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**MATERNAL-CHILD HEALTH AND FAMILY PLANNING SURVEY
HONDURAS, 1984**

Final Report

Honduran Ministry of Public Health

Association for Family Planning in Honduras
(ASHONPLAFA)

With Technical Assistance from

Family Health International

Management Sciences for Health

December, 1986

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Acknowledgements

Financial support for this study was provided by the Office of Population, United States Agency for International Development under Cooperative Agreement AID/DPE-0537-A-00-4047-00 through Family Health International. Additional financial support was provided by Management Sciences for Health/Honduras and U.S.A.I.D/Honduras.

The authors wish to thank Drs. Jeremiah Sullivan, Jorge del Pinal and Shea Rutstein, who at the time worked with the Demographic Data for Development Project of Westinghouse Health Systems, for their analysis and reporting of infant mortality (included in Chapter II of this report). We would also like to express our appreciation to Dr. Bruce Newman and the Guatemalan staff of Klapp and Mayne who were responsible for the data processing and editing.

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SUMMARY

In 1984, a Maternal and Child Health/Family Planning Survey was carried out in Honduras. The survey was coordinated by the Unit of Science and Technology of the Ministry of Public Health under the supervision of the Division of Operations Research at Management Sciences for Health with support from ASHONPLAFA. Technical and financial assistance were provided by Family Health International.

The survey was a multistage area probability survey. A total of 5771 households were contacted in 275 sample sectors. There were 5454 women aged 15-44 eligible for interview and of these, 88% were interviewed.

Among the most important findings of the survey are the following:

(1) The total fertility rate declined over the period 1982-84 from 5.53 to 5.33. A larger estimated decline in the total fertility rate occurred earlier. The rate from the Contraceptive Prevalence Survey of 1981 was almost one birth higher than the rate from the 1983 survey conducted by the Latin American Center for Demography (CELADE) and more than one birth higher than the rate for the 1984 survey. Since 1981 the total fertility rate decreased by 0.19 births in urban areas and by 1.43 births in rural areas. The total fertility rate was 3.39 in Tegucigalpa/San Pedro Sula, 4.82 for other urban areas and 6.86 in rural areas.

(2) Estimates of the infant mortality rate using indirect techniques suggest that the rate was 71 per 1000 live births in 1981 and is in line with declining infant mortality during the 1970's. The estimate for Tegucigalpa/San Pedro Sula was 43, for the other urban areas 62, and for

rural areas 82. Estimates from the 1983 survey indicate a somewhat higher rate of infant mortality (85).

(3) Eighty-three percent of women reported that they received prenatal care during their last pregnancy; almost two-thirds received institutional care and 46% received care from a traditional birth attendant. Although residence did not affect the proportion who received care, it did influence the source; institutional care was most common in Tegucigalpa/San Pedro Sula and least common in rural areas while care by TBAs was least common in Tegucigalpa/San Pedro Sula and most common in rural areas. Only one-third of women received a tetanus immunization during their last pregnancy and only 22% received two doses.

Fifty-five percent of births took place at home. Home births accounted for 11% of all deliveries in Tegucigalpa/San Pedro Sula, 37% in other urban areas and 78% in rural areas. Eleven percent of institutional deliveries were cesarean sections.

Only 28% of women had a postpartum check-up but 84% of mothers took their baby for a check-up.

(4) The mean duration of breastfeeding was 16.2 months; 19.0 months in rural areas and 11.7 months in urban areas. It increased by one month since the 1981 survey. The largest increases occurred in urban areas and among women with the most education. Supplementation occurred early. Only 44% of babies two months or less were fully breastfed.

(5) Among children less than five years of age, the percent that had adequate immunization coverage was 82% for both polio and measles, 69% for tuberculosis and 67% for DPT. Coverage increased dramatically since the 1981 survey with the biggest increase for polio. In 1981, there was a noticeable difference between immunization coverage in the rural and urban areas; the difference had disappeared by 1984.

(6) Twenty percent of the children less than age five were reported to have had diarrhea on the day of the survey or during the previous two days. The rate was highest in rural areas (21%) and lowest in Tegucigalpa/San Pedro Sula (16%). Seventy-four percent of children with diarrhea received some treatment. Six percent received oral rehydration therapy (ORT) only, the recommended treatment, although an additional 11% received ORT in combination with other medications.

(7) The percent of women in union in the age group 15-44 that were contracepting was 35%. The two most prevalent methods were oral contraceptives and female sterilization. Contraceptive use was highest in Tegucigalpa/San Pedro Sula and lowest in rural areas. Oral contraceptives were the most prevalent method in urban areas and female sterilization in rural areas. Over the period 1981-84, the percentage of women who were contracepting increased from 27% to 35%. About half of this increase was accounted for by the increase in the prevalence of female sterilization. Contraceptive use increased by 8 percentage points in rural areas but only by 3.5 percentage points in urban areas.

ASHONPLAFA was the source of just over half the oral contraceptives used. The commercial sector provided 26% and the Ministry of Health 19%.

Sterilization was provided at Ministry of Health and private hospitals through agreements with ASHONPLAFA. These accounted for over 70% of sterilizations.

Using standard definitions described in the report, of women in union 15-44, 13.5% were in need of contraception; 4.6% had an unmet need for spacing and 8.9% had an unmet need for limiting.

Almost half of ever users of oral contraceptives said that they experienced problems with the method. Women who experienced problems were less likely to be currently using contraception (46%) than were women who did not experience problems (70%).

Of women who had been sterilized, 41% were sterilized at the time they were hospitalized for their last delivery; of these women, 56% had vaginal and 44% had cesarean deliveries. About 90% of sterilized women said that they were satisfied with the sterilization and almost 60% had recommended the method to others.

INTRODUCTION

A. Background and Objectives of the 1984 MCH/FP Survey

In 1981, a Contraceptive Prevalence Survey (ENPA 1981) was carried out by the Honduran Association for Family Planning (ASHONPLAFA), the Bureau of Census and Statistics, the Superior Council for Economic Planning (CONSUPLANE) and the Ministry of Public Health (MOH). Westinghouse Health Systems provided technical assistance. Like other contraceptive prevalence surveys, it was designed to collect data that would be used by family planning program administrators and development planners.

