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National Family Health Survey

(MCH and Family Planning)

Bihar

1993

Summary Report

Population Research Centre, Patna University, Patna

International Institute for Population Sciences, Bombay

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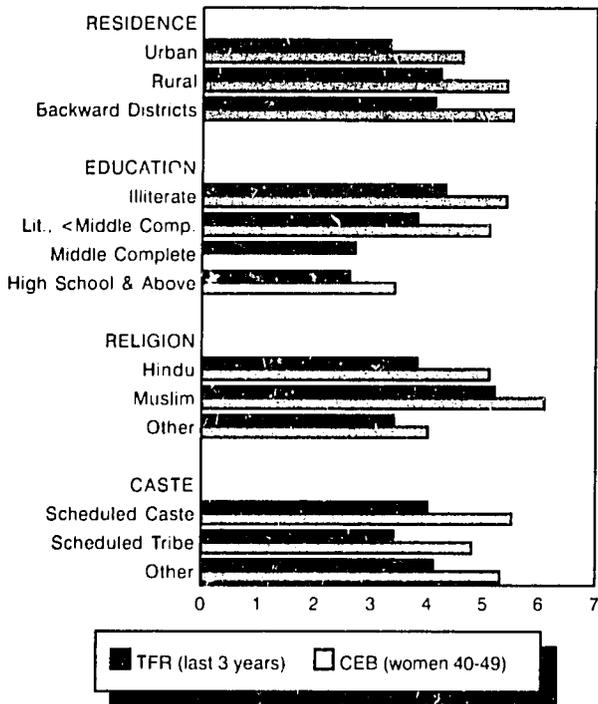


BACKGROUND

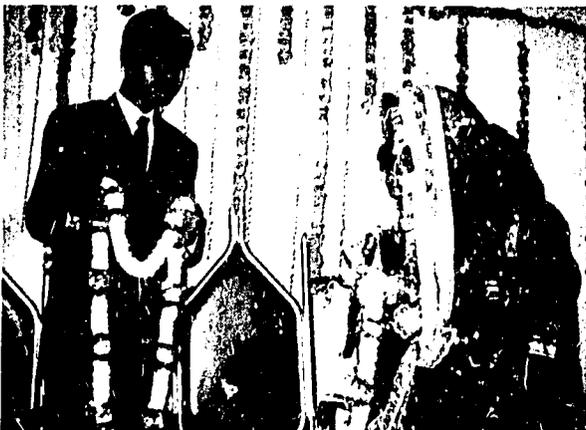
The National Family Health Survey (NFHS) is a nationally representative survey of ever-married women age 13-49. The NFHS covered the population of 24 states and the National Capital Territory of Delhi (the erstwhile Union Territory of Delhi, which recently attained statehood) to provide a source of demographic and health data for interstate comparisons. The primary objective of the NFHS was to provide national-level and state-level data on fertility, mortality, family size preferences, knowledge and practice of family planning, the potential demand for contraception, the level of unwanted fertility, utilization of antenatal services, breastfeeding and food supplementation practices, child nutrition and health, immunizations, and infant and child mortality.

In Bihar, interviewers collected information from 5,949 ever-married women age 13-49 in urban and rural areas. The fieldwork in Bihar was conducted between 18 March and 12 June 1993. The survey was carried out as a collaborative project of the Ministry of Health and Family Welfare, Government of India, New Delhi; the International Institute for Population Sciences, Bombay; the Population Research Centre, Patna University, Patna; Centre for Development Research and Training (CFDRT), Madras; the United States Agency for International Development (USAID), New Delhi; and the East-West Center/Macro International, U.S.A. Funding for the survey was provided by USAID.

Figure 1
Total Fertility Rate (TFR) and Mean Number of Children Ever Born (CEB)



Note: Mean CEB for Middle Complete is not shown because it is based on fewer than 25 cases



FERTILITY AND MARRIAGE

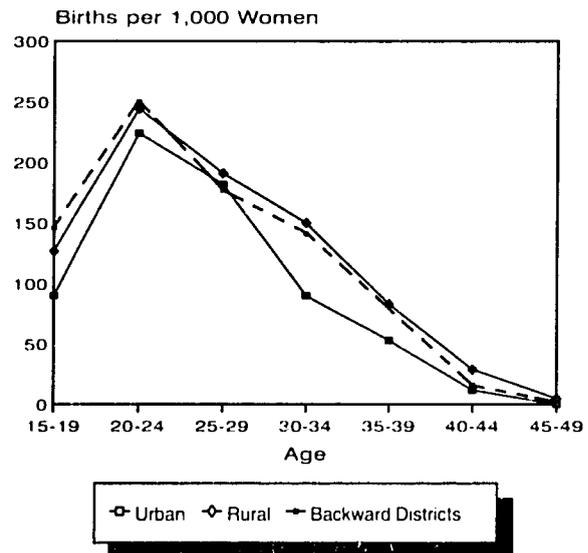
Fertility Levels, Trends and Differentials

- The fertility level has begun to decrease in Bihar, but fertility rates continue to be high. Women in their forties have had an average of more than five children, but women who are currently in their childbearing ages can be expected to have fewer than five children, on average, during their lifetime if current fertility levels prevail. The NFHS total fertility rate (TFR) in Bihar for women age 15-49 during 1990-92 was 4 children per woman, 18 percent higher than the national average of 3.4 children as estimated from the same source. As expected, the urban TFR (3.3 children per woman) was substantially lower (21 percent) than the rural TFR (4.2 children per woman). The TFR for government-designated backward districts (4.1 children per woman) is only slightly higher than the TFR for the whole state (4.0 children per woman), indicating that there are no substantial differences in fertility levels between the backward districts and other districts. In fact, the backward districts closely parallel the situation in Bihar as a whole on almost every measure included in the NFHS.

At current fertility rates women in Bihar will have an average of 4 children (18 percent higher than the national average).

