

Swarthmore College

Works

Political Science Faculty Works

Political Science

2019

Policy Case Study: Population Policy

Tyrene White

Swarthmore College, twhite1@swarthmore.edu

Follow this and additional works at: <https://works.swarthmore.edu/fac-poli-sci>



Part of the [Political Science Commons](#)

Let us know how access to these works benefits you

Recommended Citation

Tyrene White. (2019). 3rd. "Policy Case Study: Population Policy". *Politics In China: An Introduction*.
<https://works.swarthmore.edu/fac-poli-sci/382>

This work is brought to you for free by Swarthmore College Libraries' Works. It has been accepted for inclusion in Political Science Faculty Works by an authorized administrator of Works. For more information, please contact myworks@swarthmore.edu.

Policy Case Study: Population Policy

TYRENE WHITE



When the People's Republic was established in 1949, China's population was more than 500 million. By way of comparison, that figure was roughly the same as the total population of Europe at that time, and more than three times the population of the United States. Despite urgent attempts to slow down population growth in the 1970s, the country passed the demographic milestone of one billion people in July 1980. By 2017, China's population had risen to approximately 1.4 billion. This population increase alone—approximately 400 million between 1980 and 2017—exceeds the current population size of every country in the world except China and India.

It was numbers like these that led Chinese leaders to implement the so-called one-child policy in 1979, and made them reluctant to repeal it three decades later despite increasingly grave warnings from China's professional demographers that the demographic costs of the policy outweighed the benefits. Despite those costs, which included skewed sex ratios and a rapidly aging population, China's leaders were very cautious about policy reform and delayed major changes to the policy until 2014, and a complete repeal until 2016.

HOW DID THEY GET HERE?

If you ask mainland Chinese why the population grew so large and so rapidly after 1949, they will likely blame Mao Zedong, the leader of the Chinese Communist Party (CCP) who ruled the People's Republic until his death in 1976. His pro-natalist stance and opposition to family planning, they will say, resulted in high rates of population

growth for more than two decades. When the Maoist era ended, China's population stood at 930 million, not quite double what it had been at the founding of the PRC. By the time the post-Mao regime began to enforce a serious birth-limitation policy, China's population had grown so much that even a radical program like the one-child birth limit could not prevent its continued increase for decades to come.

There is some validity to this view. Mao's pro-natalist views certainly slowed the implementation of birth-control programs and contributed to the more accelerated growth of the population after 1949. China's demographic challenge did not begin in 1949, however, nor was Mao's view as crude and simplistic as it is usually portrayed. When the CCP came to power in 1949, they inherited an empire that had experienced a fivefold increase in population over the previous three centuries. Around 1650, China's population size topped 100 million for the first time. From that point, it only took another 250 years to pass the 400 million mark (ca. 1900) and just 50 years more to top 500 million.

From the founding of the People's Republic, population pressures received the attention of Chinese Communist party (CCP) leaders. During the first two decades of the Maoist era, however, the proper approach to demographic issues was hotly debated and contested. Initially, Mao and the CCP, resisted any suggestion that a large population constituted a problem. They argued that what appeared to be "overpopulation" was actually the result of the exploitative system of capitalism, and would disappear as capitalism was replaced by socialism and unprecedented wealth was created by the liberated masses. It did not take long, however, for top officials in the CCP to begin to worry about the population pressures. Some began to speak in more practical ways about the burden of population growth on economic development and to recommend that China amend its population policy to provide more support for family planning education and allow the import of condoms and other contraceptive supplies.

Before these first steps could yield any meaningful results, however, the radicalization of domestic politics interrupted the effort, and advocates of family planning were branded as "rightists," or enemies of the revolution. At the same time, however, the second half of the 1950s was a period of intensified state planning. All institutions and bureaucracies were mobilized to put into place annual and five-year performance plans that would help China achieve its goal of becoming an advanced socialist economy and society. In this context, it was Mao who suggested in 1957 that China should attempt to plan reproduction in the same way it aspired to plan material production. At the time, birth planning (*jihua shengyu*), that is, the attempt to regulate population growth so as to keep it in balance with levels of economic production and growth, was only a goal to be reached at some more advanced stage of socialist development.

As China's population continued to grow rapidly in the 1960s (see Figure 14.1), key leaders such as Premier Zhou Enlai came to believe that birth planning could no longer be postponed. In 1965, Zhou proposed the first national population control target—reducing the annual rate of population growth to 1 percent by the end of the century, and by 1972 he had authorized the creation of an extensive family planning bureaucracy to oversee implementation; provide free access to contraceptives, abortions, and sterilizations; and monitor the enforcement of local birth targets.

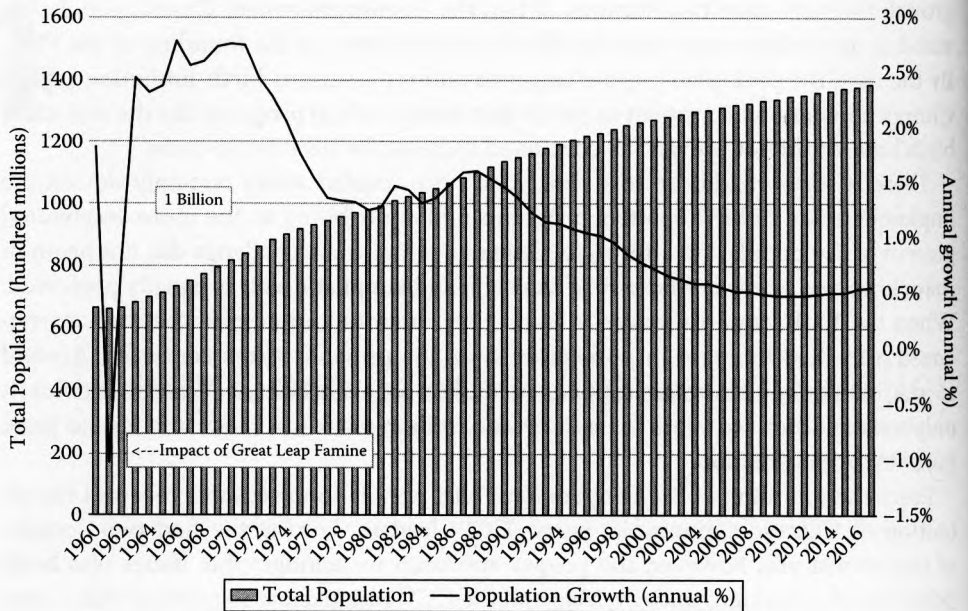


FIGURE 14.1 China's Population (1960–2017)

Source: World Development Indicators, World Bank

Socialist planning thus came to embrace human reproduction in much the same way that it embraced agricultural and industrial production. Local officials who were responsible for meeting grain and steel production quotas now began to receive quotas for babies.

In the early and mid-1970s, the campaign focus was “later, longer, fewer,” that is, promoting later marriage, longer spacing between births (three to five years), and fewer births (a two-child ideal and a three-child limit). By mid-decade, the child-bearing norm began to tighten; the new slogan was “one is not too few, two is enough, three is too many.” In the cities, young couples began to feel pressure to have only one child. In the countryside, they were urged to have no more than two. In 1979, a group of China's top scientists announced that if China were to achieve its economic goals by the year 2000—a goal that the new Deng regime had expressed as achieving a per capita (exchange-rate based) gross domestic product of US\$1,000 by the year 2000 (subsequently reduced to US\$800 per capita), population had to be contained within 1.2 billion. In turn, this meant that the official birth limit had to be lowered to one child per couple (with some exceptions for special circumstances).

