

The Future of Family Planning Programs

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National family planning programs have been an important instrument in accelerating global fertility decline and in restricting ultimate world population to a level probably below ten billion. They began to come into being after 1950 and will probably go out of existence in most of the world's regions by 2050. The archetypal programs were instituted in Asia and North Africa. The end of the twentieth century is an appropriate half-way mark at which to evaluate the twentieth-century programs and to assess what changes in them will be needed for the twenty-first century. Some changes are necessary because dramatic events have occurred: (1) long-term replacement-level fertility has been attained in most of East Asia and some of Southeast Asia, and accordingly, some programs there are being phased out; (2) mainland South Asian fertility has been slower to decline; (3) international donor funding is diminishing and may not be significant during much of the twenty-first century; (4) the 1994 International Conference on Population and Development held in Cairo called for a radical change in programs away from demographic aims and toward reproductive health and the improvement of the situation of women; and (5) the future family planning frontier will be sub-Saharan Africa, for which radically new types of programs may have to be developed. These issues were discussed in January 2000 at a conference held in Dhaka, Bangladesh. A selection of contributions to the conference is published here. This article provides an overview of the issues based partly on this selection and partly on the discussions that took place at the conference. (STUDIES IN FAMILY PLANNING 2002; 33[1]: 1–10)

Family planning programs, like the fertility transition that they have helped to drive, will be a transient phenomenon. In the most economically developed countries, fertility decline did not become general until the last part of the nineteenth century and in developing countries, not until the last third of the twentieth century. Even now fertility decline is not universal. Nevertheless, the most recent United Nations (1999a and 2000) medium population projection shows global fertility falling to replacement level by 2050 and the world population growth rate decreasing to 0.04 percent or close to stationary by the end of the twenty-first century.

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Although transient, these events will be seen in retrospect to have been momentous. They are the demographic—and, to a large extent, the social—side of the Industrial Revolution. The world population has grown from little more than one billion in 1850 to six billion by the end of the twentieth century and will increase to nearly 10 billion (if the projection proves to be correct) by the end of the twenty-first century. This phenomenon will be unique, never previously witnessed and never recurring. This growth brought family planning programs into existence; they helped confine the global population to six billion by 2000 and could, with increased efficiency, confine it to fewer than ten billion (perhaps nine billion, just possibly eight billion) by 2100.

The span of family planning programs will be even shorter than that of the fertility transition. The first birth-control clinics opened in the United States and Britain date back only to 1916 and 1921, respectively, and the first government family planning programs were implemented in the 1950s in India and Pakistan. Where they have been most successful, in places like Singapore and South Korea, they are already being phased out as fertility levels plummet well below replacement level (Jones and Leete¹), and most likely they will have disappeared

by the middle of the twenty-first century, except possibly in parts of sub-Saharan Africa.

This issue of *Studies* aims to examine this brief span, by summarizing the situation at the end of the twentieth century to suggest what might and should be done in the critical first decades of the next century. It assumes that national family planning programs have played a significant role in reducing the levels of fertility in the developing world from an average of six births per woman in the late 1960s to three births today (United Nations 1999a, total fertility rates). Not everyone agrees that they have played this role. Pritchett (1994) argued that fertility levels across the world largely have reflected desired fertility and that therefore, desired fertility, conditioned by socioeconomic change, was the determining force whether or not family planning programs were in place. Bongaarts (1994: 619) replied both that Pritchett's argument contained analytical errors and that basically he had ignored "the much broader [than the provision of contraceptives] and powerful influence programs can have by reducing noneconomic costs of contraceptive use, such as lack of knowledge, fear of side effects, and social and familial disapproval." Those of us who have worked with contemporary family planning programs have been convinced of those programs' impact by the certainty of their clients that they could not control their fertility without the support of the program and that their parents' uncontrolled fertility was the inevitable consequence of the absence of such programs in their time.

Powerful national family planning programs evolved in Asia where the archetypal ones have operated in Bangladesh, India, Indonesia, Singapore, South Korea, Taiwan, Thailand, eventually Nepal, and, for a while, in Malaysia. An extreme form of such programs was developed in China. These programs were implemented by governments that promoted a new morality: that high fertility was bad for the country and for the family. The programs extended power to the younger married generation to make reproductive decisions and supplied free or cheap contraceptives. In Asia, such programs did not fully develop or succeed where they met religious opposition (as in the Philippines), politically expressed ethnic opposition (as in Malaysia), or feudal social structures (as in Pakistan). Similar programs were later developed in much of North Africa, in Egypt, Morocco, and Tunisia.

