significant administrative and financial autonomy.

At the close of this section, the report briefly reviews the progress of three ongoing fertility transitions in Ethiopia, Malawi, and Rwanda, discussing these countries' political pathways to implementing population-related policies and programs. Whereas these transitions are still incomplete, they represent recent efforts to facilitate fertility decline and age-structural change among very youthful and rapidly growing populations of equatorial Africa. Discussion includes progress to date and the difficulties that these African states have encountered.

The pathways, which are discussed in the following section, present a broad set of political and programmatic alternatives by which states in the Western Sahel might improve and expand access to modern contraception and, relatedly, ultimately facilitate a transition to lower levels of fertility (fig. 17).⁸³ That said, also noted are critical differences in conditions throughout the Western Sahel that strain these comparisons, the most obvious being the ongoing jihadist insurgency, which continues to cost lives, trigger human displacement, and undermine development in Mali, Chad, Burkina Faso, Niger, and northern Nigeria.

FIGURE 17. Contraceptives and Childbearing in Africa, 2018



Modern contraception does not include withdrawal, rhythm, other traditional methods, or induced abortion. Data source: UNDESA/Population Division, POP/DB/CP/Rev2019, 2019.

Tunisia: A Women's Rights Approach

Tunisia's rapid journey out of the age-structural transition's youthful phase (fig. 18) was the product of the vision and leadership of Habib Bourguiba, a charismatic nationalist political figure who led Tunisia's successful effort to achieve independence from France and became the country's first president. Influenced by the Turkish nationalist Kemal Atatürk, Bourguiba set Tunisia on a path to become a modern secular state, a goal that he believed was unattainable without the full participation of Tunisia's women. During the late-1950s and '60s, Bourguiba's Neo-Destour political party legislated a package of pro-women reforms, including laws that compelled parents to send their daughters to school, raised the legal age of marriage, prohibited polygamy, gave women full inheritance rights, made divorce a secular judicial process, established a decentralized network of family planning services, mandated that women could work outside the home, opposed the veil, and

curtailed the power of local imams. Initially, there was localized rioting and political opposition. Notably, the regime rigidly enforced its set of social reforms, often jailing opposition leaders and other citizens who openly defied the new laws.

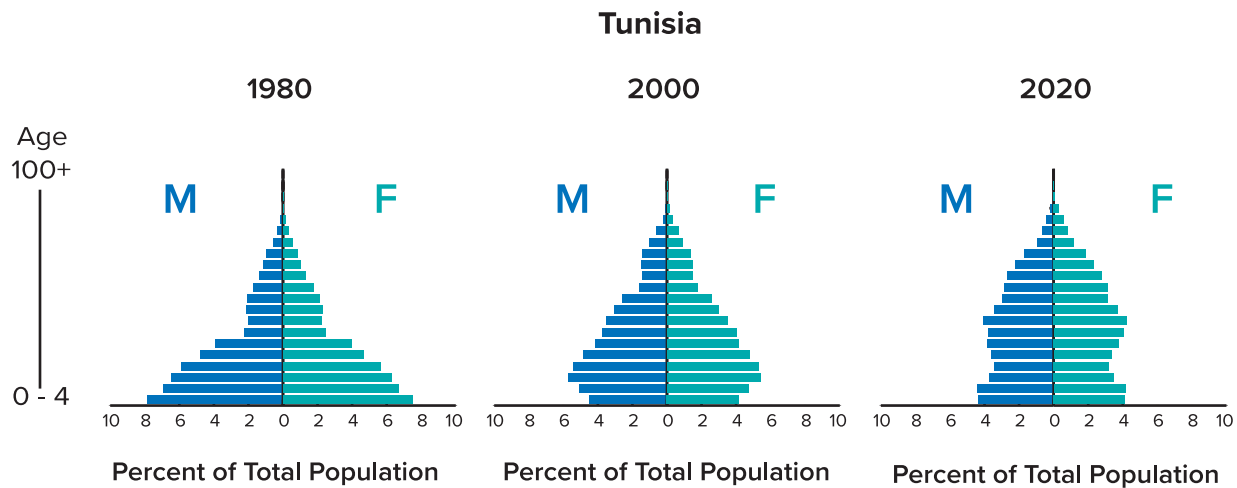
By 2005, the use of modern contraception by Tunisian women, married or in union, had surpassed 50 percent, while the country's total fertility rate had reached two-children per woman. Entering the demographic window, Tunisia surged ahead of most of its African and Arab neighbors in terms of economic growth, educational attainment, and child survival. In late-2010, the "Dignity Revolution" displaced Bourguiba's successor, Zine al-Abidine Ben Ali, who had upheld Bourguiba's reform agenda as well as his authoritarian control, and led to Tunisia's political liberalization and touched off the Arab Spring. In today's Tunisia, Bourguiba's top-down legacy draws frequent criticism from the socialist left and Islamic

right, both of which were ruthlessly suppressed by the prior regime. However, several statistical studies indicate that the type of age-structural changes driven by Bourguiba's reforms ultimately made Tunisia's political liberalization more likely than in other states in the Middle East and North Africa, and once achieved, more stable than other liberal regimes that were once active in West Africa (in Mali, Benin, and Sierra Leone).⁸⁴