- The NFHS estimates may be compared with the 1991 estimates from the Sample Registration System (SRS) maintained by the Office of the Registrar General, India. The TFR of the NFHS is 9 percent lower than the SRS estimate of 4.4 children per woman, but the crude birth rate from the NFHS (32.1 births per 1,000 population for 1990-92) is 5 percent higher than that reported by the SRS (30.7 births per 1,000 population).
- Several population subgroups, most notably educated women, have taken the lead in controlling their fertility. Educational differentials in fertility are substantial, with current fertility for illiterate women being 4.3 children per woman and that for women with at least a high school education being 2.6 children per woman.
- Differences by religion are also substantial. Muslims have the highest fertility (5.2 children per woman), followed by Hindus (3.8 children per woman) and members of other religions (3.4 children per woman). Women belonging to scheduled tribes have lower fertility than those belonging to scheduled castes and others.
- Childbearing in Bihar is concentrated among women age 15-34, who account for 87 percent of total fertility (90 percent in urban areas and 86 percent in rural areas). The contribution of women age 35-39 to the total fertility rate is only 8 percent in urban areas and 10 percent in rural areas, and the contribution of women age 40-49 is practically negligible (2 percent in urban areas and 4 percent in rural areas).

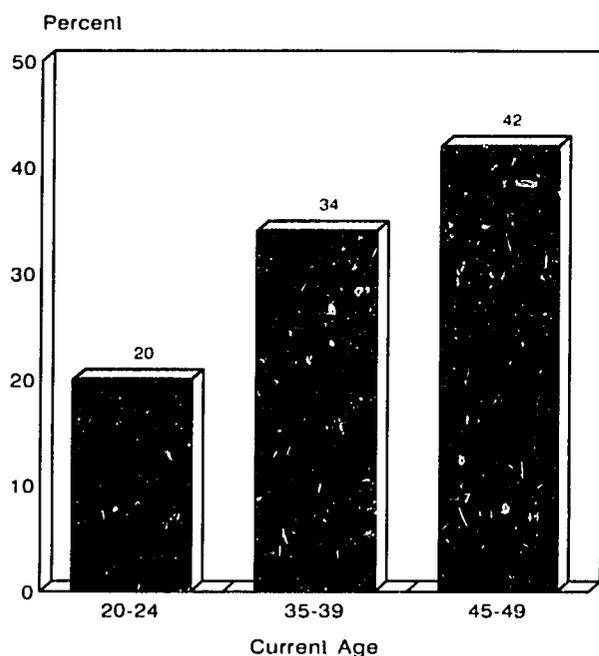
Figure 2
Age-Specific Fertility Rates by Residence



Note: Rates are for the three years before the survey (1990-92)



Figure 3
 Percentage of Women Married before Age 15, by
 Current Age



- The overall median interval between births is 34 months or about 2.8 years. One in every 10 second or higher order births occurred within 18 months of the previous birth and 24 percent occurred within 24 months. These are high-risk births with a relatively low probability of survival.

Marriage

- Marriage is virtually universal in Bihar and marriages in rural areas take place at relatively young ages. At age 15-19, a little more than half of the women are married. The proportion ever-married at age 15-19 is lower in urban areas (26 percent) than in rural areas (56 percent).
- Marriage at very young ages has declined considerably in recent times. The proportion marrying before age 13 declined from 42 percent in the 45-49 age cohort to 12 percent in the 15-19 age cohort. Similarly the proportion marrying before age 15 fell from 67 percent in the 45-49 age cohort to 29 percent in the 15-19 age cohort. Marriages below age 15 are rare in urban areas of Bihar. The median age at first marriage has been rising in both urban and rural areas but the rate of increase is considerably faster in urban areas. Urban women now marry about three years later than rural women.

Marriage at very young ages has been declining dramatically in Bihar.

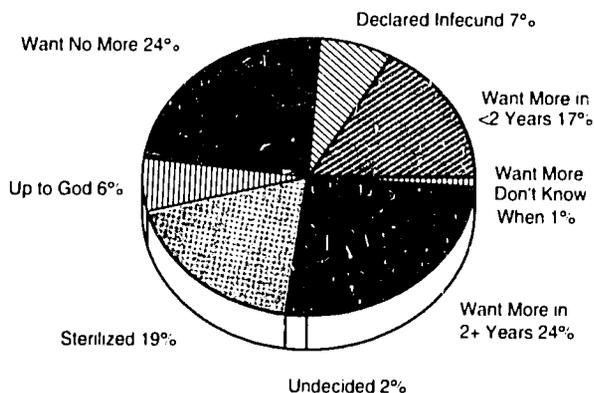
- The median age at first marriage is considerably higher among more educated women. The median age at first marriage is five years higher among women who have completed at least high school level of education than among illiterate women. Muslim women marry about one year later than Hindu women.
- According to the Child Marriage Restraint Act of 1978, the minimum legal age at marriage in India is 18 years for women and 21 years for men. In Bihar, it is clear that in the majority of marriages these legal regulations are not followed. Sixty-nine percent of women who are age 20-24 marry below the legal minimum age at marriage. A large majority of women are not aware of the legal minimum age at marriage. Only 19 percent of respondents could correctly identify age 18 as the legal minimum age at marriage for women and only 13 percent could correctly identify age 21 as the legal minimum age at marriage for men.



A large majority of women are not aware of what the legal minimum age at marriage is.

- According to respondents, a very large percent (81 percent) of the brides' families bear the cost of daughters' marriages. Presenting gifts such as cash and other commodities to the bridegroom by parents or guardians of the bride is very common in Bihar. Sixty-three percent of the respondents disapprove of the dowry system.

Figure 4
Fertility Preferences Among Currently Married Women Age 13-49



Sixty-three percent of the respondents disapprove of the dowry system.

Fertility Preferences

- A little less than one-quarter of women say they do not want any more children and 19 percent of women (or their husbands) are sterilized so that they cannot have any more children. These two groups together constitute 43 percent of all currently married women in Bihar. Overall 67 percent of women want to either space their next birth or stop having children altogether.

Sixty-seven percent of women want to either space their next birth or stop having children altogether.

