

THE GLOBAL WAR AGAINST BABY GIRLS

Nicholas Eberstadt¹

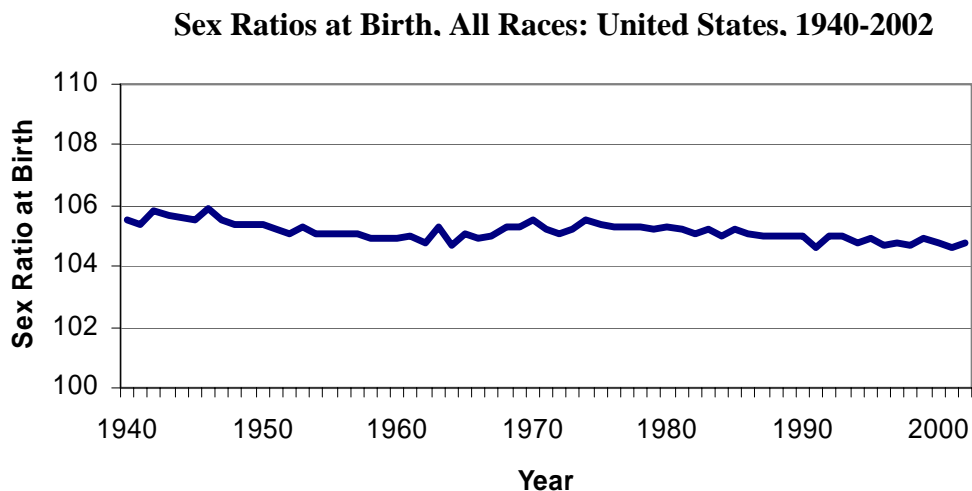
Over the past five years the American public has received regular updates on what we have come to call “the global war on terror”. A no-less significant global war—a war, indeed, against nature, civilization, and in fact humanity itself has also been underway in recent years. This latter war, however, has attracted much less attention and comment, despite its immense consequence. This world-wide struggle might be called “The Global War Against Baby Girls”. It is a conflict of astonishing and ever more dismaying dimensions. Whatever one’s personal estimate of our progress to date in the global war on terror, what remains beyond dispute humanity has been faring much more poorly in this other war. Herewith, my friends, an update on this global war’s many different fronts.

For the entirety of human inquiry—and no doubt, since the beginning of time—there has been a clear and steadily observable biological regularity to the distribution of male and female offspring in those species that have just males and females. That regularity has been equally apparent for the human species. In fact, the earliest findings of demographers investigating the rhythms and regularities of human populations included the discovery of slight but constant and almost unvarying excess of baby boys over baby girls born in any population. This excess was so regular that it led early demographers like Johan Peter Suessmilch and others to believe that there was a natural intention in it.

Regardless of intention, this slight surfeit of baby boys over baby girls is a proven biological and historical reliability, so predictable and sure as to qualify as a rule of nature. What is called the ‘sex ratio at birth’ by demographers—the number of baby boys born for every hundred baby girls—has been found in all settings and at all observed times to fall in a very narrow range: on the order of 103, 104, or 105 (and in rare cases, 106 or just a bit over).

¹ Henry Wendt Chair in Political Economy, American Enterprise Institute, 1150 17th Street NW, Washington DC 20036; eberstadt@aei.org. Thanks to Ms. Assia Dosseva and Mrs. Courtney Myers for research assistance on this study. Any remaining errors are the author’s own.

The U.S. sex ratio at birth, which is tabulated fairly well, and is quite stable over time, offers an illustration of this regular disproportion.



Source: Derived from U.S. National Center for Health Statistics, *Vital Statistics of the United States*, 1978-2002 editions, Volume I.

These sex ratio differences can be observed in any ordinarily constituted population. For reasons not yet well understood, sex ratio variations on the basis of ethnicity can also be observed; even then they are fairly small and quite stable over time.

Sex Ratio at Birth by Ethnicity, United States: 1984

Total: 105.0

White: 105.4

Black: 103.1

American Indian: 101.4

Chinese: 104.6

Japanese 102.6

Source: Derived from U.S. National Center for Health Statistics, *Vital Statistics of the United States*, 1984 edition (1988), Volume I, table 1-53.

Differences in sex ratio at birth also seem related to birth order and the age of parents.

Again, these differences are small and fairly stable over time.

Sex Ratio at Birth, by Birth Order and Ethnicity, United States: 1984

Live Birth Order

| | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8+ |
|------------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|
| All Races | 105.4 | 105.0 | 104.8 | 104.6 | 103.8 | 100.6 | 101.2 | 100.9 |
| White | 105.8 | 105.3 | 105.2 | 104.8 | 105.3 | 102.3 | 101.5 | 101.4 |
| Black | 104.0 | 103.2 | 102.7 | 102.9 | 99.9 | 98.4 | 100.8 | 101.9 |

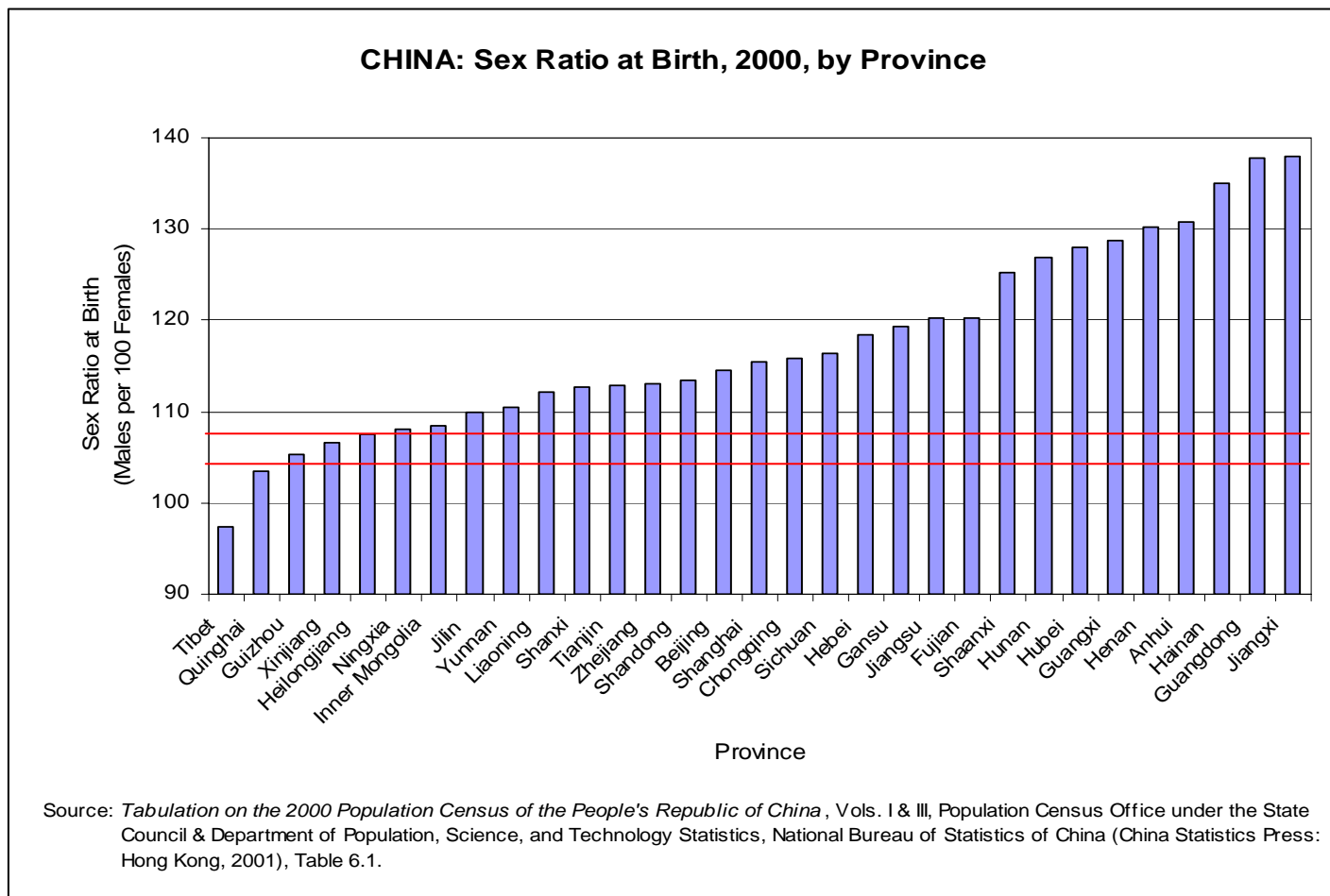
Source: Derived from U.S. National Center for Health Statistics, *Vital Statistics of the United States*, 1984 edition (1988), Volume I, table 1-58.