Would such a dramatically top-down, women's rights-focused approach be possible in the Western Sahel? Such successful political and cultural reversals require high degrees of political unity at the state level, and uncontested authority over national and

local politics, which, as the architect of an independent Tunisia, Bourguiba wielded in the 1960s and '70s. Whereas Paul Kagame currently exercises comparable top-down power as the president of Rwanda, no current head of state in the Western Sahel wields such authority, nor appears as committed as Bourguiba was to reforming women's status and rights. In addition, several demographic and social characteristics set Tunisia's example apart from the Western Sahel. Even when marital fertility was very high in Tunisia, adolescent pregnancies were relatively rare, and in the large urban areas of the coastal north, girls regularly attended secular schools.

FIGURE 18. Tunisia's Age-structural Profile



Source: Data: UNDESA/Population Division, 2019.

Sankara's Lost Legacy

Thomas Sankara, former president of Burkina Faso

Some historic precedent exists for government efforts to empower women in the Western Sahel. Thomas Sankara, an army officer who seized power in a military coup in 1983 in Upper Volta, a country he later renamed Burkina Faso, encouraged girls to finish secondary school and earn income. He introduced voluntary family planning programs, and mandated a leave of absence for girls who became pregnant during their education. Long before African leaders paid attention to women's rights, Sankara's Marxist government outlawed female genital cutting, forced marriages, and polygamy. He also appointed women to high governmental positions, mandated women's participation in village committees, and recruited women into the



military. Importantly, Sankara initiated these reforms, and others designed to increase agricultural production and train the workforce, as a mean to free his country from economic dependency on the West. However, his authoritarian reform agenda never reached completion. Sankara—who was opposed by local elites and by France's allies in power in West Africa—was assassinated during a coup in 1987, after which his most progressive policies were rescinded.⁸⁵

Botswana: A Professionalized Healthcare Approach

A resource-endowed country with less than three million inhabitants, 80 percent of whom self-identify with a single ethnic group (Tswana), Botswana stands out in the sub-Saharan context for gearing its decentralized health care system, soon after gaining independence in 1966, toward integrating family planning and other reproductive health services and related activities. These services focused on reducing the high frequency of marriage and pregnancy among adolescent girls, on lengthening birth spacing, and on increasing girls' educational attainment.

Professional care and affordability were, from its inception, key elements of Botswana's reproductive health effort. Rather than employing community workers, family planning services were directly integrated into maternal and child health care at all local primary health facilities. Modern contraception has been provided free of charge since 1970.

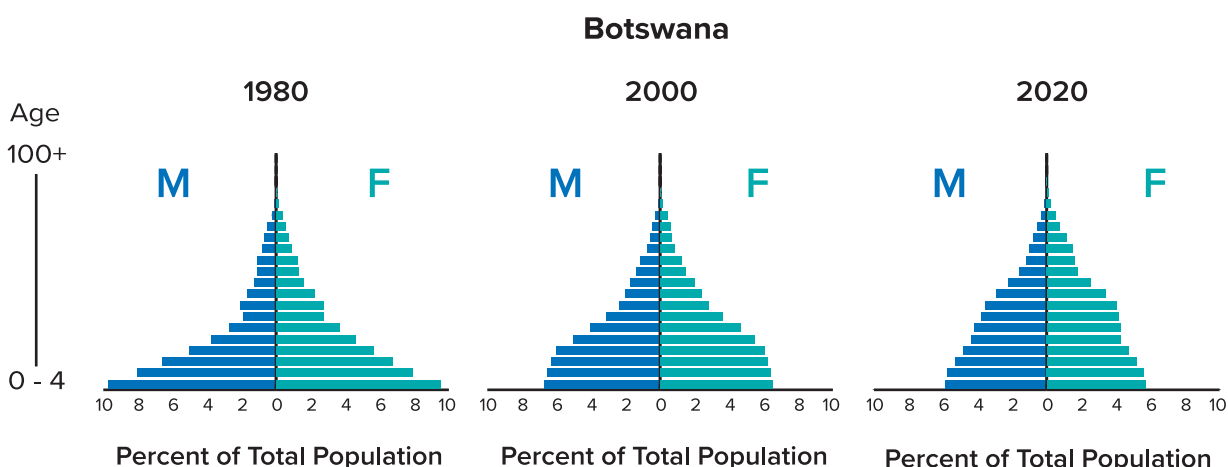
Botswana's integrated efforts produced the first measurable reproductive health successes in sub-Saharan Africa. Adolescent births in Botswana (still a primary reproductive health concern in the Western Sahel) have fallen to less than one-third of pre-1980 levels, while modern contraceptive use among married women, over the same period, has surpassed 50 percent—up from levels below 20 percent. When last evaluated, Botswana's family planning program scored highest in the US Agency for International