In 1983 the Latin American Center for Demography (CELADE) carried out a demographic survey (EDENH-II) to estimate fertility rates and infant, child and adult mortality rates. The survey also provided data on internal and international migration.

The Maternal and Child Health/Family Planning Survey, 1984 (MCH/FP 1984) was broader in scope than either of the two earlier surveys. In addition to data on family planning, fertility and infant mortality, it also obtained information on maternal and child health.

Results of the three surveys can be used to evaluate ongoing maternal and child health and family planning programs of the Ministry of Public Health, the Honduran Social Security Institute, and ASHONPLAFA: to design new programs, to restructure ongoing programs, and to serve as baseline data to evaluate new initiatives.

Between 1981 and 1984 many health programs were initiated or expanded. Several examples follow. The polio epidemic of 1984 stimulated massive immunization campaigns. The large number of infants dying of dehydration led to diarrhea control programs and the promotion of oral rehydration therapy. Campaigns to encourage breastfeeding have been initiated to reduce the incidence of diarrhea and to improve the nutritional status of infants. Family planning efforts have also been stepped up. These include expansion of facilities and training of physicians in sterilization, expansion of the Community Based Distribution of Contraceptives Program, the introduction of a social marketing program for contraceptives, and new family planning clinics operated by the Honduran Institute of Social Security.

The general objectives of the survey included the design, implementation, analysis and reporting of the data to accomplish the following:

1. Estimate current levels of fertility.
2. Estimate the infant mortality rate.
3. Determine the prevalence, pattern and mean duration of breast-feeding.
4. Determine the prevalence and severity of diarrhea among children under age five, the percentage that received treatment, and the type of treatment received.
5. Determine the percentage of children under five that have been immunized against various childhood diseases.
6. Determine the sources of prenatal, delivery and postpartum care and for women delivering at home, the care provided by traditional birth attendants.

7. Determine contraceptive prevalence by method and by source.
8. Determine reasons for terminating the use of family planning and for not using contraception; determine the extent of unmet need for contraception.
9. Determine the percentage of women who have experienced unplanned pregnancies, the pregnancy intentions of all women, ideal family size and the percentage of women who want more children.
10. Determine what advice is given and the impact of this advice on the decision to discontinue pill use among women with problems related to oral contraception.

B. Background Information on Honduras

1. General characteristics

Honduras is located in Central America and borders the Republics of El Salvador, Guatemala and Nicaragua. It has a territorial extension of 112,088 km² with approximately two thirds of forested mountains and one third valleys and plains used for agriculture. In general, it has two well defined seasons: a rainy and a dry season.

2. Population

According to the projections of the 1974 census, the population is estimated to be 4.5 million by 1986. Sixty percent live in rural areas and 40% in the urban zone where noticeable growth in the marginal areas of the cities is taking place. The population is characterized as relatively young, 4.6% are children younger than one year old, 14.5% between the ages

of 1-4, 28.5% between the ages of 5-14 years, 49.2% between the ages of 15-64 years and 2.8% 65 years and older (1).

3. Socioeconomic characteristics and educational level

Agriculture and cattle are the main economic activities while industry is just beginning to develop. The gross national product (Producto Interno Bruto - PIB) for 1984 was 2099 million Lempiras* with a per capita income of L. 466.00. It is estimated that approximately 40% of the population has a per capita income of less than L. 100.00 per year. The educational level in Honduras is low. The illiteracy rate has been estimated at 40 percent among the population older than 10 years of age. A study undertaken in the region of Danli, however, showed that only 13% of the homes had residents who were unable to read and write (2). In 1982 it was estimated that there was a shortage of 450,000 homes, mostly in rural areas (3).

4. Health

Health conditions are affected by a low level of environmental hygiene and malnutrition. In 1966, 76% of the children less than 5 suffered some degree of malnutrition (4). Diarrheal disease, acute respiratory infections, immuno-preventable diseases and malaria continue to be the main causes of child morbidity and mortality. Anemia and problems related to pregnancy are also prevalent among women of reproductive age. There are no reliable data on maternal mortality.

*US \$1.00 = 2 Lempiras

The Honduran Ministry of Public Health has based its policies on the goal of "Health for All by the Year 2000", which was promoted at the 1978 meeting on Primary Health Care at Alma Ata. This goal includes lowering infant mortality to 30 deaths per thousand live births and reducing the mortality rate for children ages 1-4 to 2.4 per thousand by the year 2000. All children younger than 5 should be immunized and health services should be accessible to everyone.

It is estimated that 70% of the population has access to some institutional health service, public or private. However, it is important to emphasize that this accessibility varies among programs and activities. The population also depends on traditional medicine including home remedies based on herbs and rituals (2).

The structure of the health care system is based on two subsystems, one which is institutionally based and a second, based on the community. The institutional system is organized on five levels:

Rural Health Center (Centro de Salud Rural - CESAR).
staffed by nurse auxiliaries;

Health Center with physician (Centro de Salud con Medico - CESAMO),
staffed by medical doctors, professional nurses and nurse
auxiliaries;

Area Hospital (Hospital del Area - HA), provides the four basic
specialties of pediatrics, general medicine, surgery and
obstetrics/gynecology;

Regional Hospital, provides a high degree of specialization, including otorrinolaringology, radiology, and orthopedics;

National Hospital, all specialties available.

The community subsystem has a service network composed of health volunteers who have been specially trained. Volunteers include traditional birth attendants who provide care to the mother and to the newborn at the time of delivery; the health guardian who offers services in primary health care; the health representative who works in basic sanitation activities, and the voluntary collaborator who participates in the malaria control program.

References for Background Information on Honduras

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3. CARE. Multi-Year Plan for Honduras; Fiscal Year 1984-86. Tegucigalpa, D. C., Honduras.
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A. Field work

Coordination and direction

The 1984 MCH/FP survey was coordinated by the Unit of Science and Technology of the Ministry of Public Health (MOH) under the supervision of the Division of Operations Research at Management Sciences for Health (MSH) with support from ASHONPLAFA.