In an extraordinary “Open Letter” to CCP members that was published in all newspapers in September 1980, China's leaders defended the new policy and made it clear the high level of priority they attached to it. They argued that the two-decade delay after 1949 was a fateful mistake. By the time the state began to encourage fertility control, a huge new generation of young people had already been born and was approaching its childbearing age years. As a result, even with naturally declining fertility levels (i.e., the average number of children born to a woman during her

reproductive years), demographic momentum meant continued growth of total population size (see Figure 14.1). That growth, which threatened to reach 1.5 billion by century's end if no action was taken, could doom China to poverty and economic backwardness through another generation or more if urgent action was not taken by this generation. To oversee the new policy, a State Family Commission was established in 1981.

IMPLEMENTING THE ONE-CHILD POLICY

The one-child policy was inaugurated just as the Deng regime was about to embark on a far-reaching reform program that gradually transformed China's economy, polity, and society. As previous chapters have described, the socialist economy was decollectivized and marketized; politics was de-radicalized and political institutions revived; society was granted some relief from the all-intrusive party-state that had permeated every aspect of public and private life. Change came in fits and stops, with periods of dramatic change often followed by a partial retreat to safer political ground. This pattern gave Chinese politics a cyclical or wavelike pattern, not unlike the high tides and low tides of the mass campaigns of the Mao era.

Through all of these changes and fluctuations in political atmosphere, the insistence on strict birth control never faltered. It was a constant in an otherwise volatile situation. This does not mean, however, that the content and enforcement of the policy were static. On the contrary, officials at all levels struggled to adapt to a rapidly changing situation to unintended consequences of the policy and, to a lesser degree, international scrutiny and criticism. This translated into several different stages of implementation.

Phase One: Collectivism and Coercion, 1979–1983

In the early years of the program, as the Deng regime fought against the lingering influences of the Cultural Revolution, it was possible to use the tools and institutions of the Maoist era to press for strict enforcement of birth quotas that were handed down to each city, county, neighborhood, and village. Thirty years of Maoism had taught Chinese citizens to be wary of voicing opposition to the latest campaign, taught officials that they could intimidate and coerce anyone who dared to defy them, and taught party leaders at all levels that the failure to meet campaign quotas was one of the most deadly sins of Chinese politics. A poor campaign performance could spell the end of a promising career. All childbearing-age couples, urban and rural, had to receive official permits from the state in order to give birth legally. In addition, provinces and local governments drafted regulations offering economic incentives to encourage policy compliance and imposing stiff sanctions on policy violators. All childbearing-age women were required to undergo periodic gynecological exams to ensure that they were not carrying an "unplanned" pregnancy, and if they were, they were pressed to undergo an abortion immediately. In addition, all CCP members were urged to "take the lead" in implementing the one-child policy by accepting it

themselves, urging family members to do so, and in every respect setting a good example for others to follow.

Gaining compliance from those under their jurisdiction took much more than setting a good example, however. In China's cities and towns, growing acceptance of the small-family norm, free access to contraceptives, and tight administrative control in workplaces and neighborhoods had brought the urban total fertility rate down from 3.3 in 1970 to about 1.5 by 1978, a remarkably low level for a developing country, as was the total fertility rate (see Figure 14.2).

With a large cohort of women about to enter their peak childbearing years, the state deemed even this low level inadequate. To further suppress fertility and prevent more second births, state monitoring intensified in workplaces and neighborhoods. Monthly gynecological examinations for childbearing-age women, plus a system of marriage and birth permits provided by the work unit, ensured that anyone attempting to have a second child was caught in a tight surveillance net. Those who escaped the net faced severe penalties, including fines, loss of employment, and perhaps even one's coveted urban household registration (*hukou*).

If changing childbearing preferences and strong mechanisms of state control worked together to induce compliance with the one-child policy in urban China, rural China posed a far more difficult challenge. Like rural populations in other places and times, life in the countryside encouraged higher levels of fertility. Agricultural work requires household labor, and unlike their urban counterparts, even very young children can be put to work in the service of family income. Moreover, while many urban couples could rely on a state pension for retirement support, rural families had no such welfare net. Children were the only guarantee of old-age support, and the most destitute villagers were inevitably those who were alone and childless. Only a son could assure a couple that they would be spared such a fate. Daughters usually married out of the village and, upon marriage, a daughter's first obligation transferred to her husband's family. Even the most devoted daughter could not be counted on to provide either income or assistance.

In addition to these practical considerations, the traditional emphasis on bearing sons to carry on the ancestral line remained deeply entrenched in the countryside. As a result, although rural fertility levels were cut in half between 1971 and 1979 (declining from approximately 6 to 3), much of rural China remained hostile to a two- or one-child limit, including the rural cadres who would have to enforce the policy. When the rural reforms implemented after 1978 began to relax the state's administrative grip on the peasantry, the launching of the one-child policy set the stage for a prolonged and intense struggle over the control of childbearing.

The struggle took a variety of forms, and evolved over time as the unfolding rural reforms altered the local context. In some villages, women who refused to abort an unplanned birth were subjected to meetings where they were berated, intimidated, and threatened into cooperation. In others, medical teams and party cadres swooped in unexpectedly in an effort to catch women who were eluding them. At worst, women were forced onto trucks and taken directly to the township headquarters, where medical personnel would perform an abortion, a sterilization, or insert an intrauterine device (IUD), or some combination of these. The use of some form of birth control