Bongaarts and Watkins (1996) examined the onset of fertility decline in a range of countries by the level of the Human Development Index (HDI). The HDI—combining measures of income, mortality, and education—was devised by the United Nations Development Program in 1990. They drew attention to onsets of decline over time occurring at ever-lower HDIs, a phenomenon that was clear only in Asia. Equally clear from their analy-

sis, however, is that, with one exception (Haiti), every fertility decline in the world starting at an HDI of 0.45 or lower occurred in countries with comprehensive national family planning programs: Turkey, Tunisia, Indonesia, Morocco, Egypt, India, Nepal, and Bangladesh (by descending order from HDIs of 0.45 to 0.32). This list does not contain China, Hong Kong, Malaysia, the Philippines, Singapore, South Korea, Sri Lanka, Taiwan, or Thailand, all of which began fertility declines at higher HDI levels, because these levels were reached early, before fully developed family planning programs were in place (although such programs almost certainly accelerated subsequent fertility decline).

The significance of these huge, fairly efficient family planning programs can hardly be overstated, if only because Asia is the home of three-fifths of the human species. A comparison of the number of births in the years 1995–2000 with that which would have occurred had the 1955–1960 fertility level remained constant shows that Asia accounted for almost three-fourths of global fertility decline and four-fifths of the decline occurring in the developing world. Two Asian countries, China and India, with less than two-fifths of the world's population, accounted for almost half of the fertility decline (United Nations 1999a).

The new family planning programs were greatly, even critically, assisted by new contraceptives suited for use among huge, poor, often illiterate populations. From the early 1960s, a succession of technological breakthroughs produced oral contraceptives, the intrauterine device (IUD), injectables, implants, and easier-to-use and better techniques for achieving sterilization (especially female sterilization) and for performing abortions. These breakthroughs were no accident. Rapid global population growth and projections of even higher growth rates had caused increasing concern in the West during the 1950s and 1960s, which had pointed biomedical researchers toward working on new forms of contraception and had unlocked resources for this purpose and also for international assistance for family planning programs. This concern also changed societies so that the small or even childless family became a justifiable aim in the West and having smaller families became defensible in developing countries. The result was that the number of births in 1995–2000 in the developing world was 40 percent lower than it would have been had the fertility levels of four decades earlier been maintained. Moreover, it was, unexpectedly, 47 percent lower in the developed world. This latter change is likely to affect the way Western nations view fertility decline.

The spread of changed ideas about family size and the legitimization not only of the use of contraceptives but also of their provision by governments was not a

haphazard affair. International organizations played an increasingly important role, from the support the United Nations Population Division gave to demographic conferences in 1954 and 1965, to the first advice on national family planning programs offered by the United Nations Secretariat and the World Bank in 1965, to the establishment of the United Nations Trust Fund for Population in 1967 (renamed the United Nations Fund for Population Activities or UNFPA in 1969). Beginning in 1974, UNFPA organized decennial international political population conferences, which, together with a vast array of regional and national meetings, induced more and more governments to organize family planning programs. These programs grew from two in the 1950s (India and Pakistan) to 15 in the 1960s and many more thereafter.

Despite the successful expansion of family planning programs, their goals and demographic rationale have always been the subject of discussion and debate. As Finkle and McIntosh note in their review in this issue of the experience of successive UN decennial conferences, shifting political support for family planning programs has not always been anticipated by their proponents and donors. Yet donor support for programs expanded throughout the decades of the 1970s and 80s. Nevertheless, by the 1990s, three changes had begun to erode the position of some family planning programs, although many would persist or be created, and presumably many will be needed well into the twenty-first century. The first change was their own success. Coupled with socioeconomic change, the programs had reduced the rate of annual global population growth from more than 2 percent in the late 1960s (with a potential to be 3 percent by 2000) to 1.4 percent by the end of the twentieth century. The second change was a diminution of the level of foreign aid contributed by the rich countries, with an especially steep decline in support for fertility reduction toward the end of the century. The third change was the increasing importance of the commercial sector in selling contraceptives. The private sector had always been dominant in the industrialized countries and seemed likely to become so long before the middle of the twenty-first century in most of the rest of the world as living standards rose and as governments shut down family planning clinics and adopted a lower profile in contraceptive provision.

The View from the End of the Twentieth Century

The first weeks of the year 2000 seemed to be an appropriate time for surveying the experience of the latter part of the twentieth century and for trying to assess the needs of the new century. Accordingly, the conference that is reported in part here was organized.²

At a time when decisionmaking was needed, it was a time of hesitation. Fertility, as measured by the total fertility rate (or the average number of births that would be experienced by a woman if current fertility rates remained constant), had fallen globally from almost five births in the 1960s to fewer than three births, or about two-thirds of the way to replacement level. The fertility rate was still about 3.2 children per woman in the developing world, however, 3.6 in South Asia, 4.0 in West Asia, and 5.8 in sub-Saharan Africa. World population had doubled since 1960 from just over three billion to just over six billion, but the next half-century would add almost three billion more according to the United Nations medium projection, and close to five billion more according to its high projection (United Nations 1999a). Although the world's population growth rate had peaked at 2.04 percent per annum in the later 1960s, the annual absolute increment to global population had continued to rise from 72 million at that time to 80 million in the early 1990s, falling only slightly by 2000.