Development's effort index among all countries surveyed in sub-Saharan Africa.⁸⁶ Moreover, the country is one of the few in the sub-Saharan region where girls' secondary school enrollment rates, now above 90 percent, exceeds boys' rates.

Whereas these efforts contributed to a remarkable decline in fertility through the 1980s and '90s, its pace has more recently slowed to just below the three-child-per-woman level (fig. 19). The scale of Botswana's HIV epidemic and the ongoing costs of AIDS treatment may have redirected some of the attention and funding previously given to family planning services. Whereas Botswana's age structure—now at a median age of twenty-four years—still falls short of the demographic window, the UN's most recent projections suggest that the country will likely encounter that milestone around 2025.

While Botswana shared the initial challenge of high rates of adolescent pregnancy and early marriage with Sahelian countries, its history of effective governance and wise use of mineral revenues—much of it invested in health and education—sets the country apart from most African regimes. Moreover, Botswana's path to development has remained virtually free of the impediments of violent conflict, and its government remains one of the continent's most enduring liberal democracies.

FIGURE 19. Botswana's Age-structural Profile



Source: Data: UNDESA/Population Division, 2019.

Bangladesh: A Community-based Approach

When, in 1971, Bangladesh seceded from Pakistan, the two South Asian countries were virtually demographic twins. Their youthful age structures were nearly indistinguishable, their infant mortality rates extraordinarily high, and their total fertility rates—both above 6.5 children per woman—were less than a third of a child apart. Nonetheless, over the next decades, Bangladesh’s fertility declined steeply while Pakistan’s transition proceeded slowly and ultimately stalled. By 2010, Bangladesh’s total fertility rate dropped below 2.5, almost one child fewer than the UN Population Division’s most optimistic scenario, its low-fertility projection, in the 1992 revision of its data.⁸⁷

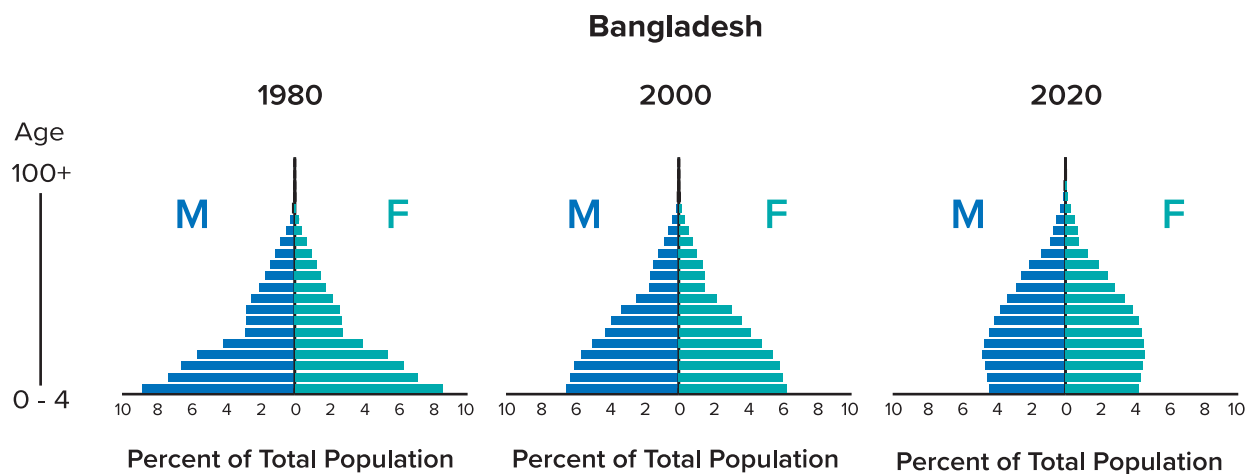
Demography has made a considerable difference. Based upon its present age structure (fig. 20), Bangladesh is on the verge of entering its demographic window. Moreover, according to the World Bank, this densely populated South Asian state, which once was believed to be hopelessly relegated to low-income status, has achieved lower-middle income status.