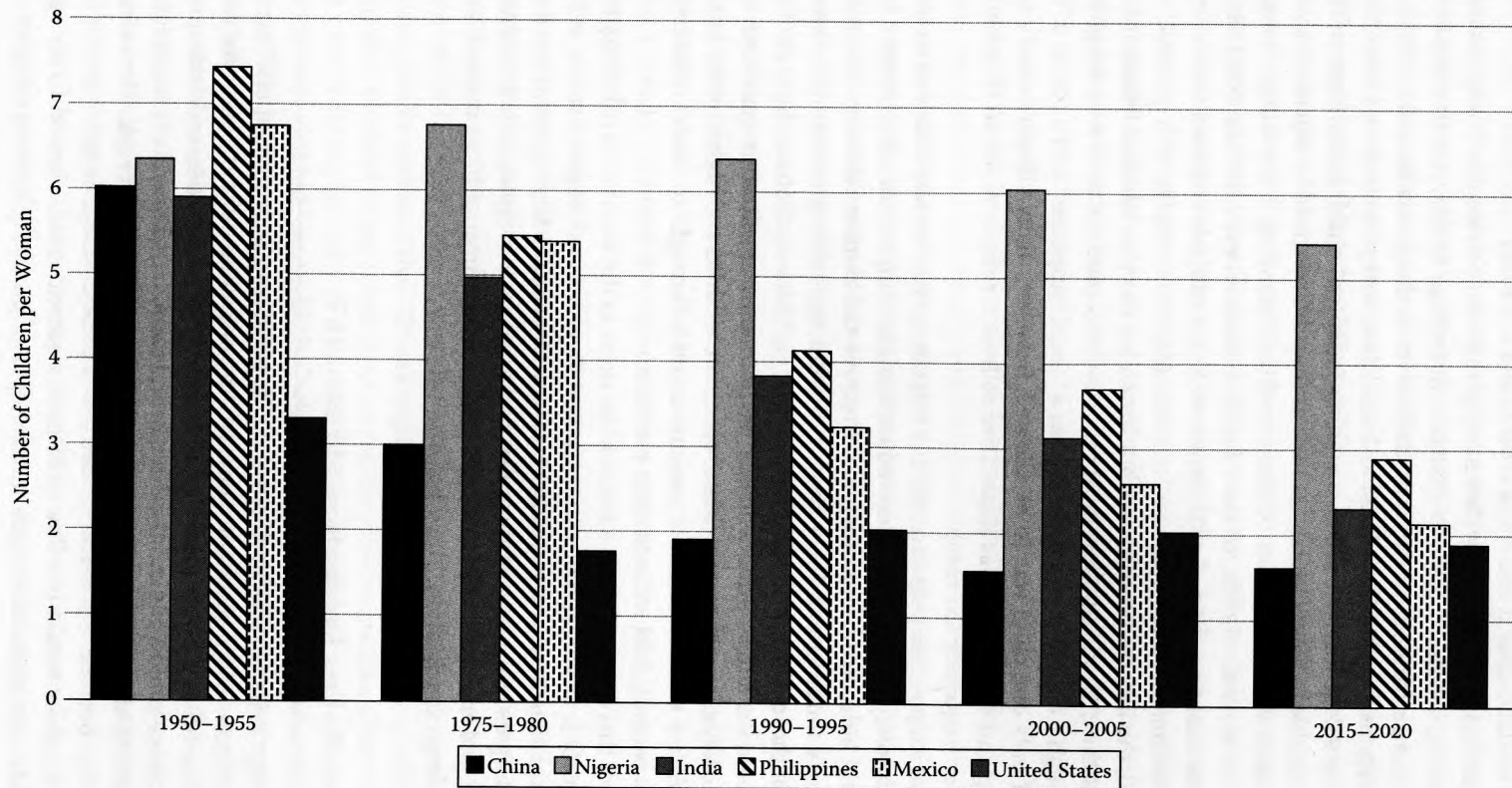


FIGURE 14.2 China Total Fertility Rate in Comparative Perspective

Source: United Nations Population Division, World Population Prospects: The 2017 Revision, Population Database

after the first or second child became mandatory, and in the countryside the preferred method was the IUD, since it was more reliable and not easily removed.

Rural villagers responded with a wide variety of resistance strategies. Enraged family members who came home from a day outside the village to discover that the birth control team had performed abortions on their wives or daughters sometimes beat or killed those responsible. Others bribed local officials to accept their stories when they returned to the village after an absence with an “adopted” child. Subterfuges of this sort were acceptable to rural officials, as long as they did not need to register the new infant as a birth in their jurisdiction. Others used their standing in the village to avoid compliance; many rural officials, or their family members, expected the compliance of others while flaunting the policy themselves. Some officials colluded with village families to hide unauthorized pregnancies, particularly for couples with no sons.

Worst of all, the intense pressure to limit births led to many cases of female infanticide. Absent the one-child policy, most families welcomed the arrival of daughters and sons, though a daughter was described as a “small happiness” and a son as a “big happiness.” If only one child was to be allowed, however, many villagers—male and female, young and old—felt it was imperative to have a son, so much so that female infanticide was frequently the result.

There were two possible responses to this volatile rural situation. One was to relax the one-child policy, hoping that more education and support for rural women and children would hold birth rates down and improve cadre-mass relations. The other was to intensify enforcement for a short time, but use widespread sterilization to guarantee that those who already had two or more children would never have another. In the short run, the latter option won out, and a massive sterilization campaign was launched. The key campaign target was to eliminate all third and higher-order births. Once that problem was solved, more pressure could be brought to bear on those who were having a second child without state permission.

The result of this campaign was a fourfold increase in the number of tubal ligations performed in 1983, as compared with the previous years, and large increases across every category of birth control procedures. So severe were the local pressures to meet sterilization targets that many women who had long since completed their intended childbearing, and had been effectively utilizing another form of birth control, were forced to undergo sterilization.

Phase Two: Policy Relaxation, 1984–1989

As the campaign began to play itself out and elite politics took a more “liberal” turn in the mid-1980s, a decision was made to modify the one-child policy to allow for more exceptions. Fearful of a breakdown of authority in the countryside and widespread anger over the one-child limit and the often brutal tactics used to enforce it, leaders in Beijing decided to simply concede the need for a son in the countryside. Henceforth, the rural policy became a one-son or two-child policy. Village couples whose first child was a daughter would be allowed to have a second child, allowed to try again for a son. This concession was made in the hopes of pacifying restless villagers and improving enforcement, but over a period of several years, the net effect of this and

other rural reforms was to encourage local governments to unduly relax their enforcement efforts. Village officials who themselves were subject to the birth control policies often colluded with their neighbors to avoid enforcement efforts undertaken by outside teams. As the agricultural reforms destroyed the instruments of control and power that officials had enjoyed in the past, they found it difficult to enforce birth limits and found it easier to report false numbers than fight with neighbors and kin.

The net effect of this policy "slippage" was to weaken central control over the levers of enforcement and to provide support for experts and birth planning officials, who argued that the policy should be more flexible across different regions of China, allowing those in the most impoverished areas with difficult, hilly terrain to have two children, allowing those in average circumstances to have one son or two children, and limiting those in more prosperous areas to only one child. They believed that the same results could be achieved, with less effort and more compliance, than if policy did not respond to the nuances of family need and economic circumstance.

Phase Three: Another Cycle Unfolds, 1989–1995

This more differentiated policy was put into place in the latter half of the 1980s, only to be upset by the events of May–June 1989, which ended in a military crackdown on Tiananmen protesters and their supporters in Beijing and in other cities around the country. The martial atmosphere that returned to Chinese politics for the next two to three years made it possible to once again tighten local enforcement and to carry out another population control campaign. As in 1982–1983, fear about a poor performance justified the revival of campaign methods. Cadres who had been warned off those methods in the mid-1980s were now instructed to use "crack troops" and "shock attacks" to break through resistance and meet the new goals of the 1991–1995 plan period.

The campaign was justified by the results of the five-year plan that ended in 1990. It showed that China's population control targets had been exceeded by a very substantial margin, giving fuel to those who believed that it was acceptable to use coercion in service of the higher goal of achieving the per capita economic goals that had been set for the year 2000. It was also justified by the preliminary results of the 1990 census, which indicated that China's population had grown more quickly (to 1.13 billion) than planned or expected. Even worse, despite the massive effort that went into the census-taking process, it was clear that rural officials were manipulating local data in ways that hid "excess births," which should have been registered in their jurisdiction. They had a strong incentive to do this, since failure on their part would also reflect badly on their immediate superiors. Even when fraud was suspected, therefore, it was rarely investigated by those higher in the political command.

These numbers prompted the conservative leadership in Beijing to tighten enforcement, returning to a strict formula that limited all urban couples to only one child, and all rural couples to one son or two children. Exceptions were granted only to some of China's smaller minority nationalities and to parents whose first child was mentally or physically handicapped to such a degree that they would be unable to function as a healthy, working adult. Local officials were put on notice that they were

liable for strict enforcement, and that failure to achieve their performance targets for birth planning would result in economic penalties, administrative sanctions, and even demotions. They were to assume that meeting population targets was just as important to their future career success as meeting key economic goals. Population growth rates, which had been creeping up in the late 1980s, dropped steadily in the 1990s (see Figure 14.1).

This success came at a price, however. Evidence of intimidation and coercion was widespread, particularly in areas that had done poorly prior to 1990. Cadres destroyed crops, homes, and property to force compliance or punish policy violators. Relatives, particularly the elder members of the family, were detained indefinitely until they paid their fines, aborted an unplanned pregnancy, or agreed to sterilization. Rural cadres who sided with their fellow villagers did what was necessary to give the appearance of compliance, but also behaved as they had in the past, like during the Great Leap Forward, when the work was hard and the campaign targets too ambitious—by lying, exaggerating, and dodging, or finding other ways to manipulate the system.