The field work, coding, and questionnaire editing were carried out between May 1, 1984 and the middle of February, 1985. Data were processed and edited in Guatemala by Bruce Newman and staff at Klapp and Mayne. Analysis took place at FHI. Dr. Gustavo Corrales of MSH and Dr. Luis Roberto Escoto of the MOH visited FHI to collaborate in the writing of a final report.

Cartographic preparation

The sampling frame consisted of the listing of census sectors (Primary Sampling Units - PSUs) used in the frame for the EDENH-II. Three-fifths and 2/3 of the urban and rural sectors, respectively, were selected according to the sample criteria discussed in Section B of this chapter.

Once the sample sectors were selected, the maps provided by the Bureau of Census and Statistics were revised to construct segments of 18 households for the urban zone and 23 for the rural zone.

Pre-testing of the questionnaire

A pre-test was carried out with the following objectives:

- a. To determine the willingness of women of reproductive age to provide personal information, especially young single women and those with low levels of education.
- b. To test the questionnaire's design, content and language in urban and rural areas.
- c. To further train the supervisor candidates (the supervisors served as interviewers during the pre-test), to evaluate their performance and to select those who would participate in the survey.
- d. To determine the time required to complete a questionnaire.
- e. To measure the time and resources necessary for the execution of the fieldwork.
- f. To determine categories and codes for open-ended questions and the time required to code a questionnaire.

Siguatepeque, a township in the Department of Comayagua, was chosen as the locale for the pre-test. This township was chosen because of its closeness to the capital of Tegucigalpa (130 kms) and because it contained both a rural and an urban area.

Participating personnel

Two weeks prior to the pre-test, six supervisor candidates were chosen. Selection was based on their curriculum with a minimum of a high school education required, experience with similar surveys, and an aptitude in personnel management. They were given intensive training in the use of the questionnaires and maps and in supervision.

In addition to the supervisor candidates who acted as interviewers, the following participated as observers in the pre-test: a member of Management Sciences for Health, a consultant from Family Health International, a technical representative from ASHONPLAFA and two officials from the MOH Unit of Science and Technology. Four work teams were organized, with the interviewers rotating so that all observers could help in the final selection.

Results

One of the important achievements was the reduction of the interviewers' fear that the public would be unreceptive to "sensitive" or "intimate" questions. The pre-test also helped with the restructuring and editing of the questionnaire. The field work reinforced the supervisors' training. An average of 40 minutes was needed to complete the interviews.

In general, the pre-test was a valuable experience that encouraged the adjustment and improvement of many of the activities that would develop as the national survey progressed.

Interviewer selection and training

In order to select the 16 required interviewers, a total of 20 candidates were initially chosen. Selection was based on curriculum, personal interview, education and an aptitude for field work. Interviewers were all females and were required to have a high school education and be under 30. The group attended a 10-day training period that included discussion on contraceptive methods, immunization, diarrhea, etc. The training included role play and actual interviews in homes. Interviews were observed by staff from the MOH and ASHONPLAFA.

Data collection

Four teams were organized, each composed of a supervisor, four interviewers and a driver. MOH and ASHONPLAFA provided a vehicle with a driver. The other vehicles were rented with funds from the survey budget.

The data collection began September 15 and was completed in mid-December, 1984. Interviewing began in the Central District (urban) and eventually covered the remainder of the nation.

This study was carried out in the following zones:

Central District (Capital Tegucigalpa).

Departaments of Comayagua, La Paz, Intibuca, Lempira, Ocotepeque and Copan.

Departament of Cortes (part), Yoro, Atlantida and Colon.

Departaments of Santa Barbara and Cortes (part)

Departments of Olancho, Francisco Morazan, El Paraiso, Valle and Choluteca.

Editing and coding of the questionnaires

The questionnaires were reviewed by supervisors in the field and at the survey headquarters by personnel from the Unit of Science and Technology and MSH. Once the data collection was finalized, the four supervisors and four interviewers were contracted from January to mid-March, 1985 to code the questionnaires.

B. Sampling design

This was a multistage area probability survey. The selection of the sample was done in two stages: selection of the census sectors and selection of the households within the sectors. The sampling frame for the survey was based on the 1974 census of Honduras, which was updated by Westinghouse Health Systems for the 1981 Contraceptive Prevalence Survey (ENPA 1981) and by CEIAD E for the 1983 Honduran National Demographic Survey (EDENH-II).

The 1981 survey included six strata: urban Tegucigalpa, urban San Pedro Sula, other urban, rural San Pedro Sula, rural Tegucigalpa and other rural areas. Two departments were excluded from the sample, the Bay Islands and Gracias a Dios, due to difficult access and a small and scattered population. The sample had approximately 5000 households in 256 urban and 159 rural census sectors. Within Tegucigalpa, census sectors were classified according to socioeconomic status -high, medium, low and

marginal - by the census workers. A stratified sample was selected in Tegucigalpa to assure representation from each of these groups.

In 1983 CELADE undertook a demographic survey using the 1974 Census sampling frame as its primary source, taking advantage of the updated maps for the ENPA 1981 and the Encuesta sobre Fuerza de Trabajo (EFT) conducted in Tegucigalpa and San Pedro Sula in 1982. Several modifications were made. First, the sample size was increased to 12,000 households and unlike the ENPA 1981, it was self-weighting. Second, because the urban areas had increased more in population than the rural areas between 1974 and 1983, a larger proportion of urban sectors was included. Using the projections of population to June 1983 by areas (based on growth rates for the period 1961 - 1974), the proportion of population in urban areas was estimated at 0.418. The number of urban and rural sectors chosen was based on this proportion, yielding 280 urban sectors, 12 rural sectors within Tegucigalpa and San Pedro Sula, and 145 other rural sectors (Table I 1). Clusters of 18 households in urban areas and 46 in rural areas were selected within the sectors. The rural areas of Tegucigalpa and San Pedro Sula, however, had 18 households per sector. Fifteen of the additional sectors (in addition to those from the sampling frame of the ENPA 1981) were in Tegucigalpa. To make the selections according to socioeconomic strata, CELADE used the results of the EFT carried out in 134 census sectors. The EFT also used the criteria of high, medium, low and marginal to classify sectors.