This remarkable demographic turnaround—occurring despite political turmoil at the national political level—was brought about by a dedicated health administration that mobilized tens of thousands of community-based health workers and volunteers, teamed up with an local non-governmental organization called the Bangladesh Rural Advancement Committee (BRAC) as well as other such organizations, and effectively used a continuous infusion of health commodities and funds from foreign donors. In 1975, Bangladesh’s Ministry of Health and Family Welfare began collaborating with the International Centre for Diarrheal Disease Research, Bangladesh (ICDDR,B) to initiate an experimental

program of community-based contraceptive distribution in the Matlab subdistrict, a long-term health and demographic surveillance site. By 1977, the ICDDR,B’s project had trained a cadre of eighty family village workers to offer counseling and, initially, pills and condoms alongside a select set of maternal and child health interventions. This successful donor-funded approach and a countrywide public health communications program helped trigger demand for other long-term contraception methods (e.g., injectables and implants), countrywide expansion of the village worker program, and formalization of Bangladesh’s public health supply chain.⁸⁸

Bangladesh was initially very similar to the states of today’s Western Sahel, both demographically and socioeconomically. Its development efforts initially set out to overcome high levels of adolescent pregnancy and low levels of education, particularly among girls, in a low-income Muslim-majority social environment with weak national governance. The effort and investments succeeded. While some have criticized the program for having done little, at least initially, to raise women’s status or involve men, other evaluators have defended its initial approach as culturally sensitive and likely to yield women’s progress over time.⁸⁹ Importantly, the programmatic trials that began in Matlab District in the late-1970s attracted significant research interest and donor funding for services and the participation of non-governmental organizations. Of course, it would be very difficult to kindle such degree of donor interest in those Western Sahelian countries that are experiencing conflict.

FIGURE 20. Bangladesh’s Age-structural Profile



Source: Data: UNDESA/Population Division, 2019.

East Africa: Programs in Progress

For Ethiopia, Kenya, Malawi, and Rwanda, the political routes to demographic change have, in each case, relied on building strong support from national leaders, high public profiles for programs and policy reforms, and consistently strong financial commitments from foreign donors. These countries have benefited from policy experiences and programmatic approaches that have been tested and improved in Asia and Latin America. Over the past three decades, these governments have paid greater policy and programmatic attention to girls' educational attainment, legislative efforts that augment women's reproductive rights and increase political participation, public health communications, and some adaptive modifications that have enabled donor-funded programs with maternal and child health as well as family planning components to be offered through non-governmental organizations working among low-access populations.⁹⁰

Taking lessons from Bangladesh's community-based, service-delivery model, Ethiopia has trained and deployed its own cadre of local (mostly female) health workers who have taken services and information to farmland, pastoral, and low-income urban households over the past two decades. Whereas Rwanda and Malawi have more recently adopted similar community-based delivery systems, they also have focused a significant portion of their delivery effort on bringing reproductive health services, information, and counseling to youth-centered facilities. Kenya's program has focused on improving quality and access to reproductive health services through both public and private facilities. Like Botswana and Tunisia before them, the four countries have integrated family planning into established maternal and child health care programs as well as primary care facilities. Like Bangladesh, these countries have supported the involvement of non-governmental organizations as means to extend reproductive health services to the most poorly served low-income communities.

Since the late-1980s, the levels of modern contraceptive use in Ethiopia, Kenya, Malawi, and Rwanda have risen from below 10 percent of married women, ages fifteen to forty-nine (including women in a stable union), to above 50 percent by 2020. During that period, the rate of total fertility fell from a level above 7.0 children per woman in each of these countries

to about 3.5 in Kenya and just above 4.0 in Ethiopia, Malawi, and Rwanda—significant, yet substantially slower-paced declines than in either Tunisia or Bangladesh.

Important service-delivery and contraceptive-acceptance challenges remain in each of these eastern African countries. Contraceptive-discontinuation rates remain stubbornly high, and wide gaps in contraceptive use, childbearing, and use of antenatal and postnatal care persist between low-income women and those who are more well educated or wealthier. In Rwanda, the problem of low levels of rural access to reproductive health services remains largely unresolved, and in Malawi, public policies have yet to adequately address the problem of persistently high rates of adolescent marriage and childbearing.⁹¹ In general, the relationship between relatively high levels of contraceptive use and a lower frequency of childbearing, while apparent, is not yet nearly as strong as in either Arab North Africa or southern Africa. Arguably, this weaker relationship could indicate that for women in these eastern African societies, the social and economic mobility offered by their limited access to the workplace remains, at this point in time, less promising than the status associated with childbearing and less rewarding than traditional aspects of family.