By the end of the twentieth century, international funding for family planning was declining. Radical new forms of contraception either had not appeared or were beset by legal difficulties. Six years of experimentation since 1994 had shown just how hard it was going to be to change the Asian type of family planning program to the model devised at the International Conference on Population and Development (ICPD) in Cairo, which was based on a broader approach emphasizing reproductive health. Some of the leaders in the field were confused or disheartened. The two largest programs in operation were unsatisfactory: China's continued to be coercive and India's still relied primarily on female sterilization (at around two-thirds of all method use [United Nations 1999b]). Fertility decline in most of sub-Saharan Africa was only just beginning, and experience seemed to show that the Asian national family planning program model, focused almost solely on married women, might not be directly transferable to Africa. If a continued rise in income per capita was needed to encourage fertility decline, the world's third-largest family planning program, that of Indonesia, might be in trouble, as might those of all countries of sub-Saharan Africa. The reactions of the countries already containing 44 percent of the world's population, where fertility was below the long-term replacement level, were uncertain. These are among the issues that this publication is designed to address.

The Bongaarts and Johansson article examines future trends in contraception. The authors express no doubt that the global fertility transition essentially has been achieved by the new contraceptive methods that became available around 1960 and that future declines in fertility will depend directly on the increased use of

modern contraceptives. Our interpretation of their discussion of the probable advances in contraceptive technology is that these will be valuable but supplementary. The world is not going to witness another great leap forward in technology of the revolutionary kind that occurred in the 1960s.

Our interpretation is that continued increases in levels of contraceptive use necessary to achieve global replacement-level fertility by the middle of the twenty-first century, as postulated in the United Nations medium population projection, will depend on four factors. The first is socioeconomic change: rising real incomes per capita; perhaps more important, higher levels of education, especially among women; a greater proportion of the population living in urban areas; and a higher proportion of the workforce obtaining nonagricultural employment, especially jobs other than subsistence or peasant farming. The second factor is continued demographic change, particularly in the form of declining infant and child mortality. Typically, countries with total fertility rates above six children per woman have infant mortality rates of around 125 deaths per thousand live births, and those with total fertility rates between five and six children per woman typically exhibit infant mortality rates of around 100 deaths per thousand live births. The third factor is the diffusion of the idea of fertility control and its practice. The fourth factor, especially in most countries with high fertility, is the existence of family planning programs that can facilitate the diffusion of family planning ideas and access to the means of implementing them.

Changes in the level of contraceptive use might be expected to be used to estimate changes in fertility levels in order to project the size of future populations. Instead, more confidence is expressed in the continuing momentum of fertility change, and therefore, the projections of contraceptive change estimated both by the United Nations and by the Futures Group that are discussed by Bongaarts and Johansson, as well as the estimates in their own work, use as their basis the United Nations medium fertility projection, and the number of users needed to achieve this estimate is calculated. Ironically, over the coming century the contraceptive demand may vary little between the three projections, because the low projection would require higher levels of early use but thereafter would constitute a lower base population needing contraceptive supplies, whereas the converse would be the situation with the high projection.

The kinds of national program that could help provide these contraceptives would be shaped by the consensus reached in 1994 at the ICPD (United Nations 1994). This consensus called for family planning programs with a human face that placed their emphasis on clients' needs,

but this prescription did not differ greatly from what the better national family planning programs had long identified as the best practice and the most desirable aim. Demographic targets were disowned, but the ICPD Program of Action still had much to say about the demographic consequences of persistent national efforts in the population field. The major change sought was a movement from the concept of "family planning" to that of "reproductive health." The latter concept clearly was wider than the provision of contraception. It included assessing and treating reproductive morbidity at the time of contraceptive provision and thereafter. Its reference to sexual health could be taken to refer to attitudes and philosophies regarding sexual relations. The recommendations could be interpreted to refer as well to intergender relationships and to the situation of women relative to men. At the widest definition of the document, it was a broad social agenda indeed. Moreover, its focus was no longer confined to the family but embraced the individual regardless of marital or family status.