On the one hand, data for the period between 1990 and 1995 indicate a significant improvement in enforcement, as well as a further reduction of the fertility level (see Figure 14.2). With greater pressure on local officials to report impressive results, however, came greater pressure on grassroots personnel to submit fraudulent data. When official reports based on these data claimed that China's fertility level had dropped to an unusually low 1.4, many Chinese demographers were skeptical, reporting their concerns in scholarly journals and other reports.

Phase Four: Policy Stagnation

Over the next two decades (1993–2013), the PRC underwent enormous change, achieving levels of economic development and social change that were unprecedented in their speed and scope. Despite this rapid transformation, however, China's population policy remained unchanged. CCP leaders were repeatedly urged by experts to revise or abolish the one-child policy, and warned of the consequences of failing to act swiftly. Calls for reform were repeatedly rejected, however, overridden by continuing fears of a fertility rebound if the one-child limit was relaxed.

In 1989, when the Deng regime crushed the pro-democracy movement, China still inhabited a world defined by the contours of the Cold War. By 1992 the world had changed dramatically after the fall of the Soviet Union, and the CCP now faced the problem of how to survive in a global order that was dominated by the United States and its allies. Responding to the new challenges, the post-Tiananmen politics of conservatism gave way to a new wave of reform and opening, which rapidly transformed the political, economic, and social landscape of the PRC.

It was in this context that many of China's population specialists began again to challenge the wisdom of the administrative and punitive approach to population control that had been relied on since the 1970s. Leading figures in China's new generation of highly trained demographers and sociologists criticized the assumption that "fewer births is everything," arguing that it led to "short-sighted actions" (such as surprise raids on pregnant women). Frankly acknowledging that China's fertility decline had

been induced through the widespread use of coercion, they insisted on the need for a broader and more complex view of population dynamics and a population policy better suited to an overall strategy of "sustainable development." Writing that "the curtain is gradually closing on the era of monolithic population control," these critics went on to discuss the disturbing consequences of that approach (including **sex ratio imbalances** and a rapidly aging population) and the necessity of shifting to a developmental approach which emphasized improvements and investments in the quality of the population.¹ In short, they argued that development was the best route to fertility decline, rejecting in the process the sort of "population determinism" (fewer births is everything) that was so deeply embedded in the PRC's family planning strategy.

This open revolt against the theory and practice of birth planning was unprecedented, and it proved to be the leading edge of a push to reform China's population control program. Like the critique of excess coercion that emerged in 1984, the timely convergence of multiple political developments, both domestic and international, helped to advance the reform agenda in population policy. Domestically, the problem of rural unrest and instability was again preoccupying the leadership, and one of the major complaints of villagers was the use of coercive birth control tactics to collect burdensome and excessive taxes. Not only did new documents on rural taxation explicitly forbid the use of those measures, a family planning document issued in 1995 codified them as seven types of prohibited behaviors: (1) illegally detaining, beating, or humiliating an offender or a relative; (2) destroying property, crops, or houses; (3) raising mortgages without legal authorization; (4) the imposition of "unreasonable" fines or the confiscation of goods; (5) implicating relatives or neighbors of offenders, or retaliating against those who report cadre misbehavior; (6) prohibiting childbirths permitted by the local plan in order to fulfill population targets; (7) organizing pregnancy checkups for unmarried women.²

Another factor that was conducive to reform was the shifting discourse on population and development in the international community. When China began to implement its one-child policy in 1979, it was widely lauded by leaders in the international family-planning community, who subscribed to the dominant theory that population growth was a primary, if not *the* primary, impediment to economic growth, and that population-control programs were the solution. By the mid-1990s, another school of thought began to dominate the discourse on population and development. This alternative approach focused on women's reproductive health and rights, and was crystallized in Cairo at the 1994 United Nations International Conference on Population and Development. It emphasized the organic relationship between the elevation of the status of women (especially through increased education and employment outside the home), the elimination of poverty, and declining fertility levels.

The substance of the conference was reported in some detail in the Chinese media and in population journals, and shortly thereafter, the influence of the new international approach on Chinese policy became clear. In China's "Outline Plan for Family Planning Work in 1995–2000," for example, stress was placed on the impact of the socialist market economy on population control, and on the necessity of linking population policy to economic development. This language, though seemingly benign, was noteworthy for its suggestion that population policy should be recalibrated to match China's new social and economic conditions. In addition, the plan placed special

emphasis on the role of education, and urged aggressive efforts to increase women's educational level in order to promote lower fertility.

If the Cairo conference was influential in China, it was because there was a constituency ready to seize the opportunity to press home similar views. In the early 1970s, China's leaders, while publicly condemning the orthodox view on limiting population growth, had quietly embraced it. Though framed in Marxist terms, the logic of China's policy was the same—that reducing population growth was a prerequisite for socioeconomic development, and that China could not afford to wait for a development-induced **demographic transition** like that which occurred in Europe and North America. In the post-Mao era, this rationale legitimated the regime's insistence that strict population control was the linchpin of the modernization strategy, even as it came under increased international criticism.

The new language of Cairo—protecting women's rights and taking a more holistic approach to achieving demographic goals—buttressed the position of Chinese population policy reformers. It also provided institutional contacts and resources they could use to experiment with a softer approach to enforcement. The UN's Fourth World Conference on Women, held in Beijing in 1995, strongly reinforced the Cairo message, provoking a new wave of feminist thinking and action, and further encouraging State Family Planning Commission* officials to consider a more client-centered approach that gave greater consideration to women's needs and their reproductive health.

Predictably, however, reform came slowly and remained highly controversial. Faced with the reality of a rapidly aging population at one end of the demographic pyramid, a bulging workforce in the middle that even the fast-growing Chinese economy could not absorb, and at the bottom, sex ratios so skewed that they posed a threat to social stability, family planning professionals were increasingly persuaded that the costs of China's one-child policy had grown too steep. Their arguments and analyses were overridden, however, by conservative political voices that continued to insist on the necessity of a one-child birth limit and warned of a big jump in fertility if the policy was relaxed.

China officially reaffirmed the one-child policy in 2000 and in 2001 passed a long-debated Population and Family Planning Law that upheld the existing policy and gave compliance the force of law.³ Although the law included provisions that echoed the Cairo and Beijing conference agendas, calling for an "informed choice of safe, effective, and appropriate contraceptive methods" and one provision prohibiting officials from infringing on "personal rights, property rights, or other legitimate rights and interests," it reiterated China's basic approach to population control.