Surveys undertaken in Ethiopia—a country, like its neighbors in the Western Sahel, that is geographically expansive, ethnically diverse, and frequently beset by ethnic warfare and sporadic jihadist violence—reveal exceedingly wide gaps in contraceptive use and fertility between ethnic regions.⁹² Whereas the total fertility rate has dropped well below the two-children-per-woman level in Addis Ababa and has been declining throughout the country's western regions, fertility remains at nearly pre-transition levels in the largely pastoral Muslim-majority administrative regions of Somali and Afar in the east.⁹³ Similarly in Kenya, nearly pre-transition rates of fertility in the country's North Eastern province are in stark contrast to much lower rates in and around Nairobi. Similar to the demographic differences that have arisen between Nigeria's northern sharia states and the country's south, the persistence of an extremely youthful age structure in Ethiopia's east and Kenya's northeast, could further aggravate existing ethnic tensions.

CHAPTER 5

THREE SCENARIOS

In situations of impending crisis and growing uncertainty, the use of scenarios can help to reduce the scope of outcomes and to unveil poorly visible possibilities that might catch policy makers unaware. Generating scenarios releases analysts from following the most obvious event trajectories and allows them to explore consequential possibilities without having to imagine the discontinuities or complex chain of events that lead to such surprises.

This chapter offers three scenarios for the Western Sahel between 2040 and 2045 (summarized in table 3). Each is captured by a fictitious news report: first, a baseline scenario (“More of the Same”) of partial achievement and partial failure, premised on

current demographic trends and haphazard international involvement; second, a best-case scenario (“Breakthrough”) predicated on strong national and international support for a sustained development effort that includes policies and amply funded programs that facilitate rapid fertility decline and dramatically boosts the levels of educational and health-related investments per child in several key countries in the Western Sahel; and third, a worst-case scenario (“Downward Spiral”) combining persistently high fertility rates and the continued marginalization of young people and women in particular, with Western disengagement and pro-jihadist interference from outside the region.

SCENARIO 1

MORE OF THE SAME



November 14, 2043 | 2:53 AM | Updated 4 hours ago

EU-SUS Summit Reaches Agreement on New Five-Year ‘Migration Convention’ —European Aid Up by 20 Percent

BRUSSELS (PND)—After a marathon round of negotiations in the extraordinary summit meeting between the European Union (EU) and the Sahel Ummah States (SUS), the two blocs adopted a new five-year migration convention, agreeing to a 20 percent increase of European aid transfers to this West African regional organization for the period from 2044 to 2048 in exchange for the joint control of migratory flows from sub-Saharan Africa.

The compromise, promptly hailed by the president of the EU Commission as a “breakthrough that cements the EU-SUS strategic alliance,” was brokered by the Spanish prime minister during a tense late-night, closed-door session.

Citizens Without Borders, a Brussels-based non-governmental organization, immediately denounced the accord as “the perpetuation of Europe’s forward defense against the free movement of African migrants” and “yet another sell-out by the Sahelian states.”

The new EU-SUS convention is the fourth such multilateral agreement between the two regional blocs since they instituted their “global partnership for security and development” in 2029. The overall amount of EU transfers to SUS countries is slated to increase from 70 billion euros over the last five years to 84 billion euros for the five years to come.

EU assistance will continue to fund regional screening platforms, or so-called hot spots, set up to filter African asylum seekers en route to Europe, and repatriate rejected applicants. The EU will continue to heavily subsidize imports of European agricultural products to the SUS, fund the Sahelian Anti-Terrorist Task Force (SATTF), and underwrite the SUS’s Comprehensive Family Health and Income Program for the Sahel (CFHIPS)—despite renewed European criticism of the CFHIPS’s “shortcomings with regard to true gender equality.”

In the name of the Sahel Ummah States, the Chadian president and current SUS chairman brushed off European criticism as “an unacceptable interference” in the region’s “Islamic civilization.” To applause from his African peers, he declared that “the SUS’s historic decision to remunerate our women’s

invaluable contribution to strong family ties and stable households offers a dignified alternative to the West's misguided feminism."

According to the Addis Ababa-based African Gender Observatory, an independent pan-African research institute, the state allowance for stay-at-home mothers that SUS introduced in 2031 "is deeply ambivalent: on the one hand, it perpetuates gender inequality and patriarchic structures in the Western Sahel while, on the other, it economically empowers Sahelian women by offering them a viable alternative to the region's crowded job market."

World Bank data for the past decade show a steady rise of female educational and professional attainment levels in the Western Sahel, as well as the slow spread of modern contraception through public and private urban suppliers, but only a gradual and halting decline in the total fertility rate and a slight upward trend in female participation in the region's workforce.

In a communiqué reacting to the new EU-SUS agreement, the Organization of West Africa's Coastal States condemned "the wedge driven into the heart of our continent by the collusion between European selfishness and Islamic conservatism in the Sahel."