The 1984 survey used the updated sampling frame provided by CELADE. To minimize both travel costs and design error for this survey, after consulting with the sampling statistician for the CELADE survey, Miguel

Gomez, it was decided to split the urban and rural sample--to select 3/5 of the urban CELADE sectors and 2/3 of the rural CELADE sectors. Also, instead of visiting 46 households per rural sector, only 23 would be visited. The results of this process gave a total of 93 sectors in Tegucigalpa and San Pedro Sula, 76 sectors in other urban and 106 rural sectors (Table I 1).

Within each sector, "compact segments" or clusters of 18 households in urban areas and 23 households in rural areas were identified on the maps. There were generally 4 or more such segments in each sector. We expected to contact 3042 households in urban areas and 2,398 households in rural areas for a total of 5440 households. Because estimates were desired for some of the variables in each of the two urban strata, a larger sample size was selected in the urban area than in the rural areas.

When both census and CELADE maps were available, it was possible to identify the clusters included in the CELADE sample. In such cases, clusters not included in the CELADE sample were randomly selected for inclusion in the 1984 survey. In some cases, however, only the census maps were available and some clusters had to be randomly selected from all possible clusters. Consequently, interviews were conducted in some of the same clusters included in the CELADE sample. Inspection of the maps for Tegucigalpa showed that 11% of the sectors chosen for the 1984 survey were also included in the CELADE sample. If each census map consisted of four clusters, 11% is significantly lower than the 25% one would expect based on chance.

C. Weighting

The selection probabilities were not equal in the four strata. For analysis purposes, the Tegucigalpa and San Pedro Sula rural sectors were combined with the other rural sectors (in Table I 1 the CELADE urban sectors for Tegucigalpa, and San Pedro Sula have been combined as have the rural sectors). Urban Tegucigalpa and urban San Pedro Sula were oversampled and constituted 31% of the total sample, whereas they represent approximately 23% of the population according to the CELADE sampling frame. Other urban areas constitute 25% of the sample but only 19% of the population. Rural areas make up 44% of the sample with 58% of the population. Thus, to make estimates of the proportions and means included in this report, weighting factors have been applied to account for these unequal probabilities. The weights (Table I 1) for the current study are calculated as follows:

$$\text{weight} = \frac{1}{\frac{\text{fraction of selected CELADE sectors}}{\text{fraction of CELADE households selected}} \times 0.456}$$

These weights are multiplied by 0.456 which is the percentage of sectors selected from the CELADE sampling frame for the 1984 survey. Multiplying by 0.456 simply gives a weighted sample size equivalent to the original. In the tables that follow, percentages are based on the weighted number of observations (cases), and the real number of cases (unweighted) are shown in parentheses.

D. Households and eligible women

As shown in Table I 2, 5771 households were contacted in the 275 sample sectors, which is 6.1% more than the 5440 households we had calculated would be included in the sample. Thus, the average number of households in the rural areas was greater than 23 and in the urban areas, greater than 18. Of the 5771 households, interviews were conducted with a resident in 84% of these households (Table I 2). This percentage varied little with residence.

In all households in which a resident was interviewed, information was obtained on source of water, waste disposal, and whether or not the house had electricity (Table I 3). It was found that water was available in 25% of the households, with the highest percentage in Tegucigalpa/San Pedro Sula (Teg/SPS) (52%) and the lowest in rural areas (9%). In rural areas, more than 50% of the households obtained their water either from a well, river, lake or creek.

Indoor toilets were available in 31% of the households, with a much higher percentage in the country's two largest cities (80%) as compared with smaller urban areas (45%) and especially with rural areas (6%). Over half of the households in rural areas (56%) reported not having waste disposal facilities either inside or outside the house. Electricity was reported to be available in 44% of the households, with almost full coverage in Teg/SPS (95%). Only 13% of the households in rural areas had electricity. These data can be compared with those obtained from EDENH-II 1983 (Table I 4). Reported differences in source of water, waste disposal, and electricity availability were small.

Eligible women (defined as women aged 15-44) were identified in 65% of the households visited (Table I 5). The percentage of households with an eligible woman was 70% in Teg/SPS, 66% in other urban areas and 63% in rural areas. The percentage of households with at least two eligible women was highest in Teg/SPS and lowest in rural areas. Consequently the number of women eligible for interview was highest in Teg/SPS and lowest in rural areas. In total, there were 5454 women eligible for interview in 5771 households (Table I 6). In urban areas, there was an average of more than one eligible woman per household, but in rural areas only 0.8 women per household (Tables I 5 and I 6).

Of the 5454 women eligible for interview, 88% were interviewed with little variation in the percentage by residence. Approximately 10% of the women could not be reached after three attempts, 0.6% refused to be interviewed, and 1% were not interviewed for other reasons.

E. "Data" comparisons with other surveys

There are two previous surveys with which to compare the results of the 1984 survey--ENPA 1981 and EDENH-II 1983. Comparisons of the results of these three surveys can be used to: (1) help evaluate the reliability of the survey data on residence, marital status, age at first union and education, and (2) detect recent changes in these distributions.

Table I 7 compares the 1984 survey results in relation to the distribution of women aged 15-44 by residence with the 1981 and 1983 surveys. The results of the 1984 survey closely coincide with those of the two earlier

surveys. This similarity supports the representativeness of the 1984 survey.

Table I 8 compares the distribution of women according to level of education and by residence in the 1983 and 1984 surveys. The distributions are very similar showing a much higher percentage of women having completed seven or more years of education in urban areas as compared with rural areas.

The proportion of women currently in union is shown in Table I 9; these proportions are fairly similar among the three surveys. As shown in Table I 10, the mean age at first union was slightly higher in 1984 than in 1981. Some of the difference may be due to sampling variation since there should be no change for older women.