Despite the reaffirmation of the one-child policy, the chorus for reform grew louder after 2000. It was supported by several parallel developments in Chinese politics and public policy during the first decade of the twenty-first century. First, the year 2000 had come and gone, and although China's population had exceeded the original target number of 1.2 billion, the rate of economic growth after 1980 had also exceeded all expectations, suggesting that population growth was no longer a critical threat to China's continued development. Second, young couples entering their child-bearing years in the twenty-first century were far more likely than their predecessors in 1980 to desire only one or two children, to prefer to delay childbirth, or to forgo

childbearing altogether. Traditional norms and expectations regarding marriage and childbirth had been altered by twenty years of rapid economic development and by the relentless education they had received about the individual and societal costs of childbearing.⁴

With acceptance of a one- or two-child norm on the rise, reformers argued, the regulation of childbirth could be relaxed without fear of a rise in birth rates. And as China began to take a more active role in international institutions after 2000, developing strong links to the global community of nongovernmental organizations (NGOs), the overt use of coercion in enforcing birth planning became an embarrassment to the now highly professionalized state family-planning bureaucracy. Many were convinced that it was time for China to shift more decidedly toward a system of education, rewards, and support for those who chose to have no more than two children and who were willing to space those children four to six years apart. The official government White Paper on "China's Population and Development in the Twenty-First Century" (2000) reflected many of these concerns, embracing an approach to population policy that was consistent with the new international discourse and viewed family planning as just one part of a holistic approach to development.⁵

What the demographic experts were unable to do, however, was to convince China's top leaders that it was "safe" to formally abandon the one-child policy. Fears of a fertility rebound remained, and the necessity of keeping the numbers of births in check continued to outweigh the opinion of specialists that China's population goals could be better achieved, and at a lower social and economic cost, by moving to a universal two-child policy, which gave rewards for compliance rather than penalties for violations. Only in 2012, with the results of the 2010 census in hand and a change of CCP leadership underway, did the one-child policy begin to change.

Phase Five: From One Child to Two

After the 2000 census, demographers and other population experts made several appeals to the CCP leadership to relax or abolish the one-child policy. At the national level, those appeals failed to persuade, but in areas with the lowest fertility rates, local leaders took the initiative to encourage more couples to have a second child. In Shanghai, for example, where exceptionally low fertility rates raised concerns over the rapidly shrinking labor force, residents were reminded that the one-child policy allowed couples to have a second child if both parents were single children. Officials in other localities also publicly reiterated this exception, which was increasingly pertinent as the single-child generation born under the one-child policy after 1979 began to come of age and marry in growing numbers.

Despite the growing number of voices urging policy reform, it took the combined impact of the 2010 census results and the close of the Jiang/Hu leadership era (1993–2013) to provoke real change. Alarms that had been raised repeatedly about rapid aging of the population and sex ratio imbalance in young cohorts were confirmed by the census results, galvanizing the new regime of Xi Jinping to take action. The first indicator of the change to come was the publication in October 2012 of a report prepared by the China Development Research Foundation, an influential think tank closely

associated with the Chinese government. The report recommended that relaxation of the one-child limit begin immediately, and that a universal two child policy be put in place by 2015. In November 2013 the first reform was announced, allowing couples to have a second child if *either* of the parents was a single child. This policy change, referred to as *dandu erhai* (single [child], two children), increased substantially the number of couples eligible for a second child, including many rural couples, and was implemented nationwide in 2014. This proved to be a short, interim step toward more fundamental change. In October 2015, China's leaders announced a universal two-child policy (*quanmian lianghai*), the goal of which was to "promote balanced development of the population."⁶ This was followed in January 2016 by the enactment of amendments to the Population and Family Planning Law that encouraged a two-child family, eliminated benefits for late marriage and late childbirth, extended maternity and paternity leave, and ceded to individual couples decisions about contraceptive use. Since about two-thirds of childbearing-age women relied on intrauterine devices or tubal ligation, the National Health and Family Planning Commission launched a program offering free surgery to women wishing to remove IUDs or reverse sterilization surgery.⁷

The swift demise of the one-child policy—when change finally came, was perhaps due in part to the limited impact of the *dandu erhai* policy that got underway in 2014. Despite long-standing fears in some quarters that lifting the one-child limit might lead to a substantial rise in the birth rate, preliminary data available for 2014 indicated just the opposite. As a result of the policy reform, approximately 11 million couples became eligible to have a second child. By September of 2015, however, only 1.7 million of those couples had applied to have a second child, comprising only 16 percent of eligible couples. This low response rate belied the results of previous surveys suggesting that as many as 40 percent of one-child couples wished to have a second child, and confirmed the wide gap between expressions of fertility preferences and preparedness to act on that preference. Nevertheless, in 2016 the number of births rose to 18.5 million, more than two million more than in 2015. In 2017 and 2018, however, the number fell to 17.2 and 15.23 million, respectively. For those who had long argued that ending the one-child policy would not result in a big fertility rebound, this was the first clear evidence to support their view.⁸

CONSEQUENCES OF THE ONE-CHILD POLICY

The long debate over the one-child policy began and ended with the same question: did China's development goals make it necessary to adopt or retire the one-child birth limit? In 1979, China's leaders had been persuaded by faulty science that only a one-child birth limit would allow China to meet its modernization goals.⁹ Thirty years later, the 2010 census results made a compelling case for change, and the limited relaxation of policy in 2014 quelled any lingering fears that a sudden and sustained baby boom would jeopardize China's economic development.

As in the late 1970s, however, everything still revolved around the numbers, particularly economic projections and demographic analyses. Two sets of numbers were particularly weighty in the decision to end the one-child policy. First, the sex ratio

imbalance among newborns had reached alarming levels and showed no signs of abating. Second, fertility rates, which were already very low in 2000, had continued to fall. At the same time, China's population was aging rapidly, increasing the social and economic burden on working-age adults and threatening China's long-term economic vitality.

Sex-Selective Abortion and Sex Ratio Imbalance

Over time and across many different human populations, sex ratios at birth—that is, the number of males born during a given time period compared to the number of females—hover around 103–106 boys for every 100 girls. On occasion, for a limited period of time, this ratio may vary naturally, with a few more or a few less boys for each 100 girls. Data from PRC censuses, however, revealed that China's sex ratio at birth had climbed to unprecedented levels by 2010. They reported a 1990 sex ratio at birth of 111 males per 100 females, a 2000 sex ratio of 117 to 100, and a 2010 sex ratio at birth of nearly 118 males per 100 females. They also revealed individual provinces with sex ratios as high as 130 boys per 100 girls.

From the beginning of the one-child policy, there was concern that the one-child birth limit might result in an imbalanced sex ratio at birth. In the September 1980 "Open Letter" on the one-child policy, for example, several of the most common objections to the policy were aired, including fears that it would lead to female infanticide and abandonment and, consequently, to an imbalance in the sex ratio. These fears were initially discounted, but they proved to be warranted.

In the early 1980s, as the pressure on couples to have only one child grew intense, senior officials became alarmed about the many reports of female infanticide and female abandonment on the part of couples desperate to have a son. The infanticide reports produced a firestorm of controversy at home and abroad, leading the regime to respond in two contradictory ways. First, it denied that there was a widespread problem; census and survey data were used to show that China's sex ratio at birth was well within what was considered to be the normal range and in keeping with China's own population history. Though conceding that incidents of infanticide and abandonment did occur, it was insisted that such cases were rare, and that they occurred only in the most backward regions of the countryside, where the "feudal mentality" remained entrenched. The solution proposed was an education campaign to uproot such backward ideas, but education alone was of little use, given the social and economic realities that privileged male offspring.

By 1984, as reports of female infanticide multiplied and the All-China Women's Federation (ACWF) began to insist that the problem be faced and addressed, the state changed tack. But rather than address the underlying causes of gender bias, it made concessions to rural sensibilities and adjusted the one-child policy to allow single-daughter households to try again—for a son. The intent of this policy change was to legitimize what was already the *de facto* policy in many rural areas, but it also had the effect of underscoring the unequal status of males and females, especially in the countryside. A woman with a single daughter and no sons might be applauded by local officials, but in the real world of the village she was likely subject to a lifetime of pity

and blame, much of it heaped upon her by other rural women who had themselves endured pressures to produce a son. In addition, sonless couples were disadvantaged in village life, stigmatized by their failure to continue the male ancestral line and the potential prey of stronger families and kin groups. Single-daughter households should therefore be given special consideration.