These changes in focus could be necessary to ensure that the programs reach their optimum demographic targets. Better service would attract more clients and encourage more clients to continue practicing contraception. On one hand, the older programs in North Africa, South Asia, West Asia, and possibly East Asia were acceptable to governments and probably to the great majority of their constituents, especially because they managed to provide the contraceptive message and supplies with little reference to sexuality. The attitudes reflected by that acceptance have not wholly passed, despite how governments voted in Cairo in 1994 or at the Beijing women's conference the following year. On the other hand, programs like that of India, in which family planning is treated as a matter concerning the younger couple, certainly loosened the bonds between young couples and the extended patriarchal family and thereby gave some support to the daughter-in-law. The advent of the AIDS pandemic has created an urgent need for programs to address the individual as well as the family and to introduce the topic of sexuality in sub-Saharan Africa, as well as in the Caribbean and more widely in Latin America, and elsewhere in the world.

In this issue, Helzner reports on a major attempt of the International Planned Parenthood Federation (IPPF) to test the ICPD prescription in its widest possible interpretation. The federation's programs cover family planning, sexuality, protection against genital and HIV infection, sexual abuse, child abuse, abuse of women, and all gender-based violence, which it defines as a health problem in broader terms than the World Health Organization's definition by attempting to move "toward a more comprehensive vision of well-being that includes

not just freedom from disease, but the enjoyment of healthy, pleasurable relationships" (page 58). The IPPF programs embrace a complete social agenda and include the aim of women's being able to decide when and with whom they engage in sexual relationships.

This exploration of the practicability of the broad ICPD agenda is valuable, because it demonstrates the challenges of fostering large-scale organizational change. Just as catalyzing fertility transition was the central challenge faced by family planning programs in the twentieth century, catalyzing bureaucratic transition will be the central challenge of programs in the twenty-first century. The International Planned Parenthood Federation/Western Hemisphere Region (IPPF/WHR) experience suggests that fostering change according to the ICPD agenda is feasible, even in institutional settings where leadership and staff are aligned against change. Indeed, Helzner concludes that even government programs can undertake such changes. This particular experimental approach has been confined to date to Latin America and the Caribbean. The full range of the IPPF/WHR programmatic changes has not yet been tried in any country. The full program probably could be adapted to sub-Saharan Africa, Melanesia, and, with modifications, to parts of Southeast Asia. Problems of adaptation might be greater in South and Central Asia and in North Africa. So far, this work has been undertaken by nongovernmental organizations (NGOs), affiliates of the IPPF, in a region where human development indexes were high enough to begin a largely spontaneous fertility decline and where government programs have not been of critical importance. The author points out that the region has not had Asian-type state programs, and that only in Colombia does a government program provide the majority of contraceptive services.

The real problems of such extended programs may lie elsewhere. IPPF/WHR programs were adopted because of declining donor interest in traditional family planning programs and, therefore, the family planning NGOs "accepted the challenge of changing their focus and their image" (page 53). They pursued this plan in nine countries where populations are generally not dense and where fertility transition was already well advanced: Five had total fertility rates below three children per woman and three more had rates below four children. The two funding agencies involved, the United States Agency for International Development and the European Union, certainly regarded the work as experimental and as valuable in showing the planners of government programs what could be done, but they were not likely to provide governments with the kind of funding needed for such work, funding of the sort that they had once been advanced for national family planning programs. Fully de-

veloped national programs of this type would be both expensive and charters for massive social change. As such, they would meet a good deal of opposition in Asia and North Africa. Within those governments, a range of ministries would claim that various segments of the work fell within their own provinces.

This assessment is not so pessimistic as it sounds. The experimental work is of great value. Some of the approaches being tried out could be absorbed by most national programs, and more by a smaller number. In the next few years, however, most national programs will probably move no farther toward absorbing the ICPD agenda than they can by shifting their focus to that part of the agenda confined to reproductive health and by representing the best family planning practice. Other programs, especially those run by NGOs, may take on much of the work pioneered by IPPF/WHR, even if much is not transferable to national programs, or at least to national family planning programs.

The article by Simmons, Brown, and Díaz takes up this question of transferability of lessons from successful pilot projects and field experiments to large-scale national programs. The authors review projects from the dawn of the national family planning era, such as the Taichung Project, which served as a model for developing the Taiwan program, to the collaboration of the International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B) with the Government of Bangladesh, whereby the Matlab project was used as a model for improving the national program, to the current work of the World Health Organization in introducing new contraceptives. This article marshals organizational development theory to inform strategies for using developmental pilot projects to guide structural and functional programmatic change. The case studies cited show that evidence-based change is possible, but also raise the question of why so few examples are found from recent national family planning program experience of successful organizational reform. Perhaps, until they were jolted by ICPD, the directors and managers of these programs believed that enough experience had been accumulated globally and had been recounted at conferences or given as examples by donors. A worthwhile exercise for readers is to select a national program with which they are acquainted and try to apply to it the seven lessons outlined by Simmons and her colleagues for the transfer of the approaches described in the Helzner paper.