Sex Ratio at Birth, by Birth Order and Ethnicity, United States: 1993

| | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8+ |
|------------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|
| All Races | 105.4 | 104.9 | 104.8 | 103.7 | 103.4 | 105.4 | 104.3 | 103.0 |
| White | 105.7 | 105.4 | 105.3 | 104.2 | 103.7 | 106.1 | 105.3 | 104.4 |
| Black | 103.8 | 102.3 | 102.0 | 102.1 | 103.3 | 103.5 | 99.9 | 100.2 |

Source: Derived from U.S. National Center for Health Statistics, *Vital Statistics of the United States*, 1993 edition, Volume I.

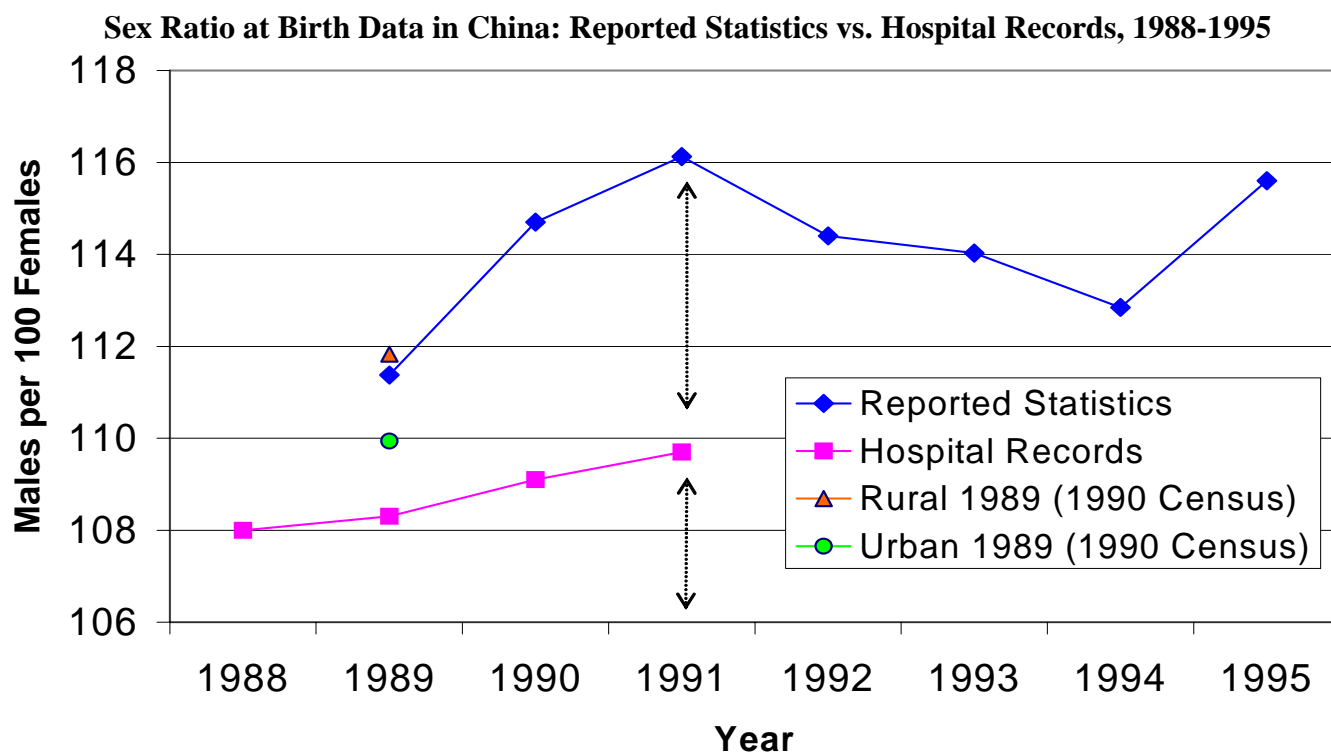
However, in the last generation the sex ratio at birth in some parts of the world has become completely unhinged. The first evidentiary exhibit we may present for this unsettling new phenomenon comes from the People's Republic of China. Bearing in mind that the regular sex ratio at birth is in the order of 103, 104, 105, or a bit higher, let us explore China's November 2000 census, which reported sex ratios at birth by individual provinces. In the table below the red lines indicate where the customary expectations of human populations.



Clearly, there are only a few provinces in China that report a sex ratio at birth in the year 2000 under, or even as low as, 110. By contrast, in a number of provinces with populations of tens of millions of people, the reported sex ratio at birth ranges from over 120 boys for every 100 girls to over 130 boys for every 100 girls.

A number of factors must be considered when accessing this type of data. For one, the calculations or tabulations could be wrong. As the Chinese government does not actually tabulate the vital statistics for its entire population on a year to year basis, playing “catch-up” with huge national population counts might possibly lead to some deviations in statistical data. Another reason for doubting these numbers could be China’s longstanding program of population control, the notorious ‘one-child norm’. If there is an existing preference for sons, as one might expect in a highly Confucian society where sons continue the family line, people might try to “game the system” by hiding baby girls to try for another “shot” at a son.

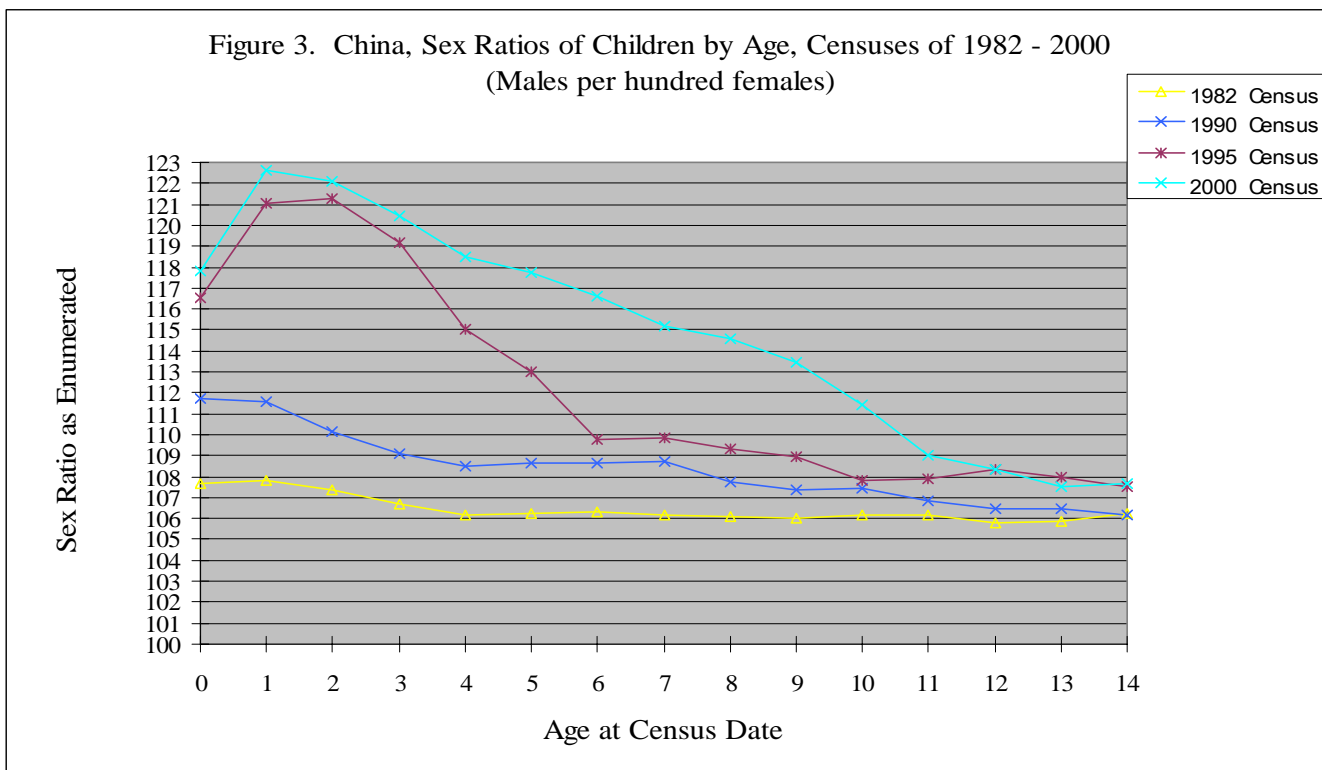
There are also some notable discrepancies in the Chinese demographic data. Daniel Goodkind of the Census Bureau, for example, has brought to light the fact that hospital birth numbers have regularly displayed a lower sex ratio at birth than the ones reported by the Census statistics. Even if we allow for the fact that hospital births tend to be more frequent in urban centers where the reported sex ratio disparity is smaller, the reported sex ratio disproportion in recent years is still highly anomalous.