In addition to pooling military resources to fight jihadist extremism in the region, the Sahel Ummah States share moderate forms of sharia law and a broad political consensus around "Islamic authenticity" of Sufi inspiration.

According to Hassan Diop, a Harvard-based Senegalese scholar and noted authority on Sahelian politics and development, "from a socioeconomic and demographic point of view, the states of the Western Sahel are stuck in a rut. They get away with it only as rentier states—living off Europe's fear of a massive influx of sub-Saharan migrants."



February 17, 2043 | 7:53 PM | Updated 2 hours ago

Sahelian Women Garner Top Priority at G7 Sahel Annual Summit

NOUAKCHOTT (PND)—After Sunday’s opening ceremony of their annual summit meeting, the heads of state of the recently expanded G7 Sahel got down to their weeklong agenda by putting women’s development issues front and center.

“Our sisters hold the future of the Sahel in their hands,” declared Burkinabe President Alassane Lankoandé, the current chairman of the G7 Sahel. The morning session at G7 headquarters in the Mauritanian capital was dedicated to a discussion of a United Nations Population Fund-sponsored review of trends in Sahelian women’s development, which was then followed by member-state reports on women’s representation in government.

The UN report, entitled “Charting a New Future for the Sahel,” indicated that the lifetime rate of childbearing—or “total fertility rate”—in Senegal, Burkina Faso, and Mauritania had dropped to around three children per woman, considerably faster than UN demographers had expected two decades ago.

The UN report noted that these countries have nearly replicated Bangladesh’s earlier demographic turnaround, and that recent localized cell-phone surveys identify several Sahelian cities, including Niamey, that are nearing the two-child-per-woman replacement level.

The findings of this report were hailed as “a turning point” by President Lankoandé. For the past decade, his Sankarist Party has enforced policies that were initially introduced in the 1980s by Burkina Faso’s late-president, Thomas Sankara, banning female genital cutting, adolescent and forced marriages, as well as polygamy. The government has also launched a series of village campaigns aimed at retaining girls through secondary schooling and supporting qualified female students through college.

The UN report also showcased the successes of Senegal’s more conventional efforts to make modern contraceptives freely accessible through primary health facilities, and integrate sexual education and contraceptive knowledge into the country’s compulsory secondary-school health curriculum.

Yet the report noted that this effort remains incomplete, warning that

“despite noteworthy progress in human development, particularly among women and girls, the momentum of the Sahel’s youthful age structure has kept its population growing, exacerbating infrastructural, environmental, employment, and food security challenges.” The report also noted troubling gaps in fertility rates that persist between the most urbanized groups and rural ethnic minorities, particularly in northern Mali, Niger, Chad, and in Daura, the newest G7 member state (the consequence of the secession of the twelve northerly states from the Nigerian Federation in 2038).

Despite praise from progressive imams in the region, these reforms have faced significant opposition and occasional violence, particularly in rural Mali and Burkina Faso’s northern provinces. Meanwhile, in Bamako, pro-democracy rallies—spearheaded by opposition parties, students, and women’s rights organizations—apply daily pressure for liberal reforms, while police forces try to minimize clashes with Islamist counterdemonstrators.

The final panel of the day, fielded by G7 Sahel chief economists, reviewed advances in the light manufacturing and agricultural processing sectors, women’s employment in these industries, and challenges to increasing efficiency and investment. One panelist reviewed G7 Sahel efforts, funded by Morocco’s aid agency, to restrict absentee herd owners from tribal rangelands, protect pastures from farmer encroachment, and binding agropastoral tenure agreements.

Tomorrow morning, G7 leaders will review the drought-prone region’s faltering agricultural and livestock production trends, recent climate data and forecasts, food imports, mechanisms for acquiring periodic food aid, and options for upgrading irrigation schemes. In the afternoon, they are slated to discuss the challenges of housing, sanitation, potable water, waste disposal, and crime in the region’s sprawling cities. An evening presentation will highlight model programs, linked with South African legal partners, that have formalized land ownership and established interim housing codes in former slum communities in Ouagadougou, Dakar, and Niamey.

For the last two days of this year’s summit, member-state defense ministers will join the G7 heads of state to deliberate on counterinsurgency efforts in the region, and examine means to expand and support ongoing programs designed to train and employ young men who most risk recruitment into the remaining jihadist cells in the region. The summit’s closing ceremony is scheduled for Friday morning, prior to the presidents’ participation in the weekly congregational prayer, Jumu’ah, at Nouakchott’s Ould Mbouja Mosque.

DOWNWARD SPIRAL



May 24, 2043 | 4:16 PM | Updated 5 hours ago

Special Representative for the Western Sahel Calls on UN to Prevent Regional ‘Meltdown’

NEW YORK (PND)—In a dramatic report presented today to the UN Security Council, the Secretary General’s special representative for the Western Sahel made an impassioned plea for international action to halt “a crisis of epic proportions, compromising the present and future of entire generations” in the region.