The systems paradigm for large-scale programmatic change proposed by Simmons et al. may be more appropriate to the research needs of family planning programs in the twenty-first century than are the discrete problem-solving models that are represented by most operations research projects conducted in the twentieth century.

Operations research may be more useful for introducing marginal improvement in the performance of a program than it is for guiding the restructuring or phasing out of an entire organizational system.

Individual Programs at the Beginning of the Twenty-first Century

Two points had become starkly clear by the beginning of the new century: The first was that the agreed-upon ICPD target of providing high-quality reproductive health services for all by the year 2015 would require a huge increase in expenditures. The second was that international assistance in providing contraceptives, which covered 41 percent of their cost from 1992 to 1996, declined by 24 percent between 1996 and 1999 (UNFPA 1999). Therefore, funding difficulties endangered both the continuing fertility decline and the movement toward the kind of reproductive health services demanded at the 1994 Cairo Conference. One way that national programs could meet the situation was by aiming at greater efficiency.

A prime example of the problem and its possible solution came from the Bangladesh national family planning program. In the 20 years prior to the early 1990s, Bangladesh had almost halved its total fertility rate from 6.3 children per woman to 3.3 children. It was the poorest country to have achieved such a low fertility level. A comprehensive program was devised, guided by ICDDR,B findings about how it should function in a society in which women were secluded by the rules of *purdah*. The program had included, at least in intention, regular visits to every household in the country by government female family planning workers. The cost had been high, and an unusually large proportion of all costs had been met externally, mostly by the World Bank. It was clear by the end of the twentieth century that this level of support would not be sustained.

The obvious way to cut costs was to reduce the expenditure supporting household visits. Originally, the doorstep-delivery system was praised on the grounds that it overcame the strictures of *purdah* through contact with women in their own homes whereby they were brought into the modern world of family planning. At the end of the century, that social change, partly caused by the family planning program, had proceeded to the point where women were considered likely to visit a central point, such as a health clinic, to obtain family planning services. Moreover, their leaving home to visit a clinic would promote broader ICPD objectives by further eroding *purdah*. The circumstances of the new approach were inauspicious: Demographic and Health Surveys showed little further spread of contraceptive use and

little further fertility decline since 1992, suggesting that at the existing socioeconomic level of Bangladesh, some kind of family planning saturation level might have been achieved.

The Arends-Kuenning article examines the situation in Bangladesh, which may come to represent a wider problem if funding continues to decline throughout the developing world. Donors are recommending scaling back household visits and attempting a transition to greater reliance on long-term methods such as sterilization or the IUD, which would require a smaller workforce because fewer provider-client contacts would be necessary.

The study reported here concluded that home visits had been successful and that their abolition could have a serious impact on the program at a time when contraceptive prevalence had reached a plateau. Instead, an intermediate aim is suggested whereby such visits would be restricted to those women who are less likely to use clinic services, the poor and the uneducated. The donor recommendation that the use of long-term methods be promoted is a cause for some worry. The idea of bringing pressure to bear on women to use any specific method could be seen as contrary to ICPD recommendations that clients should have control and choice in reproductive matters. Bangladesh has often been cited as providing a democratic cafeteria of contraceptive choice in contrast with the Chinese and Indian governments' emphasis on long-term methods. A problem may also arise from the tendency in countries with a predominantly Muslim population to be suspicious of the religious legitimacy of long-term, future-oriented methods. Use of oral contraceptives accounts for less than 8 percent of total method use in countries without a Muslim majority, including China, India, South Korea, and Thailand. In such successful Muslim programs as those in Algeria, Bangladesh, Egypt, Indonesia, Iran, Morocco, and Turkey, however, pill use amounts to 21–85 percent of the total.

Even greater challenges are encountered in sub-Saharan Africa, the region that is least predictable in terms of future economic, contraceptive, and demographic trends and hence likely to become most important in determining future global population. As Caldwell and Caldwell note, outside of Southern Africa, modern contraceptives are used by less than one-tenth of all women of the region. The proportion of men undergoing sterilization probably will remain negligible, and female sterilization and the IUD will remain secondary methods. The highest levels of contraceptive use have been obtained by an expensive government program in South Africa through the provision of oral contraceptives and injectables to 80 percent of black African acceptors. Governments have been unwilling and unable to provide the convinced and determined leadership found in Asia,