Sources: Zeng, et al., 1993; Population Census Office and State Statistical Bureau, Department of Population Statistics, 1993; National Bureau of Statistics, Department of Population and Employment Statistics, 1991, 1992, 1994, 1995, and 1997; Gu and Roy, 1995.

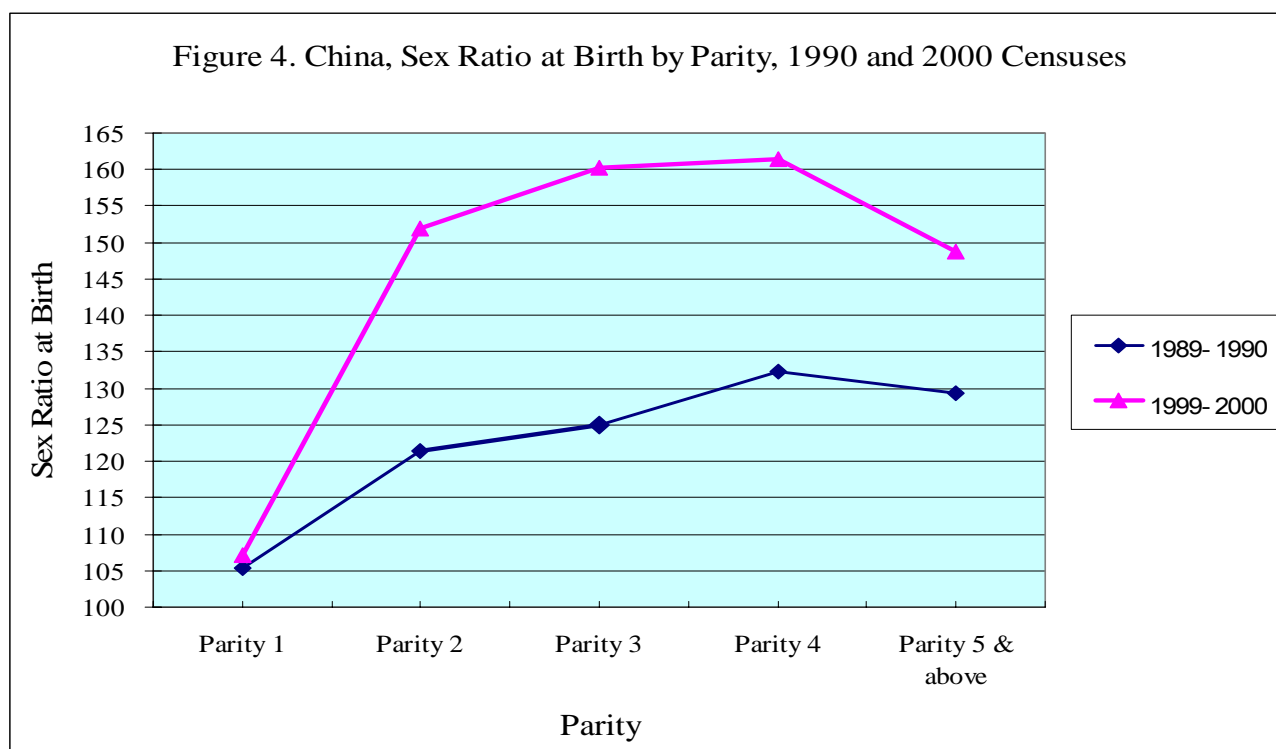
Courtesy of Daniel Goodkind, U.S. Census Bureau, from his paper, *Recent Trends in the Sex Ratio at Birth in East Asia*, June 2002.

Moreover, Chinese Census statistics display a fairly high degree of internal consistency. For example, the 1990 census, which reported a ratio of almost 112 for babies under the age of one, corresponds with the 2000 census, which shows nearly the same ratio for 10-year-olds, ten years later. The consistency in data indicates that the statistics are not a mere artifact. Clearly, a highly unusual and utterly abnormal demographic process has been taking place in the world's largest population.



Source: Judith Banister, “Shortage of Girls in China Today: Causes, Consequences, International Comparisons, and Solutions,” 2003

To understand the process that is perverting modern-day China’s secondary sex ratio, it is necessary to examine the sex ratio at birth in China according to the different parities and to birth order. A table prepared by Judith Banister, formerly of the Census Bureau, gives us significant insight into the developing demographic trends in China. For parity one, for first births, the sex ratio in China in 1990 and 2000 stood at just about 105—an unexceptional ratio in any ordinary human population. The second, third, fourth and fifth order parities, however, display significant aberrations from the ordinary. For higher-order births, the most recent Chinese census displays sex ratios at birth of 150 boys and higher for every hundred baby girls—a phenomenon utterly without natural precedent in human history.

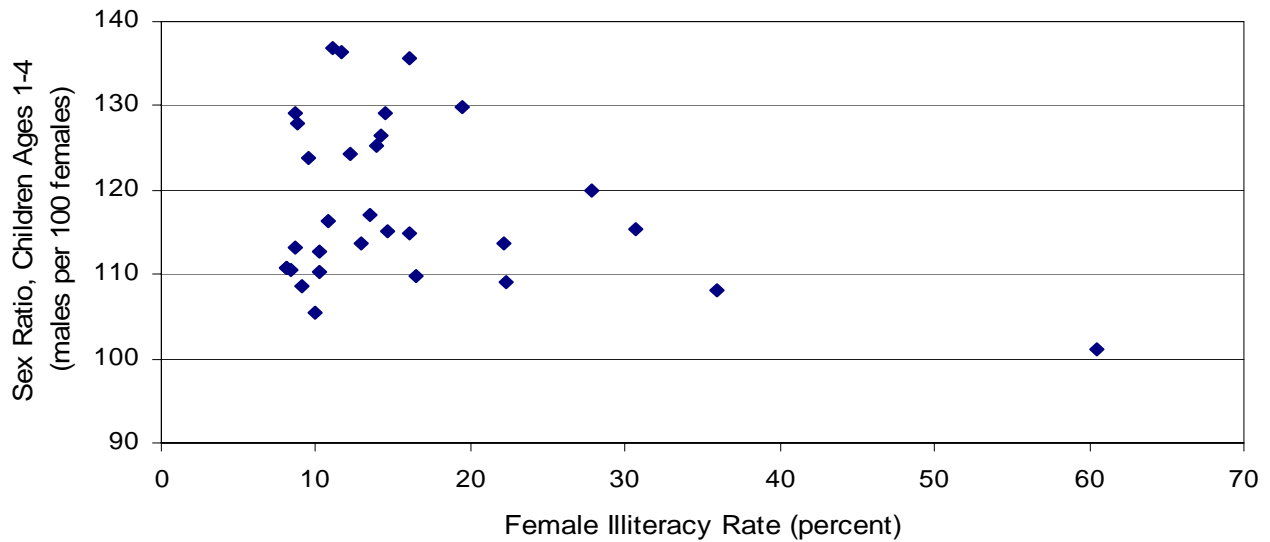


Judith Banister, “Shortage of Girls in China Today: Causes, Consequences, International Comparisons, and Solutions,” 2003

To emphasize the obvious, these anomalies are the reflection of the advent and rapid proliferation of inexpensive prenatal sex determination technology and the rampant use of abortion as a gender determination tool. At the very minimum, half of all second-order (or higher) female pregnancies in China are terminated on a gender-selective basis.

It would be heartening to think that the rapid modernization of the People's Republic of China would do away with the vestiges of “backward thinking” that are manifest in these dramatic demographic ratios. Unfortunately, the data currently available does not allow for any such optimism.