CHAPTER II. DEMOGRAPHIC ANALYSIS

One of the most important purposes of the 1984 MCH/FP survey was to obtain information on fertility. This chapter presents data on cumulative and current fertility. In addition, indirect estimates of infant mortality based on a comparison of children ever born and living children are included.

A. Cumulative fertility

Table II 1 presents information on the mean number of children ever born to women aged 15-44 from the 1981, 1983 and 1984 surveys. The average number of children ever born increased with age. For 1984, women 40-44 had an average of 6.6 children ever born.

Comparing the age standardized rates, the mean number of children ever born fell between 1981 and 1983 and then increased. Within any five-year age group, cumulative fertility was higher in 1981 than in 1983 or 1984 but there was no clear pattern between 1983 and 1984. The changes in cumulative fertility were largest for women 35 or older. While cumulative fertility was about the same in urban areas over the period 1981-1984, it was lower in rural areas in 1984 than in 1981 with the differences occurring in the age group 30 and over (Table II 2).

B. Current fertility

In an attempt to improve the accuracy of the data collected to estimate fertility, a new approach of obtaining information on recent births was

Incorporated into the questionnaire. Rather than asking only about the date of the most recent live birth, as was the case in the ENPA 1981 and EDENH-II 1983, information on the last two live births was collected. An additional probe about pregnancies since the last live birth was introduced to elicit information on recent births of infants who may have died at very early ages and possibly be unreported. Because of the extensiveness of information collected in the 1984 survey, it is possible to estimate fertility for periods longer than one year prior to the survey.

The TFR (total fertility rate or the number of births that a woman would have throughout her reproductive life if she experienced current rates of childbearing) is shown in Table II 3, based both on the 12 and 24 months preceding interview for the 1984 survey and for the 12 months preceding interview for the 1981 and 1983 surveys. A 24-month rate cannot be calculated from either of these earlier two surveys because information only on the date of the most recent live birth was obtained. The 12-month rate for the 1984 survey refers to the period between October 1983 and October 1984, while the 24-month rate refers to the period October 1982 to October 1984. The rate for the 1983 survey refers to the period October 1982 to October 1983, and the rate for the 1981 survey to the period May 1980 to May 1981.

While the total fertility rate from the 1984 survey was estimated to be 5.48 for the period October 1982 - October 1984, it was 5.33 for the period October 1983 - October 1984. The rate for the 1983 survey was slightly higher than the 24-month rate estimated from the 1984 survey and 0.20 births higher than the 12-month rate for the 1984 survey. The data from both these surveys point to recent declines in fertility.

A larger estimated decline in the total fertility rate occurred earlier (Table II 4). The rate from the 1981 survey was almost one birth higher than the rate for the 1983 survey and more than one birth higher than the 12-month rate for the 1984 survey. The total fertility rate in urban areas (1981 to 1984) decreased by 0.19 births while the rate in rural areas decreased by 1.43 births. The decline in rural areas occurred in all age groups except for the age group 15-19 for which fertility did not change.

Age-specific fertility rates and the total fertility are shown in Table II 5 for the three residence groups: Teg/SPS, other urban areas and rural areas. Rates are based on the 24 months preceeding the survey. The total fertility rate ranges from 3.39 in the country's two largest cities - Tegucigalpa/San Pedro Sula - to 6.86 in rural areas. The rate for urban areas exclusive of Teg/SPS was 4.82. For all age groups, the rates follow the expected pattern, lowest in Teg/SPS and highest in rural areas.

Other measures of fertility are presented in Table II 6. The general fertility rate (the number of live births per 1000 women 15-44) was 192 for the country as a whole, 144 in urban areas and 239 in rural areas.

The estimated crude birth rate (the number of live births per 1000 inhabitants) was 37 at the national level, 34 in urban areas and 39 in rural areas. The survey was not designed to obtain information on the crude birth rate as it did not obtain data on all births in the household. To estimate the number of births to women not interviewed, the age-specific fertility rates of women interviewed were applied. To the extent that

uninterviewed women have lower or higher fertility rates, these rates will over- or underestimate fertility.

Differences in the crude birth rate by residence are much smaller than the differences in either of the other fertility measures since, on the average, the number of residents per household not of childbearing age was higher in rural areas than in urban areas. The total fertility rate does not depend on the age distribution of the population and the general fertility rate depends only on the age distribution of women in the childbearing years; the crude birth rate, however, depends on the age distribution of the entire population. Since the proportion of the population in the non-childbearing years was higher in rural areas than in urban areas, differences in crude birth rates by residence were smaller than were differences in either the total fertility or the general fertility rate.

C. Infant Mortality

This survey collected data from the interviewed women on the number of children ever born (CEB) and the number of children surviving (CS) as of the interview date. These CEB-CS data reflect the lifetime experience of these women with infant and childhood mortality, and can be used for indirect infant mortality estimation. This section presents: a) the model for indirect IMR estimation, b) national-level IMR estimates, c) urban/rural IMR estimates, and d) IMR estimates from other recent surveys.

1. Model for the indirect IMR estimation

The analysis of CEB-CS data involves classifying women into five-year age groups and calculating the proportion dead of CEB to the women of each age group. The series of age-specific proportion dead statistics are then transformed into IMR estimates using an estimation model developed by James Trussell (1).

Two features of the Trussell model must be understood to interpret the IMR estimates which are produced. First, the model has four variants, denoted as the North, South, East and West variants. Each variant is based on a different assumption concerning the age pattern of infant and childhood mortality, and each variant produces marginally different estimates. In the case of Honduras, the age pattern of mortality is not known with certainty, so IMR estimates were initially made for all four variants of the model and the most probable estimate was selected. Second, the IMR estimates derived from the proportion dead statistics of each age group of women apply to somewhat different time periods: the estimates based on the data from older age groups of women pertain to earlier time periods than the estimates based on data from younger age groups. In presenting the results, the time period to which an estimate applies is indicated.

2. National-level IMR estimates

Data on children ever born and surviving children, appropriately weighted to yield national-level data, are presented in Table II 7. The statistics on the proportion dead of children ever born increase with increasing age of the women, from 0.073 (women aged 15-19) to 0.151 (women aged 40-44).