in part because weak political commitment may reflect a weak demand for contraceptives. Although poverty has been one factor in low contraceptive demand, surprisingly, the economic setbacks nations have experienced and the higher costs to families of schooling and health care encountered since the mid-1980s appear to have been important in the onset of fertility decline. Total fertility rates have fallen to almost three children per woman among the 7.6 percent of the population living in Southern Africa and to around 4.5 children in Ghana, Kenya, and southern Nigeria, but remain at nearly six children per woman for the region as a whole. In most of the region, the demand for contraception is for birth spacing, with methods used as substitutes for traditional postpartum sexual abstinence. The balance of demand is shared between the desire to prevent premarital or extramarital pregnancies and the desire to limit family size. Family planning programs are now expected to provide condoms and advice in the battle against the world's worst AIDS epidemic. Caldwell and Caldwell argue that the world has developed but one national family planning model, based on providing services almost exclusively to married women and meeting the needs of Asian and North African populations. In order to provide for the inhabitants of sub-Saharan Africa and to maximize the rate of fertility decline, the needs of unmarried individuals of both sexes and of married men, all groups reluctant to visit family planning clinics and unlikely to receive satisfactory service there, will have to be met. Such an effort may require more than social marketing. It may require marketing with the help of the commercial sector either by means of a subsidy or by undertaking or organizing wholesaling of supplies. It may also compel the recognition of the central role hormonal methods, both the pill and injectables, must play in the early years of an African fertility transition.

The weakness of African family planning programs also derives from organizational limitations of the one-design model in the world's most culturally heterogeneous region. Family planning programs in Africa are organized through bureaucracies and nongovernmental organizations that use structures and activities that resemble those of Asian programs. Even community-based programs typically function as extensions of clinical service bureaucracies. In Africa, however, the institutions of government and bureaucracy lack historic grounding, and the institutions of extended family, kinship group, and traditional village governance remain relatively vibrant. Finding ways to tap the institutional strength of African social organization will be crucial to the success of African programs in the twenty-first century.

The mounting health needs of Africa's cities will further complicate the African family planning strategic

agenda in the twenty-first century. United Nations estimates now show that nearly all population growth in Africa is urban growth; informal settlements are growing at alarming rates, adding complexity to a mounting urban reproductive health and poverty crisis. In the twenty-first century, African governments must address the expanding reproductive health needs of two impoverished but contrasting societies, one rural, traditional, and structured, the other urban, dynamic, and diffuse.

The giant national family planning programs are those of China and India. These are the only ones that may be kept in place once long-term fertility replacement levels have been attained, and indeed, that seems to be the situation already in China. The Chinese government might welcome a decline in absolute numbers, and the national programs, without, perhaps, their present level of funding or vigor, might be maintained even after population size begins to contract. Both programs have made use of duress of a type that ICPD opposed, in China since 1971 and in India at times and in places during the 1960s and nationally during the 1975-77 Emergency, proving in each case that a coercive approach can reduce fertility. Both programs have concentrated on a few fertility-control methods, principally the IUD and sterilization, and in both countries abortion is legal.

In her article in this issue, Attané provides insights into the Chinese program. China nearly halved its total fertility rate during the 1970s (as did Bangladesh during the 1980s). Attané, like other observers, has no doubt that the program did lower fertility levels, although she argues that by the 1980s, rising income and widespread socioeconomic change were assisting the decline. She goes farther, pointing out that the enforced lower fertility has changed society, especially the nature of the family, spousal relations, and women's position. Presumably, all these changes will sustain the fertility decline.

Her most important observation with regard to the future is that the Chinese program is likely to become less coercive. The government is sensitive both to external criticisms of the program and to internal resistance. That resistance should not be underestimated: 20 percent of all births are still of third or higher birth order. A relaxation can occur, partly because of changes in the society. More important, fertility is low, but it has been so for a long time. The smaller numbers of births in the 1970s mean that fewer potential mothers are living today. Great heterogeneity exists according to region in the number of births permitted and even greater variety is evident in enforcement of fertility policy.

Obstacles to fertility decline in China also are foreseen that make the government cautious. The greatest problem is that nearly the whole population is dependent on children, chiefly sons, for support in old age. The

farming population cannot hire outside workers, and agriculture depends on the existence of sons, daughters-in-law, and grandchildren. In fact, the area of land distributed to farming families is determined by their size. Far from moving to counteract these pressures by trying to provide comprehensive national old-age pensions, adequate old-age homes, and support of the elderly when they are sick or injured, economic reforms are causing the disappearance of the cradle-to-grave social welfare system. The result is illicit second or third births, sex-selective abortion, and probably some female infanticide.

In India, an attempt is being made to move toward ICPD prescriptions, although the expansion of contraceptive choice is slow. The ICPD call for more citizen and community involvement came at a fortunate time for India, however, when programs of administrative decentralization were under way, providing more power to the lowest-level councils, the *panchayats* (village councils). After initial hesitation about the division of roles, the *panchayats* now seem to be expected to sustain public enthusiasm for family planning and to administer the local facilities while state governments supply the contraceptives. Faster economic growth, flowing from a liberalization of the economy during the 1990s (8 percent growth per annum, compared with half that rate two decades earlier) and rising educational levels also appear to be coming to the program's aid.