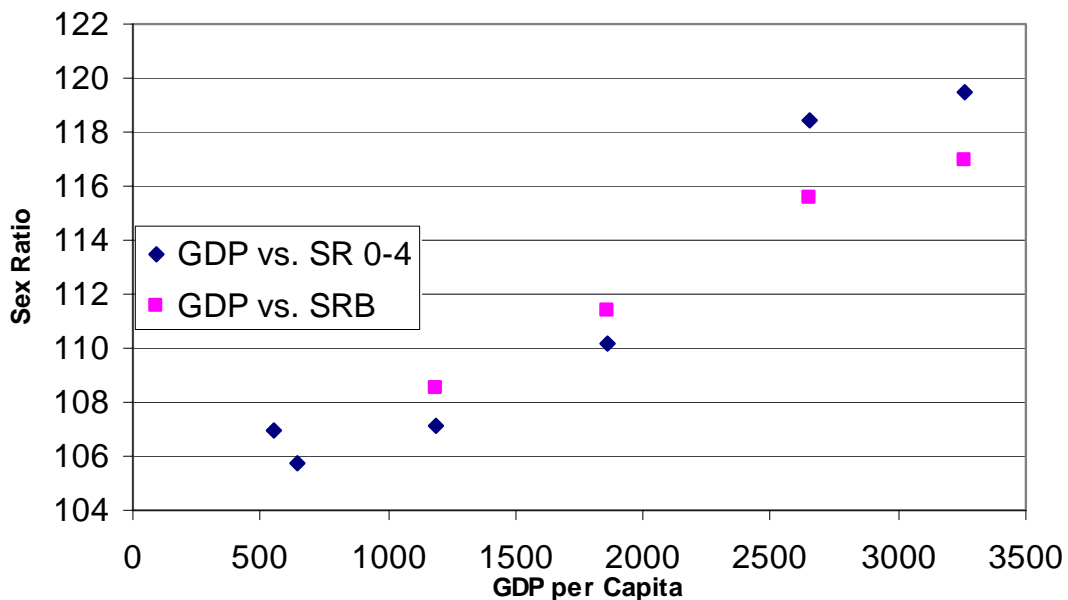
CHINA: Sex Ratio (Children Ages 1-4) vs. Female Illiteracy Rate by Province, 2000 China Census



Source: *Tabulation of the 2000 Population Census of the People's Republic of China*, Vols. I & III, Population Census Office under the State Council & Department of Population, Science and Technology Statistics, National Bureau of Statistics of China (China Statistics Press: Hong Kong, 2001), Tables 1.7 and 6.1.

Not only is there no positive correlation between literacy rates and lower sex ratio at birth, but also in actuality there is negative correlation between the two. To the contrary: available data suggests that the higher the literacy rate in a given Chinese province, the higher the disproportion between baby boys and baby girls at birth that can be expected there.

Sex Ratio at Birth vs. GDP per Capita: China, 1953-1999

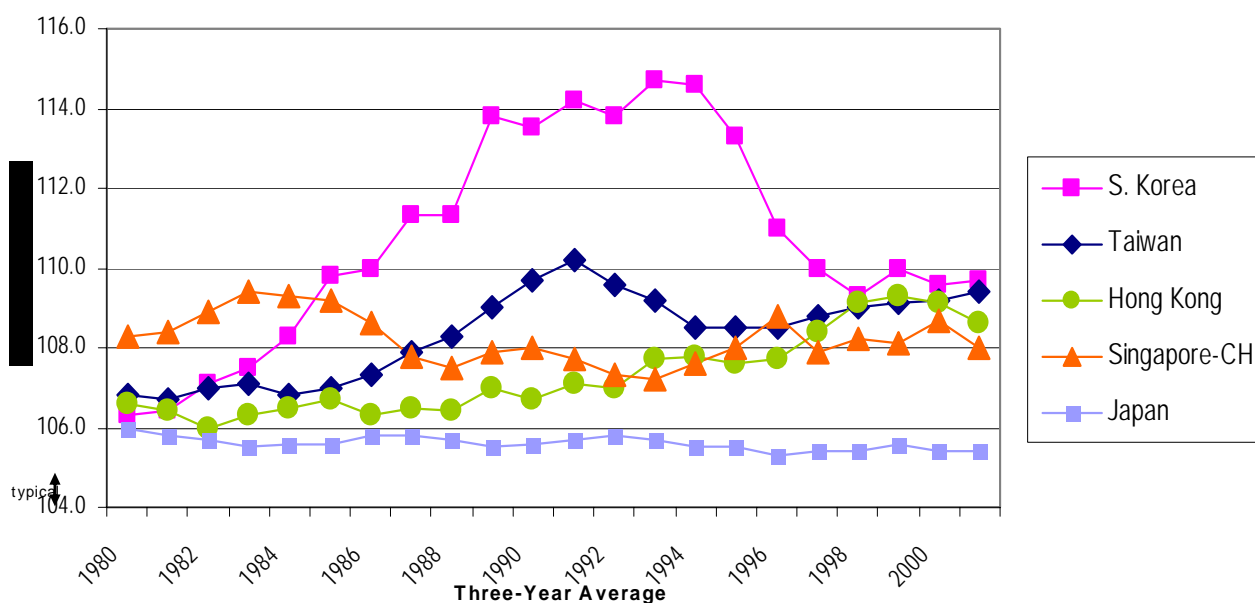


Sources: Lavelly, William. *First Impressions of the 2000 Census of China*. Available electronically at <http://csde.washington.edu/pubs/wps/01-13.pdf>, accessed 10/15/02. Maddison, Angus. *The World Economy: A Millennial Perspective*. OECD: 2003

The correlation between income levels and sex ratios at birth by province does not offer reason for optimism, either. The steady increase in China's income level tracks directly with a steady rise in the disproportion between baby boys and baby girls at birth. Over the past two decades, recall, China's linkages with the outside world—through trade, investment, and communication—have also grown steadily. Evidently, “Globalization with Chinese characteristics” is not inconsistent with an extraordinary and still-increasing imbalance between baby boys and baby girls.

Although the People's Republic of China is notorious for its gruesome involuntary population control program, the data from other parts of East Asia do not afford us the happy presumption that China's aberrant demographic trends are the product of a single oppressive regime. Demographic reports from South Korea, Taiwan, Hong Kong, and the Chinese ethnic groups in Singapore yield disturbingly similar results.

Males per 100 Females, Three-Year Averages 1980-2001

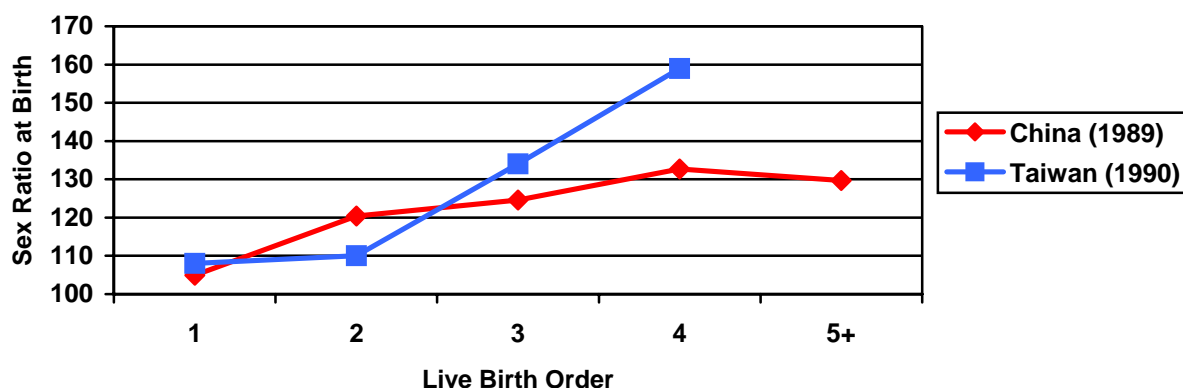


Sources: National Statistical Office, 2002; Directorate-General of Budget, Accounting and Statistics, 1992 and 2000; Ministry of the Interior, 2001; Singapore Department of Statistics, 1990, 1996, 1998, 1999, 2001a, 2001b; Census and Statistics Department, 1983 and 2000; National Institute Of Population and Social Security Research 2002.

Although all four of East Asia's "little dragons" have implemented anti-national population programs at one time or another, none of them have been coercive. In addition, each of these places is significantly more educated and significantly more affluent than the population of the Chinese Mainland, taken as a whole. Nevertheless, since the 1980s, all of these populations have exhibited biologically impossible sex ratios at birth.

Taiwan shows sex ratio at birth according to parity or birth order very similar to those observed in China. In fact, for higher order births, the disproportion in Taiwan has been even more pronounced in certain recent periods.

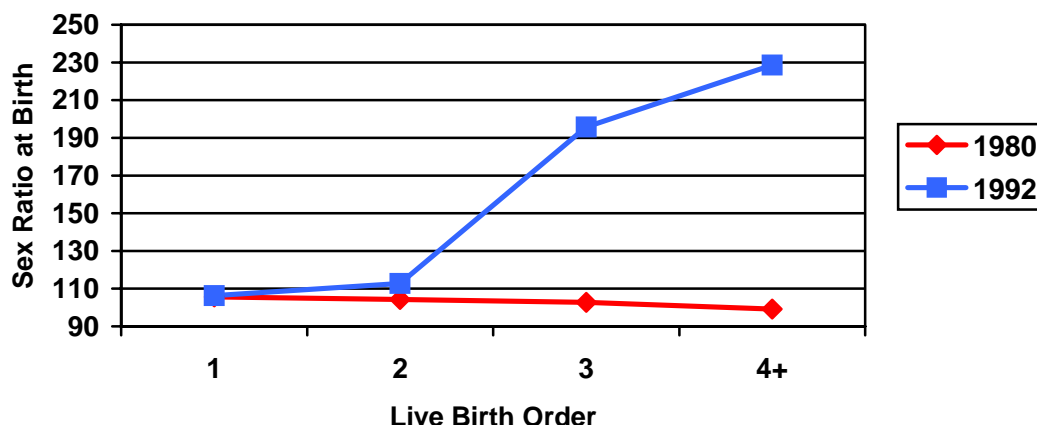
Sex Ratio at Birth by Birth Order, China and Taiwan



Source: Park and Cho, *Population and Development Review*, Volume 21, No 1 (March 1995).