This trend is due to the fact that children born to older women were, on average, born longer ago and have been exposed to mortality for longer periods of time than the children born to younger women. It is the proportion dead statistic shown on Table II 7 which is transformed into IMR estimates by the Trussell indirect estimation model.

Indirect IMR estimates and the time period to which they apply are presented in Table II 8. Estimates are presented for the four regional variants of the Trussell model. The different estimates for a particular age group of women are fairly tightly clustered (e.g., for women aged 20-24, the estimates vary from 64 to 72 per 1000 live births). In the absence of definite knowledge about the age pattern of mortality in Honduras, it is safest to assume that either the South or the West pattern prevails because the estimates from these variants have intermediate values between the highest estimates from the East variant and the lowest estimates from the North variant. Henceforth, estimates from the South variant will be cited in this report. The South variant estimates are selected in preference to those of the West variant because there is evidence that mortality conditions in Honduras are consistent with some characteristics of the South mortality pattern (2).

The IMR estimates from the South variant and the time period to which they apply are as follows:

<u>IMR Estimates</u>	<u>Year</u>
71	1981
75	1979
76	1977
91	1975

The estimates form a plausible declining time trend of mortality during the later half of the decade of the 1970s. The level of the estimate for 1981 (71 per 1000) is quite plausible and consistent with existing knowledge about infant mortality in Honduras.

3. Urban/rural IMR estimates

IMR estimates are presented below for Tegucigalpa/San Pedro Sula, other urban areas and rural areas (Table II 9). The estimates are per 1000 live births.

Consider first the estimates for each area based on the data reported by women aged 20-24 and 25-29 (the estimates which apply to 1981 and 1979, respectively). The estimates are 43 and 42 for Teg/SPS; 62 and 71 for other urban areas, and 82 and 85 for rural areas. This pattern of relatively low rates in the most urbanized areas and higher rates in more rural areas is consistent with findings in most developing countries. It reflects the effects of better socioeconomic conditions, greater availability and access to health services and lower fertility rates (i.e., less sibling competition for limited family resources) in urban than in rural areas.

Consider next the time series of estimates for each population subgroup. For this purpose, the percentage decline between the mean of the estimates for 1975 and 1977 and the mean of the estimates for 1979 and 1981 was calculated (Table II 9). This statistic indicates a substantial decline in Teg/SPS (40%), a smaller decline in other urban areas (22%) and relatively

little decline in rural areas (3%). This pattern indicates that the recent mortality decline has occurred throughout the country; nevertheless, the degree of decline was uneven, with urban areas experiencing much larger declines than rural areas.

4. Comparison of recent IMR estimates

There have been a number of national-level IMR estimates for Honduras. A series of six recent estimates and the time periods to which they apply are presented in Table II 10. One of these estimates is based on reference period data on the number of births and infant deaths and is a direct estimate. The remaining five estimates are based on retrospective CEB-CS data and are indirect estimates. All of the indirect estimates, including the estimate cited from the 1984 MCH/FP Survey, are derived from the South variant of the model.

Overall, the series of estimates for the 13 year period between 1967-68 and 1981 displays a persistent and substantial declining trend. The estimates indicate that around 1970, the level of the IMR was on the order of 112 to 127 per 1000 live births and 71 to 85 per 1000 around 1980. Therefore, during the decade of the 1970s, infant mortality declined by about 34%.

While the various IMR estimates are, in general, consistent and provide persuasive evidence of a declining mortality trend, the estimates leave some ambiguity about the level of mortality around 1980. The estimate from EDENH-II is 85 per 1000 (1978-80), while the estimate from the 1984 MCH/FP is 71 per 1000 (1981). Given the uncertainties associated with indirect estimation, it is prudent under these circumstances, to consider that the

level of infant mortality was between 71 and 85 per 1000 in the early 1980s.

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CHAPTER III. MATERNAL and CHILD HEALTH

A. Prenatal, delivery and postpartum care

1. Introduction

This chapter contains information on care provided during the prenatal period, at delivery and postpartum. The information is needed for the evaluation of maternal and child services.

Child health covers a wide range of topics including growth and development, immunizations, nutrition, and common illnesses, only some of which are covered in this survey. Information on mother's health is limited to care provided during pregnancy, at delivery and postpartum.

In 1974, the Ministry of Health (MOH) stated that the Maternal and Child Health Program was a high priority. Its objectives for improving the health of the mother and child include (1):

- reduce the maternal mortality rate.
- decrease the percentage of women at high risk who are pregnant.
- decrease the number of cases of anemia, sexually transmitted diseases, etc. among pregnant women.
- increase neonatal protection against tetanus with the use of tetanus toxoid among pregnant women.
- reduce the percentage of low birthweight babies by reducing the incidence of nutrition deficiency among pregnant women.

The various health goals regarding pregnancy care that the MOH has set in its quarterly plans since 1974 (1,2,3) are:

- increase prenatal and postnatal care coverage to 80% of women.
- identify and treat all women with high risk pregnancies.
- immunize with two doses of tetanus toxoid primiparous women and reinforce with an additional dose multiparous women every five years.
- strengthen the care provided to women delivering at home, and improve the hospital care for women with high risk deliveries.

To meet these goals, new strategies have been proposed. One component has been designed to improve the handling of high risk obstetric cases at the hospital level. Human resources to provide care to pregnant women have been strengthened. This included a program to upgrade training for medical doctors in obstetrics through the Universidad Nacional Autonoma de Honduras (UNAH) (4). The first efforts were carried out in the area and regional hospitals of the MOH in 1978.

The improvement of obstetric care depends largely on upgrading the training of traditional birth attendants (TBAs) and nurse auxiliaries. More than 50% of the deliveries in Honduras in the five years prior to the 1981 survey and close to 80% in rural areas (ENPA 1981) were attended by TBAs.

Plans of the Ministry of Public Health included officially introducing TBAs into the health system and setting up training programs and supervisory systems. More than 11,000 TBAs have been trained, of which 5000, by 1985, were closely involved in the health system.