Moving into the Twenty-first Century

The Jones and Leete article takes the leading examples in Asia to show what is likely to happen there and around the globe as the twenty-first century advances. After Japan reached the long-term fertility-replacement level in the 1960s, China, Hong Kong, and Singapore followed in the 1970s, South Korea and Taiwan in the 1980s, Thailand in the early 1990s, and Sri Lanka at the end of the century. Although none of them is likely to have declining populations before 2030, governments were alerted by declining numbers entering the labor force from about 1990.

As early as 1986, the Singapore Family Planning and Population Board was closed, to be followed by the pronatalist New Population Policy in 1987. Since then, Singapore's total fertility rate has remained about 1.6 – 1.7 children per woman. At the same time, Malaysia abolished advocacy of small families and reduced the capacity of its own family planning program, although its fertility was still well above replacement level. South Korea adopted a less active population policy in 1996, and, although the family planning program continues to func-

tion, family planning workers are no longer employed, and those contraceptives not purchased from the commercial sector are obtained from hospitals as part of normal health-care provision. Taiwan is following a similar path. In Indonesia, the Family Planning Board has been given a wider mandate for social and family change, whereas in Thailand debate has begun about the need for continuing organized family planning. In Sri Lanka, the program has adopted a lower profile. In South Korea and Taiwan, suggestions have been put forward that the programs should concentrate on other problems, especially the growing proportion of the aged population.

Harbison and Robinson look farther into the future. They present two central postulates. The first is that demographic change reformulates opinions and ideologies. The burst of population growth that followed World War II led to support for fertility-control policies and so helped eventually to reduce population growth. The achievement of below-replacement fertility must lead to ideologies for raising fertility at least to a long-term replacement level, if not now, then certainly when population numbers begin to decline. In much of Europe, this change could begin to occur in the next few years and increase in tempo after about 2030 when a second-generation multiplier effect begins to be felt. The second postulate is that no clean end can be expected to the demographic transition in terms of stationary population (and hence demography as a subject area is not dead). The interplay between ideologies, material factors, and fertility will ensure undulations in fertility and periods of greater or lesser fertility decline and even population growth.

The basis for the second postulate is that rich countries can, in time, implement policies that will raise fertility levels. The experiments of the 1930s were carried out during a transient unemployment crisis, and those in Eastern Europe of the 1960s and 1970s in poor populations facing severe housing shortages. Future policies based on overcoming the difficulties that having children imposes on families, and especially on mothers, accompanied by views about the disappearance of the culture and the unlocking of government expenditure, will probably work, however. Much sooner than that, governments of rich countries and their electorates, facing the potential for falling population, will lose interest in assisting population control anywhere, even in sub-Saharan Africa where the fertility transition has just begun.

Looking Forward

The half-century preceding the year 2000 was demographically astonishing and unprecedented. Global pop-

ulation increased from 2.5 to more than six billion, with population growth rates rising persistently to the mid-1960s and little evidence available that this trend could be contained. In the 1950s, the feeling was widespread that Asian and African poverty, together with these regions' diverse family structures and cultural attitudes to family size, might frustrate any attempt to reduce fertility globally. A 1950 report by the demographers Marshall Balfour, Roger Evans, Frank Notestein, and Irene Taeuber described their inability in 1948 to help a Chinese peasant population with advice about contraception and their belief that no contraceptive in existence or "on the horizon" could be used to remedy the situation in China (Balfour et al. 1950: 119–120). In 1950, no institution in the developing world was yet dedicated to lowering fertility, and history records no such institutions anywhere. No constituency was found in the West for aiding efforts to control high fertility in developing countries, and indeed, baby-boom fertility characterized the West (the total fertility rate in the United States rising to almost four children per woman).

Yet in 1951, Prime Minister Nehru of India announced that his country would organize a national family planning program, and by 1965, about ten such programs had been created (Berelson et al. 1966). By 1960, the new contraceptive technologies that would provide these programs with the necessary tools were being developed and marketed. In 1952, the Population Council was founded, and by 1959, the Ford Foundation was assisting the Indian program. In the course of the 1960s, Western governments became less cautious about assisting developing-country programs, and by the 1980s, dozens of national family planning programs had been established.