“The Western Sahel is in the grip of a meltdown, and the rest of the world is standing by watching young Africans violently turn against themselves in hopeless despair,” Bernardo Dombele M’Bala told the fifteen members of the UN’s governing body. The seasoned Angolan diplomat was appointed to the UN role six months ago with a mandate “to propose a plan of action for the multifaceted crisis in the Western Sahel.”

“Since Mauritania has linked its fate to the Arab Maghreb Union and has de facto severed ties to its sub-Saharan neighbors, Senegal is the only country in the Western Sahel that is not engulfed in turmoil,” the special representative stated. “While Senegal is our indispensable gateway to deliver humanitarian aid to the troubled region, its government is not always a cooperative partner.”

The special representative did not elaborate on the tensions between Dakar and the international community. Based in Senegal, the UN operation named Lifeline Sahel has been hamstrung by a series of high-profile expulsions which the local government, pressured by powerful Islamist organizations, justified as a response to “the intolerable conduct of UN personnel in a pious state.”

Just two months ago, an uncharacteristically blunt Organization for Economic Co-operation and Development (OECD) report accused Senegalese authorities of “facilitating the outward migration of anyone willing to leave West Africa. Dakar has become an open floodgate for illegal migration.”

Addressing the Security Council, the special representative insisted that the entire region had “sunken into a war of all against all.” Pastoralists have joined forces to forcibly reclaim former grazing lands and occupy wells, while armed bandits raid towns and cities “in search of spoils.”

According to this grim picture painted by the UN-appointed officer, “Mali is competing with Somalia for the unenviable title of the world’s most failed state, Niger is engulfed in the worst famine since the early 1980s, and Chad has fragmented, its southern part laying claim to international sovereignty while the arid north has become a theater of incessant infighting between Gorane, Tubu, Zaghawa, Anakazza, and so-called Arab communities—honestly, you need to be a seasoned anthropologist to make any sense of it.”

This time, the government in Niamey is dealing with a famine affecting its nearly sixty million citizens, many now in camps around the capital city, rather than the seven million who resided in Niger during the famine of the early-1980s.

According to a recent report by the African Crisis Group, “Maitatsine—movements associated with self-style prophets who violently contest the established order in the name of Allah—have multiplied across the Hausa region. By comparison, their predecessor, Boko Haram, almost seems a well-structured organization with a clear political agenda.”

Dombele M’Bala blamed Europe for its shortsighted calculus. “Since France’s ill-fated anti-jihadist intervention in Mali some twenty years ago, Europe seems to have reached the conclusion that the best place for them to contain militant Islamism is the Sahel,” he stated pointedly. “Yet all of coastal West Africa now runs the risk of being submerged by violence and anarchy.”

The special representative also cited several credible investigations into diverse forms of trafficking—drugs, arms, wildlife, fake medicines, and ever more frequently, humans—using the Western Sahel as a regional hub. He further indicated that airstrips in Agadez (Niger) and Faya-Largeau (Chad) have become “staging posts for international criminal networks.”

“The human cost of our inaction in the Western Sahel is already horrendous, and there are real risks to further delays,” Dombele M’Bala told the Security Council. “If no immediate concerted effort is undertaken to rescue the world’s most youthful population, development will become a mirage in the Western Sahel. What is worse, we, the elders, will have betrayed young Africa.”