This training process began in 1960 in urban areas (5). Since 1973 training was intensified and extended to the whole country. In the process, programs were simplified and the training period shortened to one week. By 1981, 6000 TBAs had been trained. In 1983, a more extensive TBA training plan was designed, which reached more than 5000 TBAs including the re-training of 1000 TBAs (6). In a study carried out in 1985 in Santa Barbara, it was found that 86% of the TBAs had been trained, and the others were scheduled to be trained during the remainder of the year (7).

A final component of the health strategy involved the strengthening of health services through the building of hospitals and health centers, and the development of the operational capacity of the MOH and the improvement of its support structure (maintenance, logistics, supplies, transportation, communication, etc.) and administrative systems (8,9).

The 1984 survey instrument included a detailed module on care provided during the prenatal period through the postpartum period. All women who had had a live birth since 1979 were asked about the care that they had received during the prenatal period, at delivery and postpartum. Women who delivered at home and were attended by a TBA were asked about the care that she provided. Finally, women were asked about care provided to the child after the delivery.

2. Results

a. Prenatal care

Table III A 1 presents information on the percent of women who received prenatal care, and for those who received care, the source of care, and the month of the first prenatal visit. Eighty-three percent of the women reported that they received prenatal care during their last pregnancy. This percentage does not vary with residence. Almost two-thirds of women received institutional care while 46% were seen by TBAs (this included 28% who received institutional care and saw a TBA). Although residence did not affect the proportion who received care, it did influence the source (institutional or TBA). Institutional care decreased from 78% in Teg/SPS to 59% in the rural areas, while care by TBAs increased from 17% in Teg/SPS to 58% in rural areas. In the latter, however, source of prenatal care was evenly split between institutions and TBAs (25% and 24%, respectively) while in urban areas, especially in Teg/SPS, the role of the TBA was considerably reduced.

The MOH provided 66% of the institutional prenatal care, including care provided at hospitals, CESAMOs or CESARs. The remaining care was provided by the country's two social security hospitals (IHSS) and the private sector. In the rural areas, the MOH offered most of the care (83%) while in Teg/SPS, more than half of prenatal care was provided by the social security system and the private sector. The private sector made the largest relative contribution to care in urban areas outside Teg/SPS.

According to program statistics of the MOH for 1983, prenatal care coverage was 53%, a quarter of which were institutional visits and three quarters were

visits to TBAs. Half of these TBAs were estimated to be trained (10). These 1983 data do not include prenatal coverage provided by other institutions, such as private physicians or the IHSS. This omission can partially explain the differences between the MOH coverage statistics and the 1984 MCH/FP but it would still seem that the MOH estimates are too low.

Of the women that received institutional prenatal care, 59% sought care during the first trimester of pregnancy. This percentage was highest in Teg/SPS and lowest in rural areas. Ninety percent of the women who received care did so by six months of pregnancy.

Women who sought care at the IHSS facilities or private sources were the most likely to seek care in the first trimester (Table III A 2). Women who sought care at rural health centers (CESARs) were the least likely to seek care early.

b. Tetanus toxoid vaccination

Table III A 3 provides information on the coverage of tetanus immunization. Two thirds of the women reported that they had not been immunized during their last pregnancy, 13% reported that they had had one dose, and 22% two or more doses. The proportion with at least one dose was higher in the rural than in urban areas.

Ministry norms state that all primiparas should receive two doses. For this reason, greater coverage was expected among this group of women; however, the percentage that received both injections was only three percentage points higher among primiparas than among multiparas.

Women who had institutional prenatal care were the most likely to have had two doses (32%). Only 4% of the women attended by TBAs for their prenatal care and 3% of those who had no prenatal care had two doses of tetanus toxoid. Of this latter group, women who were immunized apparently visited a health care facility for other reasons and were immunized at that time (or they were given some other injection). It is also possible that some women were immunized by a nurse auxiliary during a community visit. Women who attended CESARs and CESAMOs for their prenatal care were the most likely to be adequately protected against tetanus. Only the MOH seemed to actively provide immunization against tetanus.

The norms also stipulate that the first dose should be given in the fifth month of pregnancy and the second in the seventh month. However, there was no apparent association between the timing of the first prenatal visit and the number of doses received.

The percentage of women who had had at least one tetanus injection was slightly higher for women who delivered at home than for women who delivered at hospital. However, the high percentages of non-immunized women who delivered at an institution were probably at far less risk of contracting tetanus than were the non-immunized women who delivered at home.

Although adequate coverage (two doses of tetanus toxoid) was highest in rural areas, 94% of the women who had no prenatal care and 89% of the women who received care exclusively from TBAs did not have even one dose of tetanus toxoid. The poor coverage provided during the prenatal visits at hospitals, clinics or by private physicians is less alarming since the women in these

areas are more likely to deliver in hospitals, probably at the same place they received their prenatal care, and hygienic practices are likely to be better in hospitals.

c. Delivery care

Table III A 4 shows place of delivery by residence. Fifty-five percent of births took place at home. Home births accounted for 11% of all deliveries in Tegucigalpa and San Pedro Sula, 37% in other urban areas, and 78% in rural areas. Forty-five percent of all deliveries were attended by TBAs, including more than three fourths of all home deliveries.

According to the ENPA 1981, 55% of the last live births which occurred in the five years prior to the survey were attended by TBAs, 23% in urban areas and 71% in rural. Nine percent were attended by "others", most likely at home, increasing the percentage of home deliveries to approximately 64% (11). Thus, during the three years that elapsed between the two surveys, the percentage of women whose deliveries were attended institutionally increased, while deliveries attended by TBAs decreased.

Of all deliveries, 29% were attended at MOH facilities and these accounted for 64% of all institutional deliveries. Of deliveries at MOH facilities, almost all were at hospitals. CESAMOs and CESARs generally are not equipped to attend deliveries, except for some CESAMOs that have small maternity wards. The private sector accounted for 8% and the IHSS hospitals 7% of all deliveries. In all residence groups, the MOH was the most important source of care. In Tegucigalpa and San Pedro Sula, the social security system and the private sector were also important sources while in smaller urban areas the

private sector was important. In rural areas, the only important source of delivery care was the MOH.