Faced with intense demands from the state, on the one hand, and their peers and elders, on the other, some took the desperate course of female infanticide to preserve the chance to have a son. As the 1980s progressed, however, two alternative strategies emerged. The first was infant abandonment, which increased substantially in the late 1980s and 1990s in response to a tightening of the birth control policies. The second was sex-selective abortion.

By the early 1990s, all county hospitals and clinics and most township clinics and family planning stations had ultrasound equipment capable of fetal sex determination. As private clinics proliferated in the 1990s, they too were equipped with ultrasound technology, providing easy access for a fee. Despite repeated condemnations of sex-selective abortion and attempts to outlaw the use of ultrasound technology for fetal sex identification, easy access to the technology, combined with the lure of lucrative bribes and consultation fees, made ultrasound use very popular.¹⁰ This was especially true in newly prosperous county towns and rural townships, where higher incomes made ultrasound diagnosis possible, but where modest degrees of upward mobility had done nothing to undermine the cultural prejudice and practical logic that favored male offspring.

In the early 1990s, Chinese experts attributed most of the skew in the sex ratio to underreporting of female births, implying that the actual sex ratio at birth remained within, or close to, acceptable norms. While underreporting of female births was certainly a factor, by the late 1990s more candid assessments concluded that sex-selective abortion was widespread and was the main cause of the distorted sex ratio. Moreover, accumulating data indicated that the phenomenon was not just a rural problem, nor was it concentrated in the least educated segment of the population. In other words, son preference was not confined to the rural or backward elements of society. Instead, the combined effect of the one-child birth limit, traditional son preference, and easy access to a technology that allowed couples to make sure they had a son was to tempt people from a wide variety of socioeconomic backgrounds to choose sons over daughters.

The extent to which China's skewed sex ratio at birth can be attributed to the one-child birth limit has been a focus of intense debate. Some who question the impact of China's policy point to evidence of sex ratio imbalance in other countries, as ultrasound technology made it possible to assure the birth of a son. In several cases, increases in the imbalanced sex ratio at birth tracked closely with increased access to the technology that allowed for fetal sex determination. This pattern suggested that there was nothing unique about China's skewed sex ratio. Rather, it was the cultural tradition of son preference that was the primary driver of rising sex ratios at birth.¹¹ Critics of this interpretation, however, point to the persistence and severity of China's sex ratio imbalance as evidence of the impact of the one-child policy. They note that the sex ratio imbalance grows much worse when one isolates second births and third or higher order births from first births.¹² Since rural couples were permitted to have

a second child if the first was a daughter, they had only one chance to give birth to a son. Although the latter comprised less than ten percent of all births recorded in the 2000 census, for example, the sex ratio at birth for this category was an extraordinary 160 males for every 100 females.

Others argue that the incidence of sex-selective abortion is far less extensive than generally believed, and that most of the so-called “missing girls” are not missing at all, but have reappeared in various data sources, including household registration (*hukou*) data, school registration data, and the most recent census data. They point to the bureaucratic and organizational factors that create incentives for skewed reporting of birth data. Close analysis of multiple data sources, however, has led others to conclude that while underreporting did inflate the number of “missing girls,” it accounts for only about a quarter of the problem. That still leaves a deficit of more than twenty million girls in China, with a projected decrease of more than 39 million women in the twenty to thirty-nine age range by 2030.¹³

The decision to adopt a two-child policy may help to move the sex ratio at birth back into balance more quickly than might otherwise have been the case, but the deficit of females has already begun to have an impact on marriage markets in China. Rural men of marriage age compete for a limited number of wives from the local area, and as the number of “bare branches” continues to grow, the higher the costs of marriage become. Men whose families are unable to raise enough money are unable to marry, and frequently resort to marriage brokers to help them find brides from other provinces.¹⁴ Despite these and other efforts, however, the number of unmarried men in their late twenties is rising rapidly. While the shortage of women has allowed some brides to marry into a higher economic or social status, others have become more vulnerable to human trafficking, or to abuse in their new homes, where they are far removed from their family support system. Conversely, disadvantaged men are vulnerable to being cheated by marriage brokers, or by the bride and her family. There have been many reports of brides disappearing days after their marriage, once the bride’s family had received the compensation they had demanded for their daughter.¹⁵

CHINA’S AGING POPULATION

Some of the most urgent calls to end the one-child policy came from those who worried about China’s rapid population aging. Persons aged sixty-five or older comprised just 4.9 percent of China’s population in 1990. By 2050 it will reach 26.3 percent by 2050 and 31.2 percent by 2100 (see Figure 14.3) These numbers did not place China among the nations with the highest proportion of elderly population, but its rate of aging was unusually fast, especially for a country at its level of development, due to the combined effects of rapid gains in life span and low levels of fertility.

Like all of China’s population figures, the raw numbers were breathtaking, especially considering China’s inadequate pension, welfare, and health-care systems. In 2013, the elderly population numbered approximately 185 million, on its way up to an estimated 284 million by 2025, and 440 million by 2050.¹⁶

This trajectory of rapidly increasing numbers of elderly persons is a source of grave concern for two reasons. First, the increase in the elderly population will be

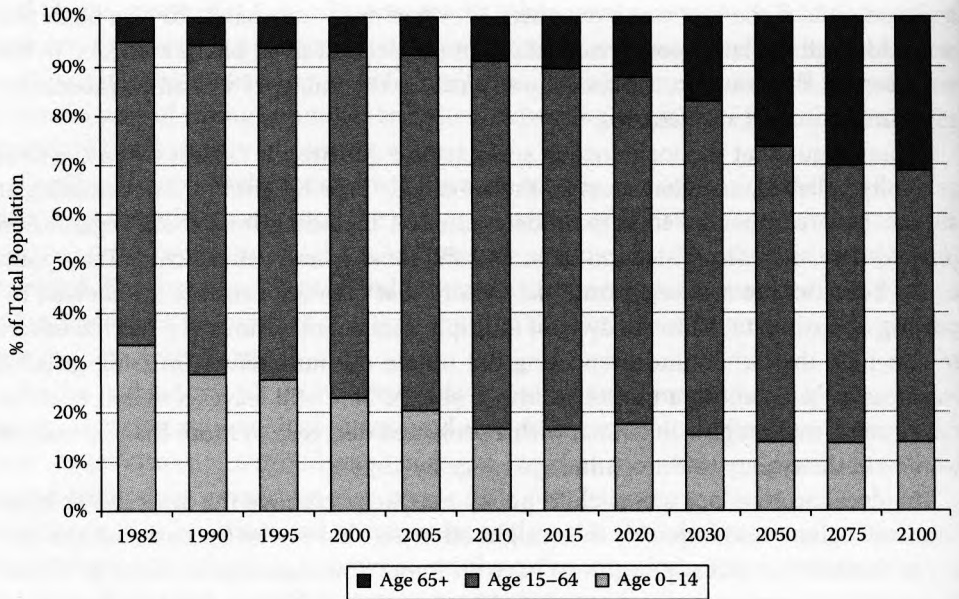


FIGURE 14.3 Age Composition of China's Population (1982–2100)

Sources: For 1982–2015, *China Statistical Yearbook 2017* (Beijing: China Statistics Press), Table 2-4. Accessed online at <http://www.stats.gov.cn/tjsj/ndsj/2017/indexeh.htm>. For 2020–2100, see the China country profile *World Population Prospects, 2017*, published by the Population Division of the Department of Economic and Social Affairs, United Nations.

accompanied by a decline in the size of the working-age population (ages fifteen to sixty-four), increasing the economic and social burden that will be placed on each worker. China's **dependency ratio**, that is, the working-age population expressed as a proportion of the total population, was manageable during the first two decades of reform, when the working-age population was large enough and young enough to ensure an adequate labor force and to provide essential care for dependents young and old. As the working-age population declines relative to the elderly, however, their ability to maintain current levels of support will be strained.