As with China and Taiwan, South Korea's statistics from the 1990s reflect the advent and proliferation of prenatal gender-determination technology.

Sex Ratio at Birth by Birth Order, South Korea: 1980 vs. 1992



Source: Park and Cho, *Population and Development Review*, Volume 21, No 1 (March 1995).

The next figure shows similar parental decision-making dynamic at work in Hong Kong.

Sex Ratio at Birth by Parity and Sex of Previous Children, Princess Margaret Hospital, Hong Kong: July 1996-June 1998

| | Previous Birth | | | |
|-----------------------------------|-----------------|---------------|-------------|-------|
| | Male | Female | Total | |
| Sex Ratio Second Birth | 105 | 116 | 110 | |
| | Previous Births | | | |
| | Male-Male | Female-Female | Male-Female | Total |
| Sex Ratio Third Birth | 94 | 137 | 92 | 109 |

The data from the East Asian Tigers warrant a revision of the hypothesis that the war on baby girls is limited to China—and is a consequence simply of and Beijing’s coercive “one-child norm” population policy. Population control programs could surely be exacerbating gender imbalances, depending upon local norms—but just as clearly; they are not the driving force behind this phenomenon on the East Asian rim. Instead, it would seem to be due in these locales

to a collision of three powerful factors: enormous and enduring son preference, the use of rapidly spreading prenatal sex determination technology for gender-based abortion, and the rapid drop in fertility in different populations, making the gender outcome in each birth all the more portentous for parents. However, there is much more to the global war on baby girls than is visible in East Asia alone.

Despite all the billions of dollars spent on population programs around the world, it is extremely hard to find population surveys indicating gender preference for a next child among potential parents. Fortunately in the case below, the Indian Government did ask its people, “What is your preference for the gender of your next child?” The following is the result of a recent survey from the late 1990s. It shows that for married women as a whole, the preference is over four to one for a boy.

Fertility and Child Gender Preference Among Married Women, India: 1998-1999

| Number of Living Children | | | | | | |
|------------------------------------|-------------|-------------|-------------|-------------|------------|--------------|
| | 0 | 1 | 2 | 3 | 4+ | Total |
| Desires an additional child | 89.0 | 76.4 | 23.0 | 11.3 | 5.5 | 30.3 |

| Preferred sex of additional child | | | | | | |
|--|--------------|---------------|---------------|---------------|---------------|---------------|
| Boy | 34.8 | 40.3 | 60.2 | 74.5 | 72.0 | 46.9 |
| Girl | 2.5 | 15.9 | 14.4 | 9.0 | 6.8 | 11.0 |
| Number of respondents | 7,620 | 13,631 | 20,836 | 18,359 | 23,202 | 83,649 |

Source: “National Family Health Survey (NFHS-2): 1998-99,” (Bombay: Institute for Population Sciences, October 2000).

As the numbers for India are an arithmetic average, there are significant differences between its various states. The data from the state of Punjab, for example, a prosperous state up in the north, presents a startling extreme. For married women, in the year 1993, the reported Punjabi preference for boys as opposed to girls was over ten to one.

**Fertility and Child Gender Preference Among Married Women, Punjab,
India: 1993**

| Number of Living Children | | | | | | | | |
|------------------------------------|------|------|------|-----|-----|-----|-----|-------|
| | 0 | 1 | 2 | 3 | 4 | 5 | 6+ | Total |
| Desires an additional child | 92.7 | 82.4 | 21.0 | 7.4 | 2.5 | 1.9 | 1.3 | 24.9 |

| Preferred sex of additional child | | | | | | | | |
|-----------------------------------|------|------|------|------|---|---|---|------|
| Boy | 38.3 | 51.0 | 80.8 | 96.6 | * | * | * | 58.9 |
| Girl | 0.6 | 6.1 | 12.6 | 1.7 | * | * | * | 5.6 |
| | | | | | | | | |

*: Percentage not shown, less than 25 respondents

Source: “National Family Health Survey (MCH and Family Planning): Punjab 1993,” (Bombay: Institute for Population Sciences, September 1995).

How have India’s strong preferences for sons translated into demographic results? The figure below provides some indication. These data, drawn from the latest Indian census are not for the sex ratio at birth, but rather for the ratio of boys and girls under the age of seven. Nevertheless, these numbers can be taken as a fairly serviceable proxy for sex ratio at birth since we have no great reason to think that they have been hugely affected either by sex-selective migration or by other post-birth, sex-selective mortality patterns. Clearly, in India that there are a number of states, which hit or exceed the biologically impossible sex ratio of 110 to 100. Note, by the way, that Punjab in the year 2001 counted 127 little boys for every 100 little girls.

**INDIA: Sex Ratio Among Children Under Age 7
By State, 2001**



Source: Census of India, 2001, accessed 15 October 2002, available electronically at <http://www.censusindia.net/results/provindia2.html>.

As with China and the other Asian Tigers, there is not much evidence from India's population census that education in India is vitiating the problem. The next graphic compares literacy rates for women and the disproportion between little boys and little girls in different states of India. Educational levels vary greatly among the states of India today. But to judge by this cross-section, literacy levels do not appear to have any immediate bearing on the reduction of gender disproportion.

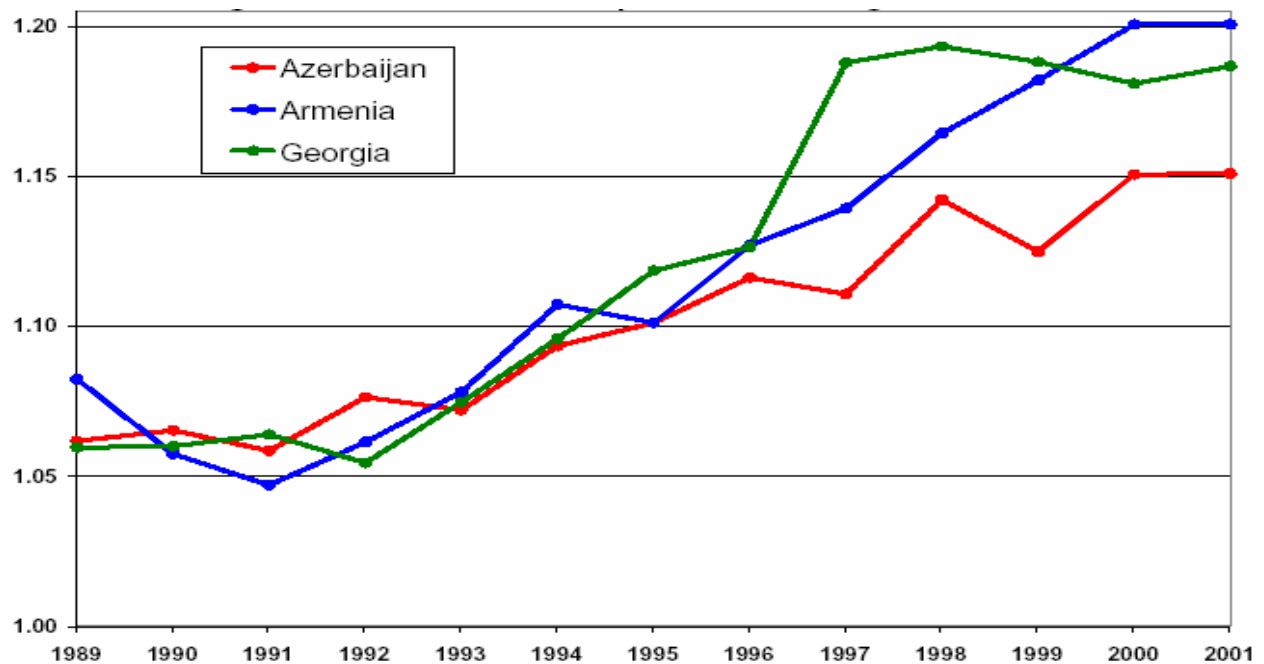
Female Literacy Rate vs. Sex Ratio Ages 0-6: Indian Provinces, 2001



Sources: <http://www.censusindia.net/results/provindia2.html>, accessed 9/14/04
Census of India, 2001: Chapter 7 Statement 32
<http://www.censusindia.net/data/chapter7.pdf> accessed 9/14/04

China and India, of course, are the world's two most populous states, together accounting for nearly two fifths of the current human population. But our tour of battlefronts in the global war against baby girls is by no means yet concluded. I'm indebted to Dennis Donahue of the Census Bureau, who alerted me to the huge upsurge in the ratio of baby boys to baby girls in Azerbaijan, Georgia and Armenia in the period since the end of the Soviet Union. Again, it is impossible to propose that natural biological processes would have caused such gender disproportions. Rather, the end of the Soviet regime ushered in an era of technological advance: including the advent of prenatal gender determination technology, which in turn made possible the practice of gender-selective abortions on a massive scale. In Armenia, Georgia and Azerbaijan, these gender aberrations are approaching what one may call the "Chinese gold standard of gender disproportion".