- The desire for more children declines rapidly as the number of children increases. Eighty-eight percent of women with no children say they want a child and less than 1 percent say they do not want any children. The proportion who want another child drops to 51 percent for women who have two living children and 26 percent for those with three living children.
- The desire for spacing children is very strong for women with fewer than three children. Twenty percent of women with no children say they would like to wait at least two years

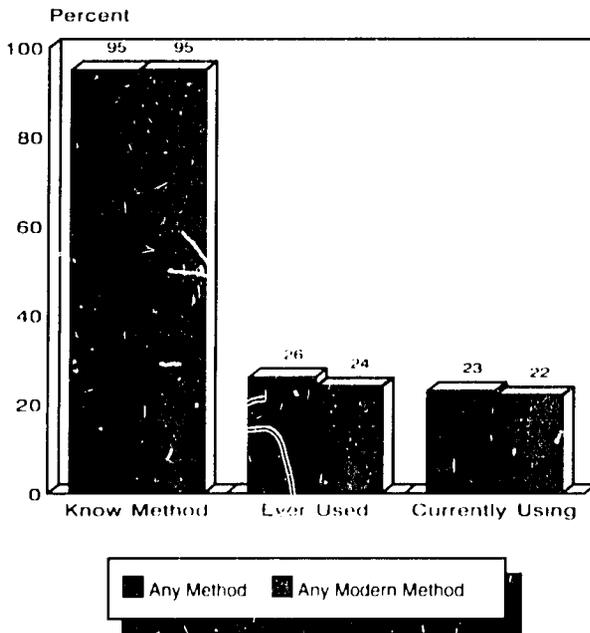
before having their first child. Similarly 61 percent of women with one child and 36 percent of women with two children would like to wait at least two years before having their next child. Since 47 percent of all women have fewer than three living children, the strong expressed desire for spacing children among these women cannot be ignored.

The desire for spacing children is very strong for women who have fewer than three children.

- The strong focus of the family planning programme on permanent methods of contraception is evidently not satisfying the needs of a large segment of women in Bihar who wish to space. The encouragement of spacing methods for women who want more children would likely lower overall fertility and population growth as well as provide health benefits to both mothers and their children.
- Among women who want another child, there is a strong preference for having a son as the next child. A little less than half (48 percent) say they want a son, only 6 percent expressed a desire for a daughter and the rest say that the sex of the child does not matter (19 percent) or that it is up to God (27 percent). The desire for a son is particularly strong in rural areas and among high parity women, but it is in urban areas as well.



Figure 5
Knowledge and Use of Family Planning
 (Currently Married Women Age 13-49)



FAMILY PLANNING

Knowledge of Family Planning Methods

- Knowledge of family planning is nearly universal in Bihar: 95 percent of currently married women know of at least one contraceptive method, and 89 percent know where they could go to obtain a modern method. Knowledge about sterilization is most widespread. This is true for male as well as female sterilization. In comparison, the three officially sponsored spacing methods are much less familiar to the respondents. The most well known among the spacing methods are pills (known by 57 percent of currently married women) and condoms (known by 55 percent). Only 44 percent of the women know about the IUD. Twenty-nine percent of the women know at least one traditional method with 26 percent reporting knowledge of periodic abstinence and only 9 percent reporting knowledge of the withdrawal method.

Knowledge of at least one modern contraceptive method is nearly universal.

Contraceptive Use

- Only 26 percent of currently married women in Bihar have ever used a contraceptive method. Modern methods have been used by 24 percent and traditional methods by 4 percent.

- Current use of contraception in Bihar is low with only 23 percent of currently married women using any method (22 percent using modern methods and less than 2 percent using traditional methods).

Only 23 percent of married women currently use family planning.

- Female sterilization is the most popular contraceptive method in Bihar, as in almost all Indian states. Female sterilization is used by 17 percent of currently married women accounting for 75 percent of the contraceptive prevalence. Another 1 percent of currently married women reported that their husbands were sterilized. No other method of family planning was used by more than 2 percent of currently married women at the time of the survey.
- Current use of contraception is more than twice as high in urban areas (43 percent) as in rural areas (20 percent). Current use of every method of family planning, including terminal methods, is higher in urban areas than in rural areas.
- The greatest differentials in current use of modern contraceptive methods are by literacy and education of the woman. A strong positive relationship exists between education and the level of current use. Differentials in current use of modern methods by education are evident between illiterate women (17 percent) and women who have completed high school (41 percent). Religious differentials in contraceptive prevalence are also quite

Figure 6
Current Use of Modern Contraceptive Methods by Education

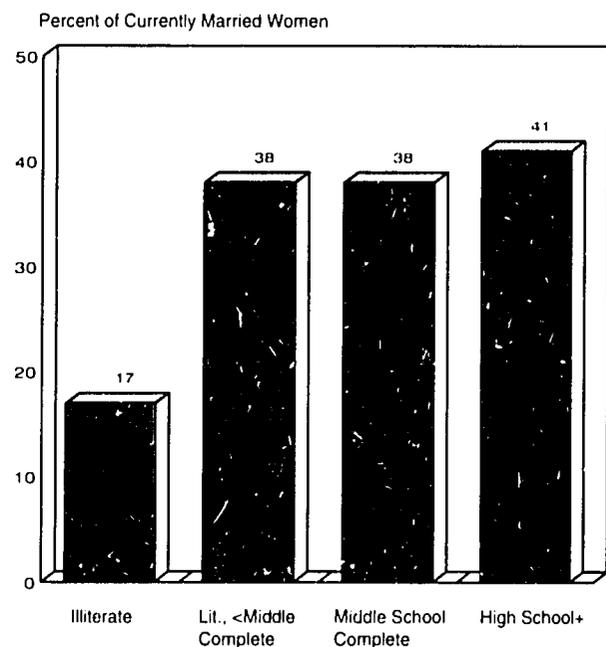
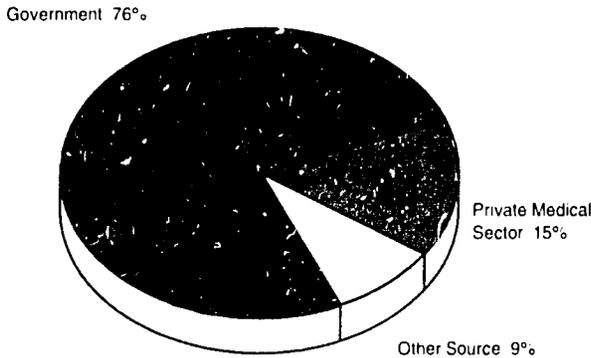


Figure 7
Sources of Family Planning Among Current Users of Modern Contraceptive Methods



substantial. Only 8 percent of Muslim women use any family planning method. The prevalence rate for Hindus is more than three times that of Muslims.

The greatest differentials in current use of modern contraceptive methods are by literacy and education of the women.