TABLE 3. Summary of Scenarios

Scenario	Elements	Implications (2040 to 2045)
More of the Same	<ul style="list-style-type: none"> Regional organization and EU sign agreement: Expanded aid package exchanged for restrictions on EU-bound migrants. Maternal allowances: Region's states use EU aid to pay stay-at-home mothers, subsidizing child health and education. Slow social transformation: In cities, the rise in girls' educational attainment and contraceptive use contribute to moderate declines in family size, widening urban-rural human development gap. 	<ul style="list-style-type: none"> Blockade reroutes migrants: Sahelian diasporas in coastal West Africa and southern Africa outgrow those in Europe. Fragile food security: Food subsidies, food aid, and irrigation feed region in adequate rainfall years. Low reserves make this a highly drought-vulnerable region. Jihadists occupy rural Sahel, shuttering schools, restricting women, taxing relief supplies. Islamist rule towns as mini-caliphates. Conflict stalemate: EU supports G5 Sahel counterterrorism, but expanded effort makes few permanent gains. Cities isolated.
Breakthrough	<ul style="list-style-type: none"> Meaningful reforms: Region's states enforce age-18 minimum marriage age, mandate education to age 16, and expand women's rights in marriage and civil family courts. Surprising fertility declines: Fertility in Senegal, Mauritania, and Burkina Faso track near or below the UN's most optimistic fertility scenario (in the Population Division's 2019 projections). New urban norms: Small-family norm spreads through urban Western Sahel. 	<ul style="list-style-type: none"> High secondary enrollments: Sahelian women close gap in educational attainment and exceed men's participation in college. Bigger remittance impact: Cash influx to small rural families spurs educational gains and underwrites agricultural mechanization. Sporadic violence remains: Militant Islam retains some of its appeal by using backlash to women's rights to drum up support. Urban renewal: Urban growth slows. Reforms provide property rights for long-term slum dwellers, encouraging investment.
Downward Spiral	<ul style="list-style-type: none"> Local leaders reject reforms: Rural leadership eliminates girls' educational facilities and shuns women's rights reforms. Religious movement declares modern contraception "un-African." EU, US adopt containment: Donors disengage from development efforts, shifting their focus to containing militant Islamism. Persistent conflict and drought: Relations between agro-pastoral herders and farmers worsen. Water-sharing and seasonal grazing agreements abandoned. ISIS active in all Western Sahelian states. 	<ul style="list-style-type: none"> Jihadists consolidate territory: ISIS governs an inland caliphate. Criminal networks traffic through major airports. Mali, Chad splinter into ethnic fiefdoms: Warring ethnic militias disrupt humanitarian effort. Regional famine hits hard in Niger: Crop failures and conflict trigger mass influx into urban Sahel and coastal West Africa. Senegal serves relief efforts and migrants: Dakar functions as gateway for incoming humanitarian aid and illegal out-migration.

CHAPTER 6

CONCLUSION

At its current pace of fertility decline, reaching the demographic window—the region’s best hope for economic development and political stability—remains a distant goal for the states of the Western Sahel. Given its population’s youthfulness and momentum, it is difficult to generate a reasonable scenario for the region in 2040–2045 that does not also include periodic food insecurity, some intermittent form of low-intensity armed conflict, and an episodic outward flow of refugees. These conditions are likely to visit disruptive effects on coastal West Africa, North Africa, Europe, and possibly beyond.

The Western Sahel’s demographic crisis is unlikely to dissipate on its own, as a by-product of either rural economic gains or rapid urbanization. Such a scenario of passive demographic change did not unfold in East Asia, in Latin America, or elsewhere in Africa, and it is most unlikely to evolve in the Western Sahel. In terms of a statistically demonstrable ability to influence the timing and frequency of childbearing, there are no acceptable substitutes for coupling improvements in girls’ educational attainment with the provision of affordable, voluntary access to contraception and other reproductive health-related care and information. This same package of programs has been shown to improve other basic indicators of maternal and child health, as well as childhood nutrition.

For international aid donors, this study underscores a general recommendation: Successful demographic turnarounds over the coming twenty to twenty-five years would feature at least one, hopefully two countrywide programmatic success stories, providing an exemplar or two of best practices, a pool of local expertise, and models of community participation that could spread throughout the region. Senegal may be the best candidate to host such a model program. Another focused effort should be launched in an inland state—perhaps Burkina Faso, if its rural areas are pacified. In Niger, Mali, and Chad, the most

effective interventions will likely be those that vastly improve urban services and expand a trained cadre of dedicated health workers to deploy in urban peripheries and refugee camps, where demands for education, family planning, and other reproductive services are typically high.

Could today’s demographic expectations for the Western Sahel turn more optimistic? Perhaps. In several instances, UN demographers have been surprised by the success of well-designed programs, the rapid spread of a small-family norm, and faster-than-expected declines in fertility. For example, by 2010, the total fertility rate in Bangladesh was estimated to be fully one child below the UN Population Division’s 1992 low-fertility projection, its most optimistic scenario. Similarly, by 2005, Iran’s total fertility rate had declined to 2.5 children below the Population Division’s 1992 low-fertility projection. Whereas such gross under-projections by UN demographers have been rare, it would be unwise to ignore recent, modestly successful efforts in the Western Sahel to increase girls’ educational attainment and to make quality family planning services more accessible—most notably in Senegal, Burkina Faso, and in southern Niger.⁹⁴ These provide some basis for cautious optimism.

The spread of the region’s jihadist insurgency, however, raises questions as to how far women-centered programs can be safely and successfully extended beyond the edges of the Western Sahel’s inland cities. Thus, jihadist violence and intimidation represent self-perpetuating impediments to fertility decline. Absent serious progress on these coupled crises, policy makers in the EU and the United States may eventually disengage (as they already have from Somalia today), concluding that containing the Western Sahel’s jihadist insurgency and out-migration at the region’s frontiers is a more viable option than development assistance.

Go to Key Findings and Recommendations

Acknowledgments

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