Sex Ratio of the Population Under Age 1: Azerbaijan, Armenia, and Georgia, 1990-2001



Source: "Surprising Sex Ratios in the South Caucasus: Son Preferences in the Former Soviet States of Armenia, Azerbaijan, and Georgia," Dennis Donahue and Jennifer Fortado. International Programs Center, U.S. Census Bureau, May 2003.

Most of the population of Third World countries does not live in areas where governments track birth and death records on regular, comprehensive and reliable annual basis. There are precious few countries in different parts of the world where annual vital registration data are accurately updated each year. . Yet the limited data at hand reveal what are historically aberrant and, in any large national population, biologically impossible ratios in various countries around the world, including Europe and Latin America.

International Sex Ratios At Birth Over 107, Based On Vital Registration Data: Recent Years

| | | | | | |
|-------------------|-------------|--------------|--------------------|-------------|--------------|
| Bulgaria | 1997 | 108 | Cuba | 1998 | 109.4 |
| Estonia | 1997 | 107.8 | “ | 1996 | 118.0 |
| Greece | 1998 | 107.2 | El Salvador | 1998 | 107.1 |
| “ | 1995 | 108.0 | Venezuela | 1998 | 107.5 |
| Luxembourg | 1998 | 109.9 | “ | 1996 | 107.5 |
| Macedonia | 1999 | 108.4 | | | |
| “ | 1997 | 108.7 | | | |
| “ | 1995 | 110.7 | | | |
| Yugoslavia | 1999 | 107.2 | | | |

Source: UN Demographic Yearbook, 1997 through 2000 editions

Of the countries in Europe, Luxembourg is a possible statistical exception because of its extremely small annual number of births (under 6,000 a year in the late 1990s). Macedonia, however, cannot claim the same exemption from the laws of sampling error, and in Yugoslavia, it becomes clear, *ethnic* cleansing is not the only national demographic sport.

Again, in East Asia, Macau follows the echoes of the Chinese mainland and nearby Hong Kong. In largely Muslim Malaysia, the Philippines, and in Singapore, too, the gender ratios are abnormally high. It is worth noting that Singapore's national ratio is higher than the Chinese ethnic ratio, which suggests that local Malaysian and Indian populations have even higher sex ratios at birth than the local Chinese population.

International Sex Ratios At Birth Over 107, Based On Vital Registration Data: Recent Years, Continued

| | | | | | | | | |
|--------------|-------------|--------------|---------------|-------------|--------------|-------------------|-------------|--------------|
| Macao | 2000 | 111.7 | Cyprus | 1998 | 107.1 | Cape Verde | 1990 | 107.5 |
|--------------|-------------|--------------|---------------|-------------|--------------|-------------------|-------------|--------------|

| | | | | | | | | |
|------------------------------|-------------|--------------|-------------------|-------------|--------------|----------------|-------------|--------------|
| Malaysia (Peninsular) | 1998 | 107.1 | Kyrgyzstan | 1996 | 107.2 | Egypt | 1995 | 108.7 |
| Philippines | 1993 | 108.7 | Pakistan | 1997 | 107.7 | “ | 1990 | 109.3 |
| Singapore | 2000 | 109.2 | “ | 1994 | 110.9 | Libya | 1996 | 108.5 |
| | | | “ | 1993 | 110.0 | Tunisia | 1995 | 107.3 |
| | | | Qatar | 1992 | 107.2 | | | |

Source: UN Demographic Yearbook, 1997 through 2000 editions

Moving toward the African continent Egypt, Libya, and Tunisia, that is to say, most of the countries of the Maghreb, display notable gender irregularities. And in Western Asia, anomalous gender imbalances are reported in Qatar, Kyrgyzstan, Cyprus, Pakistan (which does not have comprehensive vital statistics registration, but records large numbers of births on a regular basis).

One may wonder: what are the prospects for the war against baby girls in the globe's vast Muslim expanse? . As it happens, one of the few countries in the Third World that *does* ask about gender preference for the next birth is the government of Pakistan. Just as in many parts of India, a preference for boys over girls in the order of ten to one is evident.

Preferred Sex of Next Child: Pakistan, 1990-91

| | Gender Preference | | | | | |
|-----------------------|-------------------|----------|---------------|-------------------|-------|-----------------|
| | Son | Daughter | No Preference | Missing/ Other | Total | Number of Women |
| No children | 31.7 | 0.2 | 67.6 | 0.5 | 100.0 | 512 |
| One child | 49.5 | 4.3 | 46.2 | -- | 100.0 | 548 |
| Two children | 47.5 | 11.0 | 41.5 | -- | 100.0 | 417 |
| Three children | 63.9 | 7.0 | 29.1 | -- | 100.0 | 329 |
| Four children | 62.8 | 6.4 | 30.6 | 0.2 | 100.0 | 193 |
| Five children | 59.3 | 4.5 | 36.2 | -- | 100.0 | 175 |

| | | | | | | |
|--------------|------|-----|------|-----|-------|------|
| Total | 49.1 | 5.2 | 45.6 | 0.1 | 100.0 | 2174 |
|--------------|------|-----|------|-----|-------|------|

Note: Figures in parentheses are based on 25 to 49 unweighted women.

-- less than 0.05 percent.

Source: <http://www.measuredhs.com/pubs/pdf/FR29/08Chapter8.pdf> accessed 9/15/04

Another rare survey on parental gender preference for a next child exists for the country of Yemen. The graph below clearly shows the preference of parents for boys over girls to be many fold.

Preferred Sex of Next Child: Yemen, 1997

| | Gender Preference | | | | | | Number of Women |
|---------------------------|-------------------|----------|---------------|------------|---------------|-------|-----------------|
| | Son | Daughter | No preference | God's will | Missing/Other | Total | |
| No children | 28.3 | 13.1 | 44.2 | 14.2 | 0.3 | 100.0 | 770 |
| One child | | | | | | | |
| No sons | 56.6 | 3.2 | 28.6 | 10.7 | 0.8 | 100.0 | 367 |
| One son | 8.0 | 51.2 | 29.1 | 11.7 | 0.0 | 100.0 | 366 |
| Two children | | | | | | | |
| No sons | 72.4 | 1.4 | 13.3 | 12.8 | 0.0 | 100.0 | 146 |
| One son | 28.1 | 9.5 | 41.1 | 20.5 | 0.9 | 100.0 | 271 |
| Two sons | 5.4 | 66.9 | 20.5 | 7.2 | 0.0 | 100.0 | 156 |
| Three children | | | | | | | |
| No sons | 76.4 | 0.0 | 7.0 | 16.6 | 0.0 | 100.0 | 65 |
| One son | 47.3 | 1.9 | 36.1 | 13.9 | 0.8 | 100.0 | 134 |
| Two sons | 14.7 | 35.3 | 36.9 | 12.7 | 0.4 | 100.0 | 181 |
| Three sons | (0.0) | (83.4) | (11.3) | (5.3) | (0.0) | 100.0 | 66 |
| Four children | | | | | | | |
| No sons | 82.6 | 2.9 | 12.7 | 1.8 | 0.0 | 100.0 | 38 |
| One son | 61.2 | 5.4 | 21.2 | 12.0 | 0.2 | 100.0 | 89 |
| Two sons | 28.4 | 6.3 | 41.0 | 24.3 | 0.0 | 100.0 | 99 |
| Three sons | 15.7 | 46.8 | 25.0 | 11.6 | 1.0 | 100.0 | 83 |
| Four sons | 12.4 | 64.1 | 11.4 | 12.1 | 0.0 | 100.0 | 19 |
| Five children+ | | | | | | | |
| No sons | 86.4 | 0.0 | 10.6 | 3.0 | 0.0 | 100.0 | 25 |
| One son | 73.0 | 0.7 | 11.8 | 14.6 | 0.0 | 100.0 | 65 |
| Two sons | 39.2 | 2.2 | 40.4 | 18.3 | 0.0 | 100.0 | 110 |
| Three sons | 29.2 | 19.4 | 33.6 | 17.9 | 0.0 | 100.0 | 139 |
| Four sons | 20.3 | 26.4 | 43.7 | 8.5 | 1.1 | 100.0 | 104 |
| Five sons or more | 16.1 | 53.2 | 22.6 | 7.1 | 1.1 | 100.0 | 76 |
| Family composition | | | | | | | |