- The public sector (consisting of government/municipal hospitals, Primary Health Centres and other governmental health infrastructure) supplies three-fourths of all modern methods used, whereas the private medical sector (including private hospitals or clinics, private doctors and pharmacies/drugstores) supplies 15 percent. Nine percent of users obtain their methods from other sources such as shops and friends and relatives. In rural areas, the public sector is the source of supply for the overwhelming majority of contraceptive users (84 percent), whereas in urban areas the public sector is the source of supply for 55 percent of users. As expected, the (nonmedical and medical) private sector provides contraception for a sizeable percentage of users in urban areas (45 percent) where the use of condoms and pills is most common.

Attitudes Toward Family Planning

- Attitudes toward the use of family planning are generally positive, but a substantial minority of women do not approve of family planning. Sixty-nine percent of currently

married, nonsterilized women who know of a contraceptive method approve of family planning use and 30 percent disapprove. Twenty percent of the women think that their husbands disapprove of family planning. Forty-six percent of women report that both they and their husbands approve of family planning.

- Education of women as well as their husbands is an important determinant of the approval of family planning by both husband and wife. Overall 65 percent of illiterate women approve of family planning compared with 88 percent of women who have completed high school. Joint approval by both husband and wife is the lowest (40 percent) among illiterate women and highest (76 percent) among women who have completed high school. A similar relationship holds between joint approval of family planning and the husband's level of education.
- Approval of family planning is higher among Hindu couples (50 percent) than among Muslims (29 percent). Approval is lower among those belonging to scheduled tribes than scheduled castes and other groups.
- More than 95 percent of women who have ever used family planning report that they approve of family planning. Among never users, however, 66 percent of women approve of family planning. Among never users who approve of family planning, only 7 percent say their husbands do not approve of family planning.





- Overall, two-thirds of currently married nonusers report that they do not intend to use contraception in the future. Only one in five say they will use contraception in the future and 11 percent are not sure about their intentions. Among intended users of contraception 33 percent have shown preference for using modern spacing methods. Female sterilization was the most preferred method (61 percent), followed by pills (26 percent) and condoms and IUDs (3 percent each).

Overall two-thirds of currently married nonusers do not intend to use contraception in future.

Exposure to Family Planning Messages

- The efforts to disseminate family planning information through electronic mass media succeeded in reaching only a little more than one-fourth of ever-married women in Bihar. This is not surprising since only 11 percent of households in the state own television and only 27 percent own radios.
- Urban-rural differentials in media coverage are very substantial. Family planning messages on radio or television reach 66 percent of women in urban areas compared with only 20 percent of women in rural areas.
- Thirty-eight percent of women say it is acceptable to have family planning messages on radio and television, whereas only 11 percent say it is not acceptable and the rest (just over half) are not sure. Younger women (under age 20) and older women (over age

39), rural residents, illiterate women, Muslim women and women belonging to scheduled castes and tribes are less likely than others to think it is acceptable to broadcast family planning messages on radio or television.

Need for Family Planning Services

- Overall 25 percent of women in Bihar have an unmet need for family planning. These are women who are not using family planning even though they either do not want any more children or want to wait at least two years before having another child. The unmet need is slightly greater for spacing births (14 percent) than for limiting births (11 percent). Together with the 23 percent of currently married women who are using contraception, a total of 48 percent of currently married women have a demand for family planning. If all women who say they want to space or limit their births were to use family planning, the contraceptive prevalence rate could increase from 23 percent to 48 percent of married women.

Overall 25 percent of women in Bihar have an unmet need for family planning.

Figure 8
Unmet Need for Family Planning by Selected Characteristics

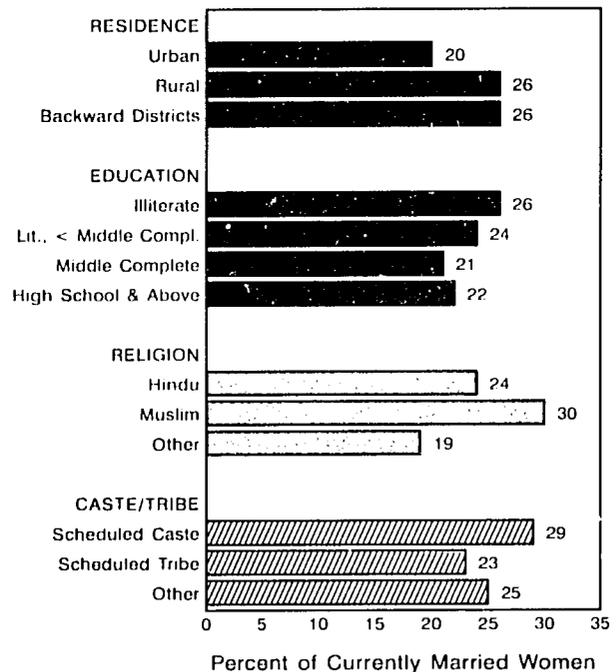
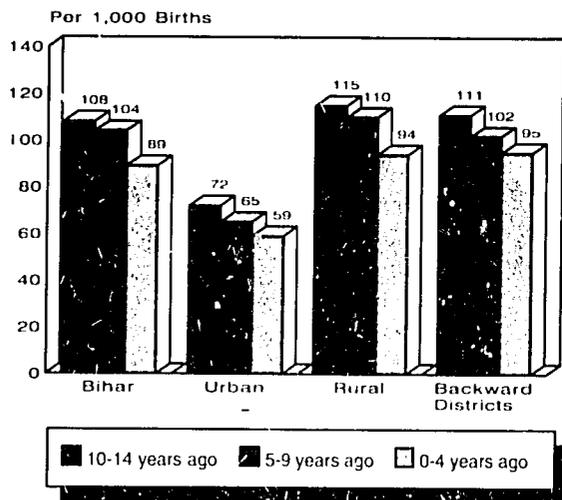


Figure 9
Infant Mortality Rates for Five-Year Periods
by Residence



Note: Rates are for 5-year periods preceding the survey



MATERNAL AND CHILD HEALTH

Infant and Child Mortality

- Infant mortality rates have declined considerably in Bihar. The infant mortality rate for the state as a whole declined from 108 infant deaths per 1,000 live births during 1978-82 (10-14 years prior to the survey) to 89 infant deaths per 1,000 live births during 1988-92 (0-4 years prior to the survey), an annual rate of decline of nearly two infant deaths per 1,000 live births. Despite the overall decline in infant mortality (18 percent over a 10-year period), 1 in every 11 children born in the five years before the survey died within the first year of life, and 1 in every 8 children died before reaching age five. Child survival programmes, therefore, still need to be intensified to produce further improvements in the level of infant and child mortality in Bihar.