By 2000, signs of further change had emerged. Contraception was being practiced by 70 percent of couples in the West and by 55 percent of couples in developing countries. The global total fertility rate was below three children per woman, and the global annual population growth rate was below 1.5 percent. Population projections showed an end to the world's great growth spurt, probably at under 10 billion by the end of the twenty-first century. Four-ninths of the population of the world and, perhaps more surprising, four-ninths of the population of Asia lived in countries with fertility below the long-term replacement level. This was the case in all major donor countries except the United States, where fertility remained at about replacement level. The Program of Action formulated at the 1994 ICPD in Cairo recommended that national family planning programs not take as a major aim the reduction of fertility but rather focus on the provision of first-rate reproductive health services, which could go as far as improving the general position

of women, mediating gender conflict, and enhancing sexual pleasure. Far from being spurred by these extra challenges, donor governments reduced their funding for the population field in what appeared to be a secular trend.

Clearly, the twenty-first century was going to be different. At its outset, only a few national family planning programs had ceased to operate. Indeed, the total number was still increasing as fledgling programs came into being in sub-Saharan Africa. In Asia and North Africa, programs tended toward ICPD objectives insofar as they represented the best-practice family planning that had always been their aim. They were ambivalent about the broader feminist ICPD agenda, and most probably will have implemented only part of that agenda when, after very low fertility has been achieved, they are closed down. These programs do not oppose the narrower reproductive health-care agenda, but they lack the funds, skills, and health infrastructure to implement it properly. The broader agenda will not disappear, but will be taken up by other areas of government and by NGOs. In these regions, the main agenda in the years immediately ahead will be one of learning to do with less external aid and shifting the cost of programs to national government budgets and to families seeking services in the commercial sector.

The need for national family planning programs will not soon pass in mainland South Asia. In these large, poor countries holding persistent socialist beliefs, the governments probably will continue to provide many of the health services for the poor, including family planning in the package. Ironically, the quantity of contraceptives to be provided will increase, not only with population growth, but also with success in reducing fertility, because this reduction can be achieved only by increasing the proportion of people practicing contraception. South Asia still supports the great majority of the world's population, with total fertility rates at around three or more children per woman, and Bangladesh, India, and Pakistan may, like China, wish to keep their programs in operation once replacement-level fertility is reached. No one is sure what would happen to fertility levels without the government programs.

In contrast, in most of sub-Saharan Africa, the new century will see not the closing down of programs, but their establishment and the creation of approaches to fertility control that are more suited to African society. Until recently, the African demand for contraception has been low, and few governments have been enthusiastic about devoting effort to setting up national family planning programs. The most efficient program was put in place by a racial minority in apartheid South Africa. The position has begun to change as a result of the regional economic

crisis beginning in the mid-1980s. Governments have become more apprehensive of large additions to their populations, and families have become sensitive to steep rises in schooling and health costs as structural adjustment programs are implemented. The position has been rendered far more complex by the advent of the world's worst AIDS epidemic, which confuses attitudes about fertility control and threatens a reproductive health approach because so much of future work may have to be devoted to HIV / AIDS. The ICPD approach might be well suited to sub-Saharan Africa if the region were not experiencing such a shortage of funds and such inadequate health services.

The twenty-first century began with the greatest number of national family planning programs in position that has ever existed. Because of the efficiency of modern contraception, changed attitudes toward having large families, and global social and economic changes, however, fertility has fallen to low levels in the developed world and in East Asia and parts of Southeast Asia. A shift in interest has occurred in these countries to such problems of low-fertility regimes as the burden of aged populations. Donor funding for family planning programs in the developing countries has declined, a premature change, because no certainty exists that fertility will be reduced further in South Asia or that the fertility transition will soon begin in some sub-Saharan African countries, especially among their rural populations.

Nevertheless, by the middle of the twenty-first century, with the possible exception of a few sub-Saharan African countries, national family programs will almost certainly have disappeared, the price of their success. They will have played a critical role during the hundred years when a global economic and social system was firmly established, and will have been the most potent mechanism in ensuring a stationary global population of around ten billion instead of some billions more. The additional increment of population would have posed risks too great to hazard in terms of long-term sustainability. Whereas most of economic and social globalization proceeded unplanned, flowing inevitably from the changes wrought during the eighteenth- and nineteenth-century Industrial Revolution, the creation of national family planning programs was a choice, a rational response to a situation that could have spiraled out of control. Almost certainly, it was an inevitable response. Although family planning programs will tend to disappear, contraception will not. In the stationary (or undulating) future global population of perhaps ten billion, around 80 percent of those in a potentially reproductive sexual

union will be practicing contraception, more than double the present absolute number. An open-ended demand will be expressed for better contraceptive methods and, mostly from the private sector, for the best practice in reproductive health care.

Notes

- 1 References without publication details refer to articles in this issue.
- 2 The conference on Family Planning Programmes in the Twenty-first Century, Dhaka, 17–20 January 2000 was sponsored by the International Union for the Scientific Study of Population's Scientific Committee on Fertility and Family Planning. The chair of the committee was James F. Phillips; the organizer of the conference was John C. Caldwell; the local organizer was Barkat-e-Khuda.

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