| | | | | | | | |
|--------------------|------|------|------|------|-----|-------|-------|
| No living children | 28.3 | 13.1 | 44.2 | 14.2 | 0.3 | 100.0 | 770 |
| All boys | 6.4 | 60.0 | 24.0 | 9.6 | 0.0 | 100.0 | 622 |
| All girls | 64.9 | 2.4 | 21.3 | 11.0 | 0.4 | 100.0 | 641 |
| Boys = Girls | 27.9 | 8.5 | 42.1 | 21.0 | 0.5 | 100.0 | 430 |
| Boys > Girls | 16.1 | 38.1 | 33.0 | 12.0 | 0.8 | 100.0 | 460 |
| Boys < Girls | 51.9 | 3.1 | 30.1 | 14.6 | 0.2 | 100.0 | 447 |
| Total | 32.6 | 21.2 | 32.4 | 13.3 | 0.3 | 100.0 | 3,369 |

Note: Figures in parentheses are based on 25 to 49 unweighted women.

-- less than 0.05 percent.

Source: <http://www.measuredhs.com/pubs/pdf/FR94/06Chapter06.pdf> accessed 9/15/04

The Palestinian Authority also collects survey information on gender preference. For women in the West Bank in Palestine, the preference for a boy over a girl as next birth is almost three to one. For men it is over five to one. This even more exaggerated preference for boys on the part of prospective fathers should be kept in mind. After all the role of men in determining family outcomes in a traditional Islamic setting is not exactly incidental.

**Sex Preference for Next Child Among Palestinian Women and Husbands
Who Want More Children: West Bank, 2001**

| | Women (n=424) | | | Husbands (n=513) | | |
|--------------------------------------|----------------------|-------------|------------------|-------------------------|-------------|------------------|
| | <i>Boy</i> | <i>Girl</i> | <i>Up to God</i> | <i>Boy</i> | <i>Girl</i> | <i>Up to God</i> |
| Total | 27.5 | 10.6 | 61.9 | 35.7 | 6.9 | 57.3 |
| Sex composition of living children | | | | | | |
| No boys | 35.8 | 6.7 | 57.5 | 36.2 | 8.6 | 55.2 |
| No girls | 16.3 | 20.5 | 63.2 | 22.9 | 14.6 | 62.4 |
| Boys > girls | 7.0 | 26.1 | 67.0 | 27.9 | 10.4 | 61.7 |
| Boys = girls | 21.3 | 8.5 | 70.1 | 22.7 | 9.4 | 68.0 |
| Boys < girls | 49.7 | 0.7 | 49.7 | 55.1 | 1.7 | 43.3 |
| Source: client exit interview | | | | | | |

Source: http://www.hdip.org/reports/php_baseline.htm#tab7, Table 7, accessed 9/15/04

Taken together the data assembled above presents compelling evidence that the war against baby girls is, indeed, a war of truly global proportions. It encompasses East and West Asia, the Indian subcontinent, North Africa, parts of Europe and the western hemisphere.

Data on parental preferences for next birth would be most useful in predicting the development of the global war on baby girls. A second best indicator would be information on death rates for little girls and little boys. Just as there is a biological regularity to the number of baby boys and baby girls born in any normal population, there is also a biological regularity to mortality schedules. At any given age, in a normal population, the death rate for males is a little higher than that for females. This can be seen over time, in different settings, different ethnicities, and different countries. It is an occurrence so regular, that it may be taken as a rule.

Are There Any Leading Indicators for *Future* SRB Imbalances?

- **Possibly, death rates for ages 1-4.**
- **Male rates are normally always higher**
- **If death rates for little girls are higher, this may be evidence of existing deadly discrimination practices**
- **We can determine child mortality rates from national “life tables” published by WHO and UNPD**

Nevertheless, there are places in the world where the death rates for little girls, on an episodic or on a regular basis, are higher than those for little boys. If we take those abnormal and highly unusual distortions as a sign of extreme son preference, we should examine how the imbalance between sex ratios at birth corresponds with those peculiar patterns where death rates for little girls are higher than those for little boys. It is worth investigating what countries remain in these regions where, so to speak, the sex-ratio-at-birth “shoe” had not yet been dropped.

Key To Following Charts

Boldface: history of deadly discrimination *plus* existing SRB imbalance

No boldface: history of deadly discrimination against little girls but not SRB imbalance yet detected

Asterisk*: population over 25% Muslim

The chart below identifies five places in East Asia where historically there have been higher death rates for little girls than for little boys, and where today we see impossible sex ratios at birth. It should be noted, however, that there are as yet many other places in East Asia where there have been reports of higher death rates for little girls than for little boys--but where the sex ratio at birth has not yet risen to biologically impossible levels.

The Shape of Things To Come? East Asia & Pacific

| | |
|-----------------------------|---------------------|
| China | Democratic People's |
| <i>Hong Kong</i> | Republic of Korea |
| <i>Peninsular Malaysia*</i> | Mongolia |
| <i>Republic of Korea</i> | Myanmar |
| <i>Taiwan</i> | Nauru |
| <i>Brunei*</i> | <i>Sabah*</i> |
| <i>Burma</i> | <i>Sarawak*</i> |
| Cambodia | <i>Thailand</i> |

Note: Italicized countries rely on data from the U.N. Population Division life tables; Regular font indicates data from World Health Organization life tables
Sources: World Health Organization Life Tables, available online at

http://www3.who.int/whosis/life_tables/life_tables.cfm?path=evidence,life_tables&language=english accessed 9/15/04; United Nations Population Division Life Tables.

South Asia has a history of prejudicial death rates for little girls. Thus far, the sex ratios at birth in India and Pakistan have felt the effect of this prejudicial treatment. There is a reason to wonder whether the “fertile ground” in Bangladesh, Bhutan, Maldives, Nepal and Sri Lanka will be plowed in the same manner in the years ahead.

The Shape of Things To Come? South Asia

| | |
|------------------|------------------|
| India | Maldives* |
| Pakistan* | Nepal |
| Bangladesh* | <i>Sri Lanka</i> |
| Bhutan | |

Note: Italicized countries rely on data from the U.N. Population Division life tables;

Regular font indicates data from World Health Organization life tables

Sources: World Health Organization Life Tables, available online at

http://www3.who.int/whosis/life_tables/life_tables.cfm?path=evidence,life_tables&language=english accessed 9/15/04; United Nations Population Division Life Tables

Three large countries in Europe (Greece, Macedonia, and Yugoslavia) betray some hints of prejudicial death rates for little girls in the post-war period. These differentials, should be emphasized, are not enormous—to the contrary, they are very small--but are nonetheless curious and unusual. Three other European countries (Italy, Luxembourg, and Norway) have seen strange and noteworthy increases of imbalances in sex ratio at birth, but have not yet reached biologically impossible levels.

The Shape of Things To Come? Europe

| | |
|-------------------|------------|
| Greece | Italy |
| Macedonia* | Luxembourg |
| Yugoslavia | Norway |

Note: Italicized countries rely on data from the U.N. Population Division life tables; Regular font indicates data from World Health Organization life tables.

Sources: World Health Organization Life Tables, available online at http://www3.who.int/whosis/life_tables/life_tables.cfm?path=evidence,life_tables&language=english accessed 9/15/04; United Nations Population Division Life Tables.

In the western hemisphere, Venezuela and El Salvador both have unnatural death rates for little girls and now also display unnatural sex ratios at birth. The rest of the countries in the list warrant careful observation in the future.

The Shape of Things To Come? Latin America/Caribbean

| | |
|---------------------|--------------------|
| El Salvador | Dominican Republic |
| Venezuela | Guatemala |
| Antigua and Barbuda | Haiti |
| <i>Bahamas</i> | <i>Honduras</i> |
| <i>Barbados</i> | <i>Mexico</i> |
| Bolivia | Nicaragua |
| <i>Chile</i> | Peru |
| <i>Columbia</i> | <i>Puerto Rico</i> |
| <i>Costa Rica</i> | <i>Uruguay</i> |

Note: Italicized countries rely on data from the U.N. Population Division life tables; Regular font indicates data from World Health Organization life tables

Sources: World Health Organization Life Tables, available online at http://www3.who.int/whosis/life_tables/life_tables.cfm?path=evidence,life_tables&language=english accessed 9/15/04; United Nations Population Division Life Tables.