One in 11 children dies before reaching the age of one year.

- Infant mortality rates for the 10-year period preceding the survey are 64 percent higher in rural areas (102 per 1,000 live births) than in urban areas (62 per 1,000 live births). Children in rural areas of Bihar experience 62 percent higher risk of dying before their fifth birthday than urban children.

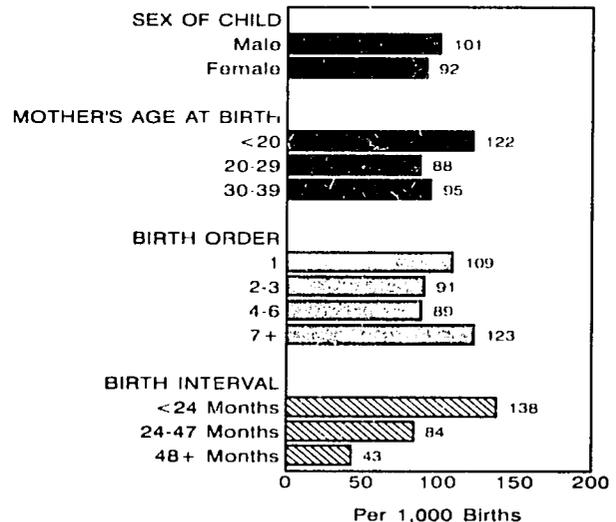
- Infant mortality declines sharply with increasing education of women, as expected, ranging from a high of 103 per 1,000 live births for illiterate women to a low of 54 per 1,000 live births for women with at least a high school education.

Infant mortality declines sharply with increasing education of women.

- Neonatal mortality, which reflects a substantial component of congenital conditions, is higher for males than for females (64 per 1,000 live births among males compared with 50 per 1,000 live births for females for the 10-year period preceding the survey). However, in the postneonatal stage where environmental factors play a major role, the mortality for females is higher than for males, the ratio of female to male postneonatal mortality is 1.14. The ratio of female to male mortality under age 5 is 1.06. These ratios indicate that there is higher female mortality at all stages of childhood except the neonatal stage. The findings reflect the disadvantageous position of girls in Bihar.

Female mortality is higher than male mortality at all stages of childhood except the neonatal stage.

Figure 10
Infant Mortality Rates by Selected Demographic Characteristics



Note: Based on births in the 10 years preceding the survey

Figure 11
Antenatal Care, Place of Delivery, and Assistance During Delivery



- Infant mortality is highest for children of mothers under age 20 (122 per 1,000 live births) and age 30-39 (95 per 1,000 live births). The lowest infant mortality rate, 88 per 1,000 live births, is observed for women in prime childbearing years (20-29 years). Infant mortality is well over three times as high for children with a preceding birth interval of less than 24 months as for children with a preceding interval of 48 months or more (138 compared with 43 per 1,000 live births).

Children born after a short birth interval are at a much greater risk of dying than children born after a long birth interval.

Antenatal Care and Assistance at Delivery

- Utilization of both antenatal care and delivery services is poor in Bihar. Most pregnant women receive no antenatal care. During the four years preceding the survey, mothers received antenatal care for only 37 percent of births. Similarly, women received at least two tetanus toxoid injections for only 31 percent of births.
- There are substantial differences in antenatal care by residence and by education. The percentage of births for which the mothers received antenatal care is 66 in urban areas and 33 in rural areas. Antenatal care ranges from 28 percent for births to mothers who are illiterate to 85 percent for births to mothers with at least a high school education.

- Most babies (87 percent) are delivered at home, 6 percent are delivered in public health facilities and the same percentage in private health facilities. Thirteen percent of deliveries are assisted by a doctor, 6 percent by nurse/midwife, another 58 percent by a traditional birth attendant and 22 percent by a relative or other person. Thus in Bihar a sizeable proportion of deliveries are conducted by untrained persons, resulting in higher neonatal mortality.

Eighty-seven percent of babies are delivered at home and most women do not receive any antenatal care.

Breastfeeding and Supplementation

- Breastfeeding is nearly universal in Bihar with 95 percent of all children having been breastfed. The practice of breastfeeding is high in all groups, ranging from 89 to 97 percent.
- Less than 2 percent of children are breastfed within one hour of birth and 12 percent started breastfeeding within one day of birth. A substantial majority of women squeeze the first milk from the breast before they begin breastfeeding their babies, thereby depriving the infant from receiving an adequate amount of colostrum which provides natural immunity against diseases and important nutrients to the child.

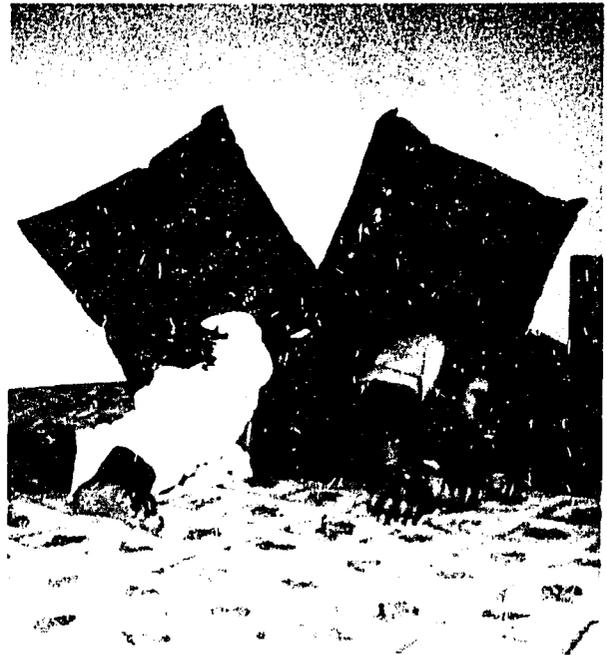
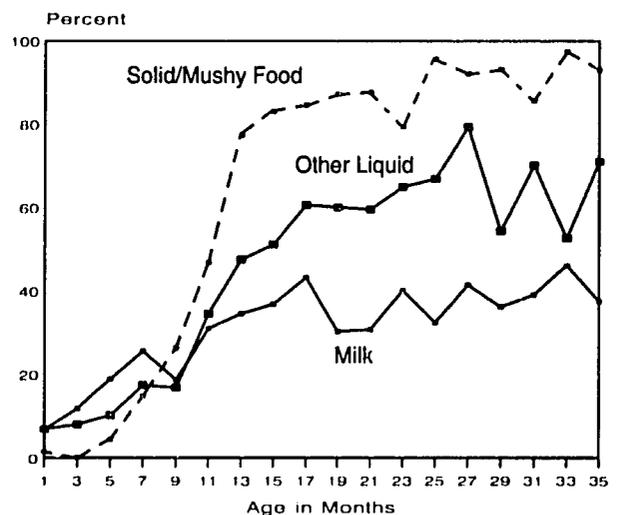


Figure 12
Percentage of Children Given Milk, Other Liquid, or Solid/Mushy Food the Day Before the Interview



Note: Based on youngest child being breastfed.
Milk refers to fresh milk and tinned/powdered milk



A substantial majority of women squeeze the first milk containing colostrum from the breast before breastfeeding their babies.