In 2012, the size of China's labor force began to fall, with 3.45 million fewer workers than the previous year and a projected decline of about 29 million by the end of the decade.¹⁷ A government study estimated that the PRC could lose 200 million workers by 2050 unless the fertility rate increases.¹⁸ In 2009 there were thirteen working-age adults for each elderly person; by 2050, there will be only two. This will place tremendous pressure on the working adult population, as their labor will be expected to generate much of the national wealth needed to care for their elders and their children. This is compounded by the fact that the current mandatory retirement age in China is sixty for men, fifty-five for female civil servants, and fifty for other female workers. Although proposals to gradually raise the retirement age have been made, not surprisingly, they have been very unpopular. This may explain why a detailed outline of those plans, originally promised for 2017, had not been published by early 2019. The aging population will also place great pressure on the Chinese government, which must find the resources necessary to provide pensions and health care for hundreds of millions of retirees. Although many countries will face similar challenges or are already facing

them (e.g., Italy, Germany, and Japan), China is experiencing rapid population aging at a lower level of national wealth and per capita income. As the *Economist* put it, China is unusual because it is “getting old before getting rich.”¹⁹ Despite the challenge posed by its aging population, Chinese authorities have worked in recent years to improve and extend the national pension system and the health-care system. Experts worry, however, about the ability of the regime to sustain current levels of economic growth given its already heavy debt burden, the declining numbers of young adults entering the work force, and the necessity of investing heavily in the social welfare system. Already in 2015, China had thirty-six dependents (children aged fourteen and under plus retirees over the age of sixty) for every one hundred workers. By 2050, that number is projected to nearly double, posing unprecedented challenges to the Chinese government.

This looming crisis of population aging was a key factor in the decision to relax the one-child policy, and then repeal it in favor of a two-child limit. As noted earlier, however, the tepid response by married couples to the policy relaxation after 2014 suggests that the reform will lead to fewer additional births each year than had been estimated. While this was a relief to those who feared that policy reform would lead to a baby boom, it was disappointing to those hoping the two-child policy would shore up the shrinking cohort of young workers who will enter the work force after 2030.

THE ONE-CHILD POLICY AS HISTORY

China’s one-child policy has been lauded by some for its contribution to slowing world population growth and its contribution to China’s rapid economic development. Given the costs and negative consequences of the policy, however, and the sometimes brutal methods of enforcement, it is important to ask if a similar result could have been achieved by different means.

China’s approach to population control was set in motion prior to the era of reform that began in 1978, and while nearly every other policy arena underwent a transformation in the decades that followed, population control policy essentially remained static until very recently. The policy has been tinkered with, and sometimes relaxed on the margins, but the possibility of changing China’s entire approach to population issues has never gained traction with China’s leaders. Indeed, even the new two child policy does not alter China’s fundamental approach to population policy—that the party-state, in service of China’s development goals, has jurisdiction over childbearing. In their view, economic success, and projected future socioeconomic trends have mitigated the need for a one child birth limit, but not the need for enforcing a two child limit. It may be true that very few of China’s childbearing-age couples would plan to have three or more children, given the costs of childrearing, the desire to maintain or improve their economic circumstances, and the lack of adequate support for various child care services. But that does not alter the fact that the Chinese party-state continues to claim sovereignty over childbearing, and that opportunities to have more than the officially mandated limit are still granted by the state and require permission of the authorities.

China claims that the birth limitation program has prevented as many as 400 million births since the mid-1970s, but they offer no explanation for how this number is calculated.²⁰ Nor does this calculation take into consideration the independent impact of reform and modernization on population growth and fertility. There is abundant historical evidence that fertility rates drop in response to rapid economic development, urbanization, increasing costs of childbearing, the commercialization of agriculture, and improved educational opportunities, especially for women. Changes like these, all of which occurred in China after 1978, may not have been enough to bring down fertility rates as far and as fast as Chinese leaders desired, but it is grossly misleading to suggest that the strict enforcement of a one-or-two child birth limit prevented the growth of the population by an additional 400 million, or that China's "modernization by the year 2000" agenda would have failed without the one-child policy.²¹

The great irony of China's one-child policy is that by the time China embraced it, nearly everything that inspired it was on the cusp of becoming obsolete. The intellectual hubris of the "population control movement" that peaked between the mid-1960s and 1980 would shortly thereafter begin to flounder under the combined challenges of the Green Revolution that brought increased agricultural productivity through technological advance to the developing world, revisionist demographic theories that challenged the orthodox view that population growth impeded development, and feminist and conservative challenges that criticized, respectively, the undue burden put on women by top-down family planning programs and the intrusion of the state into the most private of matters. In the midst of this ferment, China moved to embrace precisely the "numbers is everything" approach that was the core belief of its population controllers, wrapping it in a language of socialist modernization that was the mantra of the party-state. Once in place, and with the full weight of the reform leaders, including Deng Xiaoping, behind it, the legitimacy of the project and the validity of the method were difficult to challenge. The Party had declared that the achievement of "modernization by the year 2000" depended on the successful implementation of the one-child birth limit. Even when it became clear that China would exceed all expectations for economic growth by the year 2000, even when it became clear that the social consequences of the policy were severe, even when "population control" had become a discredited approach to demographic challenges, the policy remained in place. It recedes now as an anachronism, but its social and political consequences will be felt for decades to come.

Beyond the consequences discussed earlier, there is the rage left behind in many Chinese over the party-state's unwillingness to adopt a two-child policy many years earlier, or even more that its claims that government control over childbearing is legitimate and justifiable. There is also residual rage over its reliance on an enforcement system that privileged the rich, allowing them to effectively purchase a second child by paying a large "social compensation fee," while avoiding the pressure, harassment, or outright coercion experienced by ordinary Chinese whose pregnancies were deemed illegal. As the Chinese writer Ma Jian noted in a 2013 Op-Ed in the *New York Times*, however, venting popular anger against the wealthy "plays into the Party's hands" by deflecting public outrage away from "the government's barbaric policy."²² However one judges the one-child policy—as an economic and social

necessity, a barbaric violation of human rights and dignity, or a dual-edged sword, it is important to keep in mind that although the one-child birth limit has disappeared, the state has not conceded its authority to plan China's population growth. The birth limit has changed, but the logic that led to a one-child policy remains in place. As an August 2018 editorial about the importance of increasing China's birthrate in the CCP's official newspaper, *People's Daily*, declared, "To put it bluntly, the birth of a baby is not only a matter of the family itself, but also a state affair."²³ Changing demographics, rising popular protest, and global influences have certainly moderated China's approach to family planning, as well as the language used to describe the program, but the Chinese approach to population management remains grounded in the principle of party-state sovereignty over reproduction. Until that principle is repudiated, China's population will remain subject to any childbearing requirement the party-state wishes to impose.