With the exception of Armenia, there are significant Muslim populations in all of the other countries in the table below. Four of those countries (Cyprus, Egypt, Libya, and Tunisia) have already reported both adverse death rates for little girls and abnormal gender imbalances in sex ratio at birth. The rest of the countries listed may demarcate a field of concern for the future. Note, incidentally, that the Palestinian population in the West Bank—whose preference for sons is so strongly ratified in health and demographic survey data—happens to be one of those showing abnormal death ratio for little girls.

| The Shape of Things To Come? Middle East/North Africa/West Asia | |
|--|---------------------------------|
| <i>Armenia</i> | Iraq* |
| Cyprus* | <i>Israel (non-Jewish pop)*</i> |
| Egypt* | Jordan* |
| Libya* | <i>Kuwait*</i> |
| Tunisia* | Lebanon* |
| Afghanistan* | Oman * |
| <i>Algeria*</i> | Syria* |
| <i>Bahrain*</i> | Tajikistan* |
| Djibouti* | Yemen* |
| Iran* | |

Note: Italicized countries rely on data from the U.N. Population Division life tables; Regular font indicates data from World Health Organization life tables
Sources: World Health Organization Life Tables, available online at http://www3.who.int/whosis/life_tables/life_tables.cfm?path=evidence,life_tables&language=english accessed 9/15/04; United Nations Population Division Life Tables.

In sub-Saharan Africa there apparently as yet no indications of abnormal gender imbalances at birth. But estimated life tables for almost every country in the sub-Sahara are imprinted with discriminatory discrepancies between death rates of little girls and little boys. The absence of any indications as yet of unnatural sex ratios at birth in the sub-Sahara may have

to do with wise parental decisions. On the other hand, it might simply speak to the lack of prenatal sex determination technology in those areas of the world—so far.

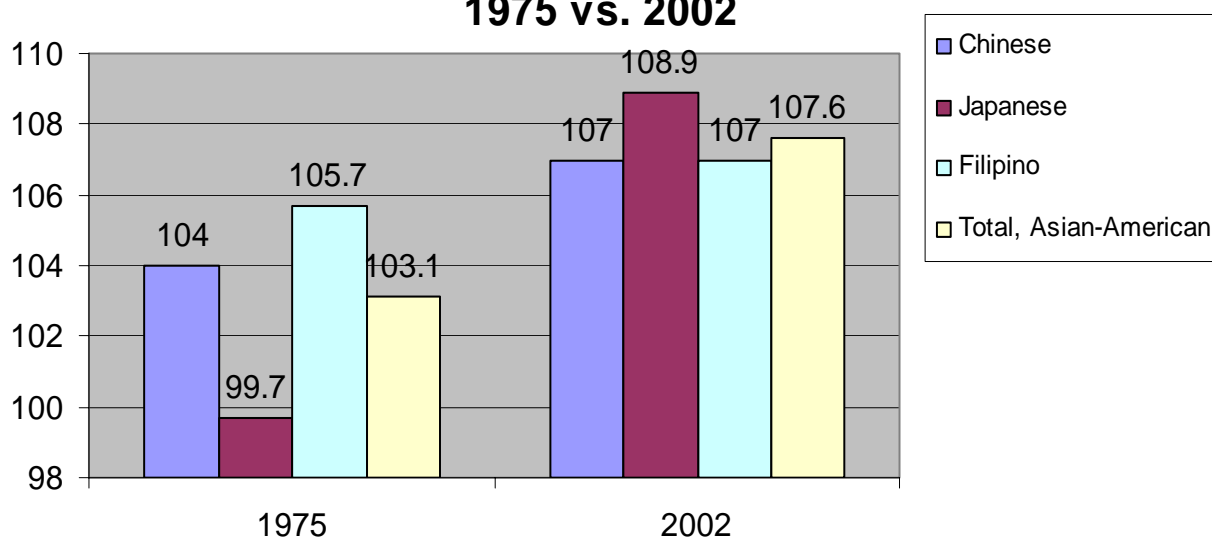
| The Shape of Things To Come? Sub-Saharan Africa | | |
|--|-----------------------|----------------------|
| Angola | Ethiopia* | Mozambique |
| Benin | Gabon | Namibia |
| Botswana | Gambia* | Niger* |
| <i>Burkina Faso*</i> | Ghana | Nigeria* |
| Burundi | Guinea-Bissau* | <i>Reunion</i> |
| Cameroon | Kenya | Rwanda |
| Central African Republic | Lesotho | Sao Tome |
| Chad* | <i>Liberia</i> | <i>Senegal*</i> |
| Comoros | <i>Madagascar</i> | <i>Sierra Leone*</i> |
| Congo | Malawi | Somalia* |
| Cote d'Ivoire | Mali | Sudan* |
| Dem. Republic of the Congo | Mauritania* | Swaziland |
| Equatorial New Guinea | <i>Mauritius</i> | Tanzania* |
| Eritrea* | | Togo |
| | | Uganda |
| | | Zambia |
| | | Zimbabwe |

Note: Italicized countries rely on data from the U.N. Population Division life tables; Regular font indicates data from World Health Organization life tables.

Sources: World Health Organization Life Tables, available online at http://www3.who.int/whosis/life_tables/life_tables.cfm?path=evidence,life_tables&language=english accessed 9/15/04; United Nations Population Division Life Tables.

Perhaps this portrait of a war that is apparently unfolding on practically every continent outside North America around the world should make us happy we live in the United States. Unfortunately, the situation is not necessarily rosy in “the land of the free”. Some of the changes in reported sex ratios at birth in the United States over the past generation are deeply disturbing. There has been a notable and substantial increase, for example, in sex ratios at birth for the Chinese-American population, the Japanese-American population, and the Filipino-American population, as well as for the Asian-American population as a whole. All of these American ethnicities now exhibit sex ratios at birth that could be considered biologically impossible.

It Can't Happen Here? Sex Ratio At Birth, Asian Americans 1975 vs. 2002



Note: Total 1975 births for each population are as follows: Chinese, 8413; Japanese, 7442; Filipino, 11233

Total 2002 births for each population are as follows: Chinese, 33673; Japanese, 9264; Filipino, 33016

Source: Derived from U.S. National Center for Health Statistics, *Vital Statistics of the United States*, 1975 and 2002 editions, Volume I.

By the same logic that led us to remove Luxembourg from immediate suspicion in a previous graphic—i.e., low sample size-- we may wish similarly to exempt our Asian-American populations. An argument could be made that these statistical data cannot be accorded too much

confidence, because there are relatively few Asian-Americans in our midst, because Asian-Americans have relatively low fertility levels, and because we are looking at relatively small numbers of total births in any given year.

Such arguments, unfortunately, do not withstand scrutiny, under ordinary application of the techniques of statistical inference. In 1975 Asian-American births totaled roughly 130,000 to 140,000. In 2002 their numbers exceeded 200,000. These are not small “sample sizes”. Under a “normal distribution” we can calculate just how likely would be the Asian-American 1975 and 2002 birth rates presented in the graph were chance discrepancies: those odds work out to about 1.5 in a billion. To make the odds even smaller, we could “pool” data: adding together the figures on births and sex ratios at birth for recent years, and then comparing those results to the corresponding figures from the early 1970s. Viewed from this perspective, the odds against seeing the recently SRBs reported by Asian-American communities as an artifact of pure chance would rise into the tens of billions.

“It can’t happen here”? Think again: quantitative data and applied statistical reasoning provide us with unavoidable evidence beyond any reasonable doubt that *it is happening here*.

How will the global war against baby girls unfold in the years immediately ahead? At the dawn of the 21st century, sex preference for boys is prevalent in many parts of the world. Prenatal gender determination technologies are becoming increasingly accessible and inexpensive. And as my colleague Ben Wattenberg points out in his book “Fewer: How the New Demography of Depopulation Will Shape Our Future”, fertility trends all around the world are dropping rapidly, and lower than ever before: at this juncture, approximately half the world’s population lives in countries where sub-replacements levels of fertility currently prevail.

If my hypothesis above is correct—that is to say, if the freakish SRBs we are now beginning to witness around the world are the consequence of a by the fateful collision between overweening son preference, the use of rapidly spreading prenatal sex determination technology

for gender-based abortion, and the low or dramatically declining fertility levels---then it may well be, as the late President Ronald Reagan said in a very different context, that “You ain’t seen nothing yet”.