- Exclusive breastfeeding (which is recommended for all children though age 4-6 months) is quite common for very young children but even at age 0-1 months 41 percent of babies are given water or other supplements. On average about 52 percent of infants under four months are given only breastmilk (exclusively breastfed). The percentage of babies being exclusively breastfed drops off rapidly after the first few months of life to less than 10 percent at age 10-11 months and older ages. Seventy-nine percent of infants under four months receive full breastfeeding which includes those who are exclusively breastfed and those who receive breast milk and plain water only. Although solid or mushy food should be added to a child's diet by age 6-9 months to supplement breastmilk, the majority of breastfed children do not receive solid or mushy food until they are one year old.

The use of bottles with nipples is relatively rare in Bihar, increasing from 4 percent in the first two months after birth to a high of 13 percent for children age 10-11 months after which it declines slowly to zero for children approaching four years of age.

The use of bottles with nipples is relatively rare.

Vaccination of Children

- Of children age 12-23 months, about one-third have received the BCG vaccine, about two-fifths (43 percent) the first dose of DPT and 45 percent the first dose of polio. Only 32 percent have received all three doses of polio, 29 percent have received all three doses of DPT, and even fewer children have been vaccinated against measles (15 percent).
- Only 11 percent of children age 12-23 months are fully vaccinated and 54 percent have not received any vaccination. Twenty-two percent of children in urban areas and 9 percent in rural areas are fully vaccinated. Except for the polio vaccine given at birth, boys are more likely to have been vaccinated against childhood diseases than girls. The proportion of children who have been fully vaccinated also varies by education: only 5 percent of illiterate mothers have been fully vaccinated compared with 40 percent of children of mothers who have completed high school.

Fifty-four percent of young children have not received any vaccination against six preventable childhood diseases.

Child Morbidity and Treatment Patterns

- During the two weeks preceding the survey 4 percent of children under age four had symptoms of acute lower respiratory infection (cough accompanied by fast breathing). Seventy-three percent of these children were

Figure 13
Vaccination Coverage Among Children Age 12-23 Months

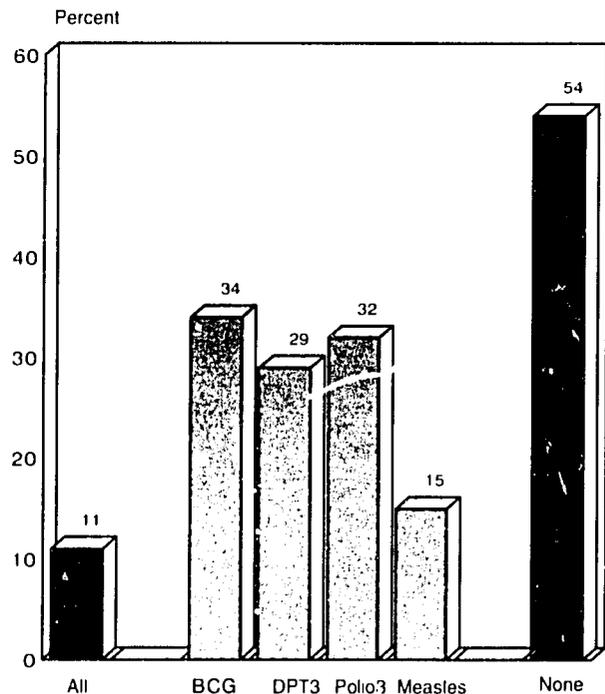
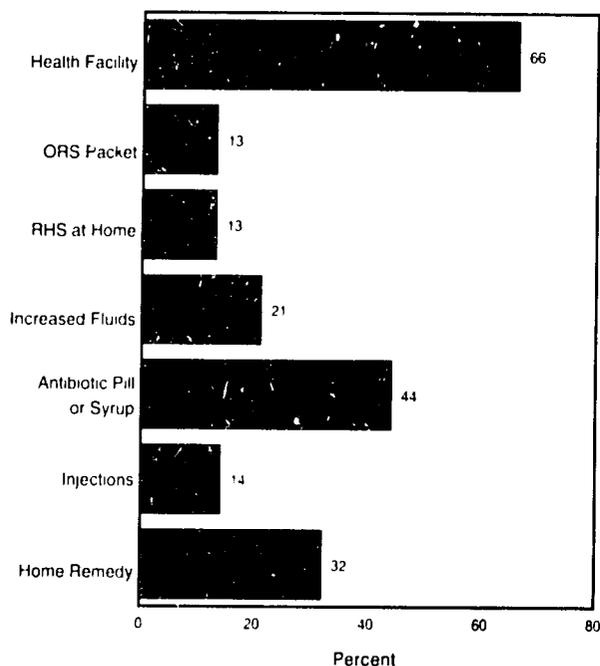


Figure 14
Treatment of Diarrhoea in the Two Weeks
Preceding the Survey (Children Under 4)



taken to a health facility or provider, and 87 percent received some form of treatment.

- Over the same period, more than one-fifth of children suffered from fever, which may be a sign of malaria or other illness. Sixty percent of them were taken to a health facility or provider. Fourteen percent of children had diarrhoea during the two weeks before the survey. Fifty-nine percent of them were taken to a health facility or provider; 12 percent of children were treated with ORS packets and 14 percent received a Recommended Home Solution (sugar, salt and water); and 14 percent received increased fluids. Sixty-eight percent were not given any type of oral rehydration treatment nor increased fluids.
- Knowledge and use of ORS packets are not widespread; 64 percent of mothers are not familiar with ORS packets and 76 percent have never used them.

Knowledge and use of ORS packets are not widespread.