NOTES

1. Gu Baochang and Mu Guangzong, "A New Understanding of China's Population Problem," *Renkou yanjiu* (Population Research) 5 (1994): 2–10.
2. See Tyrene White, *China's Longest Campaign: Birth Planning in the People's Republic* (Ithaca, NY: Cornell University Press, 2006), 232.
3. For the full text of China's Population and Family Planning Law, see *Population and Development Review* 28, no. 3 (Sept. 2002): 579–585.
4. For a wide-ranging discussion of changing patterns of family life, childbearing preference, and childbearing behavior, see Wang Feng, Peng Xizhe, Gu Baochang et al., *Globalization and Low Fertility: China's Options* (Shanghai: Fudan University Press, 2011); Xiaowei Zang and Lucy Liu Zhao, eds., *Handbook on the Family and Marriage in China* (Cheltenham: Edward Elgar Publishing, 2017).
5. PRC State Council Information Office, "China's Population and Development in the 21st Century," (2000), <http://www.china.org.cn/e-white/21st/index.htm>
6. "Communique of the Fifth Plenary Session of the Eighteenth Central Committee of the Communist Party of China," *Xinhua News Agency* (Beijing), Oct. 29, 2015, reprinted in *Population and Development Review* 41, no. 4 (Dec. 2015): 733–734.
7. Isabelle Attane, "Second Child Decisions in China," *Population and Development Review* 42, no. 3, (Sept. 2016): 733–734.
8. Attane, "Second Child Decisions in China," 519–525. See also Stuart Basten and Quanbao Jiang, "China's Family Planning Policies: Recent Reforms and Future Prospects," *Studies in Family Planning* 45 no. 4 (Dec. 2014): 493–509.
9. On the faulty science used to justify the one-child policy, see Susan Greenhalgh, *Just One Child: Science and Policy in Deng's China* (Berkeley: University of California Press, 2008).
10. For a report on such a business, see "Boys Preferred, Lucrative Trade Remains in Illegal Fetus Gender Identification," *Global Times*, Mar. 31, 2013, <http://www.globaltimes.cn/content/769754.shtml#.Uds-wj54ZoM>.
11. See Charis Loh and Elizabeth Remick, "China's Skewed Sex Ratio and the One-Child Policy," *China Quarterly* 222 (June 2015): 295–319.
12. See, for example, Quanbao Jiang, Qun Yu, Shucai Yang, and Jesus J. Sanchez-Barricarte, "Changes in Sex Ratio at Birth in China: A Decomposition by Birth Order," *Journal of Biosocial Science* 49, no. 6: 826–841.

13. See Yaojiang Shi and John James Kennedy, "Delayed Registration and Identifying the 'Missing Girls' of China," *China Quarterly* 228 (Dec. 2016): 1018–1038; Yong Cai, "China's New Demographic Reality: Learning from the 2010 Census," *Population and Development Review* 39, no. 3 (Sept. 2013): 371–396; and Steven Lee Myers and Olivia Mitchell Ryan, "Burying 'One Child' Limits, China Pushes Women to Have More Babies," *New York Times*, Aug. 11, 2018, <https://www.nytimes.com/2018/08/11/world/asia/china-one-child-policy-birthrate.html>
14. Lige Liu, Xiaoyi Jin, Melissa J. Brown, and Marcus W. Feldman, "Male Marriage Squeeze and Inter-provincial Marriage in Central China: Evidence from Anhui," *Journal of Contemporary China* 23, no. 86 (2014): 351–371.
15. Lige Liu et al., "Male Marriage Squeeze."
16. Mark W. Frazier, "No Country for Old Age," *New York Times*, Feb. 18, 2013, <http://www.nytimes.com/2013/02/19/opinion/no-country-for-old-age.html>; "China's Population: The Most Surprising Demographic Crisis," *Economist*, May 5, 2011, <http://www.economist.com/node/18651512>.
17. "China to Ease One-child Policy," *Xinhua*, http://news.xinhuanet.com/english/china/2013-11/15/c_132891920.html.
18. Myers and Ryan, "Burying 'One Child' Limits."
19. "China's Predicament: 'Getting Old before Getting Rich,'" *Economist*, June 25, 2009, <http://www.economist.com/node/13888069>.
20. Martin King Whyte and Wang Feng explore the origins of the 400 million figure in "Challenging the Myths about China's One-Child Policy," *China Journal* 74: 144–159.
21. One example of the intensity of this debate can be found in the journal *Demography*, where several scholars offered harsh criticism of an analysis by Daniel Goodkind, "The Astonishing Population Averted by China's Birth Restrictions: Estimates, Nightmares, and Reprogrammed Ambitions," *Demography* 54 (2017): 1375–1400. For the critiques of this article, see Susan Greenhalgh, "Making Demography Astonishing: Lessons in the Politics of Population Science"; Feng Wang et al., "Is Demography Just a Numerical Exercise? Numbers, Politics, and Legacies of China's One-Child Policy"; and Zhongwei Zhao and Guangyu Zhang, "Socioeconomic Factors have been the Major Driving Force of China's Fertility Changes Since the mid-2000s," all in *Demography* 55, no. 2 (2018): 721–731, 693–719, and 733–742, respectively. See also Amartya Sen, "Women's Progress Outdid China's One-Child Policy," *New York Times*, Nov. 2, 2015, <https://www.nytimes.com/2015/11/02/opinion/amartya-sen-womens-progress-outdid-chinas-one-child-policy.html>
22. Ma Jian, "China's Brutal One-Child Policy," *New York Times*, May 21, 2013, <https://www.nytimes.com/2013/05/22/opinion/chinas-brutal-one-child-policy.html>
23. Cited in Myers and Ryan, "Burying 'One Child' Limits." For an analysis of this editorial and the online backlash it generated, see Jiayun Feng, "The People's Daily: 'Giving Birth Is not nly a Family Matter but also a National Issue,'" *SupChina*, August 7, 2018, <https://supchina.com/2018/08/07/the-peoples-daily-giving-birth-is-not-only-a-family-matter-but-also-a-national-issue/>

SUGGESTED READINGS

-
- Banister, Judith. *China's Changing Population*. Stanford, CA: Stanford University Press, 1987.
- Banister, Judith, David E. Bloom, and Larry Rosenberg. "Population Aging and Economic Growth in China." Harvard School of Public Health Working Paper, Mar. 2010.

- Croll, Elisabeth. *Cultivating Global Citizens: Population in the Rise of China*. Cambridge, MA: Harvard University Press, 2010.
- Croll, Elisabeth. *Endangered Daughters: Discrimination and Development in Asia*. New York: Routledge, 2000.
- Fong, Mei. *One Child: The Story of China's Most Radical Experiment*. Boston: Houghton Mifflin Harcourt, 2015.
- Greenhalgh, Susan. *Just One Child: Science and Policy in Deng's China*. Berkeley: University of California Press, 2008.
- Greenhalgh, Susan, and Edwin Winckler. *Governing China's Population: From Leninist to Neoliberal Biopolitics*. Berkeley: University of California Press, 2005.
- Hudson, Valerie, and Andrea den Boer. *Bare Branches: The Security Implications of Asia's Surplus Male Population*. Cambridge, MA: MIT Press, 2004.
- Johnson, Kay Ann. *China's Hidden Children: Abandonment, Adoption, and the Human Costs of the One-Child Policy*. Chicago: University of Chicago Press, 2017.
- Lee, James, and Wang Feng. *One Quarter of Humanity: Malthusian Mythologies and Chinese Realities*. Cambridge, MA: Harvard University Press, 1999.
- Riley, Nancy. *Population in China*. Cambridge: Polity Press, 2017.
- White, Tyrene. *China's Longest Campaign: Birth Planning in the People's Republic, 1949–2005*. Ithaca, NY: Cornell University Press, 2006.
- Whyte, Martin King, Wang Feng, and Yong Cai. "Challenging Myths about China's One-Child Policy," *China Journal* 74: 144–159.
- Zhao, Zhongwei, and Fei Guo. *Transition and Challenge: China's Population at the Beginning of the 21st Century*. New York: Oxford University Press, 2007.