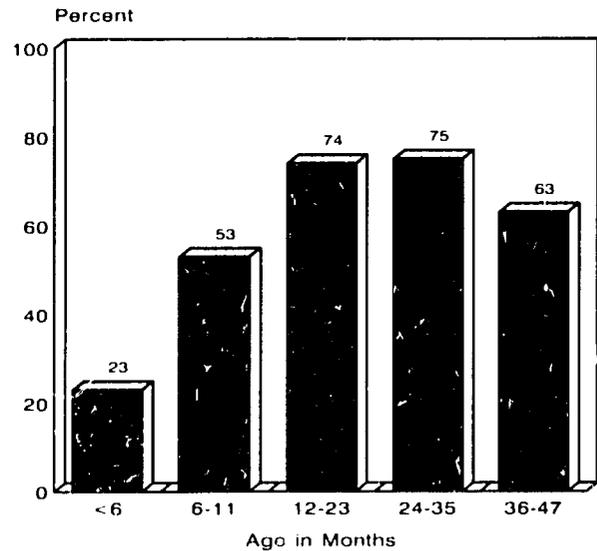
Nutritional Status of Children

- Both chronic and acute undernutrition are very high in Bihar, with more than three-fifths of all children underweight and a similar proportion stunted. The proportion of children who are severely undernourished is especially striking - 31 percent in case of weight-for-age and 40 percent in the case of height-for-age. The most serious nutritional problem measured (wasting) is also quite evident in Bihar, affecting 22 percent of children.

Three-fifths of all children are underweight and three-fifths are stunted.

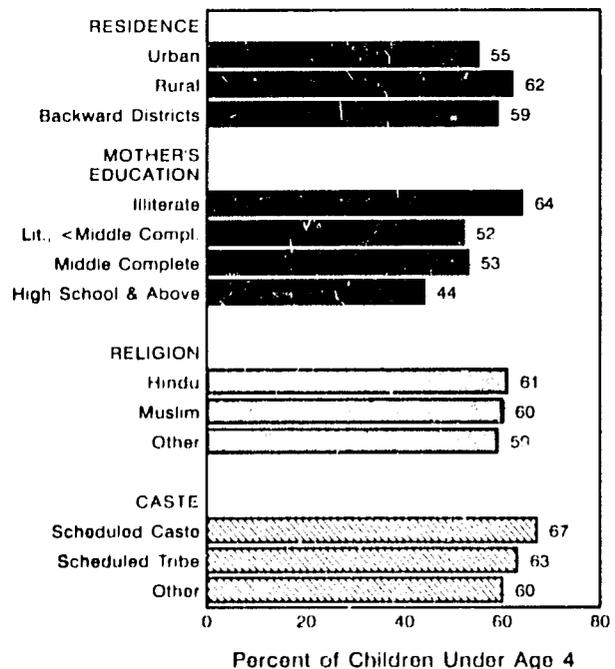
- Interestingly, there is no evidence that female children are nutritionally disadvantaged. In fact, on almost every measure boys are slightly more likely to be undernourished than girls.
- Undernutrition is higher in rural areas than in urban areas for most of the measures, but the differences are modest. The nutritional situation in backward districts is nearly the same as it is for the state as a whole. Not much difference is observed in nutritional status of Hindu and Muslim children. The children of scheduled caste mothers are slightly more undernourished than other children.
- The variability by educational level is in striking contrast to the muted differences observed for the other background characteristics, although here as elsewhere it must be noted that the vast majority of children (79 percent) have illiterate mothers. For most of the indices, undernutrition declines steadily with the increasing educational attainment of the mother.

Figure 15
Percentage of Children Under Age Four Who Are Underweight, by Age



Note: Percentage of children more than 2 standard deviations below the median of the International Reference Population

Figure 16
Chronic Undernutrition (Stunting) by Selected Characteristics



CONCLUSIONS

Fertility and Family Planning

- Although there is evidence of a slight decline in the total fertility rate in Bihar in recent years, the TFR remains high at 4 children per woman. Thus Bihar is still far from the achievement of replacement level fertility (2.1 children per woman). Only 23 percent of currently married women are using a contraceptive. If all women who say they want to space or limit their births were to use family planning the contraceptive prevalence rate could increase from 23 percent to 48 percent of married women. A sizeable percentage of women who intend to use contraception in the future prefer to use modern spacing methods. This indicates that the potential demand for modern spacing methods is quite strong and suggests that increasing attention should be paid to effective spacing methods as part of a balanced programme to satisfy the contraceptive needs of women in Bihar.
- Two-thirds of currently married nonusers say they do not intend to use contraception in the future. The lack of intentions to use family planning is a matter of great concern and suggests that it will be difficult for the family planning programme to be successful without a strong Information, Education and Communication (IEC) component to motivate couples to use contraception. The ideal family size is 3.4 children which is larger by 1.4 children than the two-child family advocated by the Family Welfare Programme. To bring about a change in the popular norms about family size, a strong and well directed IEC is needed. The accessibility and quality of services need to be improved to attract new

contraceptors as well as to encourage continued use among current contraceptive acceptors.

Maternal and Child Health

- Various indicators of maternal and child health show that in almost every respect Bihar is not faring well. Despite the decline in infant mortality (18 percent over a 10-year period) in every 8 children still die before reaching age 5. Most babies (87 percent) are delivered at home and a sizeable proportion of deliveries are conducted by untrained personnel. A very small percentage of children age 12-23 months are fully vaccinated and 54 percent have not received any vaccination. Over three-fifths of all young children are underweight and over three-fifths are stunted.
- The improvement of services is crucial to the success of the Child Survival and Safe Motherhood (CSSM) programme. The importance of a strong IEC package in the CSSM programme cannot be overemphasized. Such a package is necessary to inform couples about the importance of antenatal care and safe delivery conducted under hygienic conditions, the advantages of giving colostrum to babies, the correct timing of introducing supplementary food to a child's diet, the importance of immunization against preventable diseases, the use of oral rehydration therapy for children suffering from diarrhoea, the advantages of a small family and the disadvantages of early childbearing and inadequate childspacing. The lack of exposure of most women to electronic mass media and their inability to read, however, indicate that alternative communication strategies will have to be employed, such as distribution of video

cassettes with culturally appropriate programmes that can be shown on community television sets.

Status of Women

- Although there has been some progress in education in recent years, the literacy rate and educational attainment of women age 13-49 is still low, with more than three-quarters of them illiterate. The education of women can play a major role in shaping the attitudes and behaviour of women. Educational attainment is strongly associated with every important variable considered in the NFHS, including age at marriage, fertility behaviour, current use of family planning, demand for family planning, ideal number of children, wanted fertility rate, utilization of antenatal care services, receipt of tetanus toxoid injections and iron and folic acid tablets, delivery in a health facility, delivery by trained attendants, vaccination of children against six serious but preventable diseases, knowledge and ever use of ORS packets, infant and child mortality and the nutritional status of children. The status of women in Bihar is quite low and there is ample evidence of discrimination against women in several respects such as lower female literacy, lower school attendance rate for girls age 6-14, sex ratio unfavourable to women, low level of female employment, relatively low age at marriage, higher female child mortality rates, and lower vaccination rates for female children. Thus programmes to elevate the status of women in Bihar are needed. In particular, increasing the school enrollment and educational levels of girls and young women is important for reducing fertility, increasing family planning use and improving maternal and child health. The spread of education is, however, a slow process and there is clearly the need for a

well-managed, rigorous family welfare programme.

Achievement of Programme Objectives

- Major national objectives of the CSSM programme adopted in the Eighth Five Year Plan (1992-97) are to achieve an infant mortality rate of 50 per 1,000 live births (the infant mortality rate in Bihar during 1988-92 was 89 per 1,000 live births); an under-five mortality rate of 70 (under-five mortality in Bihar during 1988-92 was 128); a crude death rate of 9 per 1,000 population (the crude death rate during 1991-92 in Bihar was 11.5); and a crude birth rate of 26 per 1,000 population (the crude birth rate for Bihar during 1990-92 was 32.3). The national targets for service coverage include 100 percent coverage of antenatal care (women in Bihar received antenatal care for only 37 percent of births during 1989-92); 100 percent deliveries by trained birth attendants (only 19 percent of deliveries were attended by a doctor or a nurse/midwife during 1989-92); and a couple protection rate of 75 percent among couples in the reproductive ages (in Bihar it was only 25 percent during 1992).
- Although all of these comparisons indicate great challenges ahead for Bihar, some progress has been made toward lowering fertility and mortality rates. With its population of 86.4 million in 1991, Bihar accounts for 10 percent of the total population of India and exercises great influence on the demographic parameters of the country. If the national population growth goal of replacement fertility is to be achieved even by 2011-2016, it is necessary to increase efforts to manage the demographic situation of Bihar.

FACT SHEET-BIHAR

1991 Population Data Office of the Registrar General and Census Commissioner

Total population (millions).....	86.4
Percent urban	13.1
Percent scheduled caste	14.6
Percent scheduled tribe	7.7
Decadal population growth rate (1981-91)	23.5
Crude birth rate (per 1,000 population)	32.2
Crude death rate (per 1,000 population)	10.9
Life expectancy at birth (years) ¹ :	
Male	55.7
Female	53.6

National Family Health Survey, 1993

Sample Population

Ever-married women age 13-49	5,949
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Background Characteristics of Women Interviewed

Percent urban	14.6
Percent illiterate	78.3
Percent attended high school or higher	8.1
Percent Hindu	82.6
Percent Muslim	15.6
Percent working	24.9

Marriage and Other Fertility Determinants

Percent of women age 15-49 currently married	82.9
Percent of women age 15-49 ever married	86.7
Singulate mean age at marriage for females (in years)	18.0
Singulate mean age at marriage for males (in years)	23.2
Percent of women married to first cousins ²	4.4
Median age at marriage among women age 25-49	14.7
Median months of breastfeeding ³	26.5
Median months of postpartum amenorrhoea ⁴	9.9
Median months of postpartum abstinence ⁵	2.9

Fertility

Total fertility rate ¹	4.0
Mean number of children ever born to women age 40-49 ..	5.2

Desire for Children

Percent of current ¹ married women who:	
Want no more children or are sterilized	42.7
Want to delay their next birth at least 2 years	24.0
Mean ideal number of children ⁵	3.4
Percent of births in the last 4 years which were:	
Unwanted	9.3
Mistimed	14.2

Knowledge and Use of Family Planning

Percent of currently married women:	
Knowing any method	94.9
Knowing a modern method	94.9
Knowing a source for a modern method	88.5
Ever used any method	26.2
Currently using any method	23.1

Percent of currently married women currently using:

Pill	1.1
IUD	0.5
Injection	0.0
Condom	1.3
Female sterilization	17.3
Male sterilization	1.3
Periodic abstinence	0.9
Withdrawal	0.5
Other methods	0.1

Mortality and Health

Infant mortality rate ⁶	89.2
Under-five mortality rate ⁶	127.5
Percent of births ⁷ whose mothers:	
Received antenatal care from a doctor	
or other health professional	26.5
Received 2 or more tetanus toxoid injections	30.7
Percent of births ⁷ whose mothers were assisted at delivery by:	
Doctor	12.7
Nurse/midwife	6.2
Traditional birth attendant	58.4
Percent of children 0-1 month who are breastfed	97.7
Percent of children 12-13 months who are breastfed	91.2
Percent of children 12-23 months who received ⁸ :	
BCG	33.9
DPT (three doses)	29.1
Polio (three doses)	31.6
Measles	14.6
All vaccinations	10.7
Percent of children under 4 years ⁹ who:	
Had diarrhoea in the 2 weeks preceding the survey	13.7
Had a cough accompanied by rapid breathing	
in the 2 weeks preceding the survey	4.3
Had a fever in the 2 weeks preceding the survey	21.1
Are chronically undernourished (stunted) ¹⁰	60.9
Are acutely undernourished (wasted) ¹⁰	21.8

¹ 1986-90

² Based on ever-married women

³ Current status estimate based on births during the 36 months preceding the survey (48 months for breastfeeding)

⁴ Based on births to women age 15-49 during the 3 years preceding the survey

⁵ Based on ever-married women age 13-49, excluding women giving non-numeric responses

⁶ For the 5 years preceding the survey (1988-92)

⁷ For births in the period 1-47 months preceding the survey

⁸ Based on information from vaccination cards and mothers' reports

⁹ Children born 1-47 months preceding the survey

¹⁰ Stunting assessed by height-for-age, wasting assessed by weight-for-height; undernourished children are those more than 2 standard deviations below the median of the international reference population, recommended by the World Health Organization.