In order to determine the impact of education on place of delivery, it is important to control for residence since the higher the women's education, the more likely she is to be a resident of an urban area. Table III A 5 provides information on place of delivery by education and residence.

Almost three fourths of the women with three years or less of education had their deliveries at home while almost two thirds of the women with four or more years of education had their deliveries in an institution.

Controlling for residence reduces but does not eliminate the impact of education. Education has its strongest impact on place of delivery in other urban areas. Among women with three or fewer years of education, 58% of deliveries were at home compared with 25% among women with four or more years of education.

Education also influences the institution a woman chooses for the delivery. In Teg/SPS, almost three fourths of the women in the low education group who had their deliveries in an institution went to MOH hospitals (56% of 79%), while most of the remaining women went to IHSS facilities. Of the women with more education who had hospital deliveries, half went to MOH hospitals (46% of 93%), one third went to the IHSS and the remainder went to private hospitals.

As in Tegucigalpa and San Pedro Sula, in the smaller urban and rural areas the proportion of women who delivered in MOH hospitals was higher among women in the low education group. Also, in the other urban areas the second most

important source were private hospitals. While women in Teg/SPS have access to IHSS, the female population outside of the two largest cities has to seek care at MOH hospitals or private institutions. Better educated women can afford private hospitals.

Data from the Hospital Materno Infantil, a MOH hospital in Tegucigalpa, shows that the cesarean section rate was 8.4% in 1980 and 8.7% in 1984 (12). However, data on cesarean section for all hospitals were previously not available. All women in the survey were asked how their last child was delivered and these data are presented in Table III A 6. Of the institutional deliveries, 11% were by cesarean. The percentage of cesarean deliveries was highest in Teg/SPS and lowest in rural areas. Urban hospitals have better resources for diagnosis and treatment thereby allowing them to perform surgery when necessary. The highest cesarean section rate was for women with six or more years of education. Cesarean section rates were higher at private and IHSS hospitals (14% in both) than at MOH hospitals (10%). Women who never received prenatal care were the least likely to have a cesarean section followed by women who waited until their third trimester to make their first prenatal visit.

Parity was negatively associated with rates of cesarean section. Women who had a cesarean at their first delivery had few additional children, and then often got sterilized. Maternal age at last delivery was apparently not associated with type of delivery.

The percentage of women with cesarean sections was higher in 1983-84 than in 1979-82 (12% vs 9%). Rates of cesarean section by selected characteristics

are compared for these two periods in Table III A 7. Women with more closely spaced pregnancies are disproportionately represented in the latter period. Women who delivered between 1979-1982, by definition, did not have an additional delivery; to the extent that their characteristics affected the decision not to have another delivery or the outcome itself was a factor, the cesarean section rates for this group will not be representative of rates for the population. Nevertheless, although problematic, these data do provide some national level information on current trends in cesarean delivery.

Rates of cesarean delivery increased in all three residence groups with the largest percentage point increase in other urban areas (7% in 1979-82 and 13% in 1983-84). Increases occurred in all education groups and in most parity groups. The rate in the MOH and private hospitals increased but the rate in social security hospitals fell.

The increase in MOH hospitals and in rural areas may be explained by increases in the number of obstetricians providing services at regional and area MOH hospitals in rural areas.

d. Traditional birth attendants

Table III A 4 shows that 55% of the women deliver at home, most attended by a TBA. This section contains information on the care given by TBAs. Because of the large efforts made to train TBAs, data on practices of TBAs are analyzed with respect to training in order to assess its impact.

While 44% of the women were attended by a TBA, the percentage who planned to give birth with a TBA was higher. Figure III A 1 presents information on the

intentions and place of delivery of the women who planned to have their deliveries at home. Almost 10% neither called nor went to a TBA's home while 6% went to a TBA's home and 84% sent for a TBA. Thus, 90% of women who planned to deliver at their home or someone else's home also planned to be attended by a TBA. TBAs arrived after the baby was born in 9% of the cases; thus, some women who did not expect to give birth unattended, had their deliveries alone. Just over 2% were referred for delivery, and had unexpected institutional deliveries. Although 10% planned to deliver without a TBA, almost twice as many (19%) did so.

During training, TBAs usually receive a kit equipped with necessary items. Women who were attended by a TBA at the time of their last delivery were asked whether or not the TBA had a kit. If the mother said the TBA had a kit, she was assumed to have been trained. But some TBAs may not have carried their kits or never received them so that some trained TBAs may have been included in the untrained group. Consequently, differences found between trained and untrained TBAs may be underestimated.

The TBA training provided by the MOH emphasizes the improvement of techniques during delivery. Information on delivery care practices of TBAs is presented in Table III A 8. In general, TBAs with training were reported by the mothers to have performed better than did TBAs without training. Concerning attention before delivery, only with respect to the use of injections was the performance of trained TBAs poorer than that of untrained TBAs. During training, TBAs are taught not to use injections to accelerate the delivery but 20% of trained and 6% of untrained TBAs were reported by mothers to have used injections.

The use of hygienic methods to treat the umbilical cord is emphasized in training and trained TBAs were more likely than were untrained TBAs to use modern methods.

Finally, trained TBAs generally provided better care to the newborn; they were more likely to put eye drops in the newborn's eyes, remove phlegm from the mouth and weigh the child. But both trained and untrained TBAs followed the traditional practice of giving the child a "chupon" (gauze saturated in a sweet syrup). Apparently training has not affected the use of this traditional practice.

Table III A 9 provides information on recommendations made by TBAs. When they made a recommendation, it was almost always that the woman breastfeed. But trained TBAs were more likely to make a recommendation than were untrained TBAs. Trained TBAs were more likely to recommend immunization (79%) than were untrained TBAs (53%). Trained TBAs were also more likely than were untrained TBAs to recommend the use of contraceptives but the percentage recommending contraception was low in both groups.

The average payment made to a TBA was 15 Lempiras (US \$7.50) and trained TBAs were paid more on average (17 Lempiras) for their services than were untrained TBAs (12 Lempiras) as indicated in Table III A 10.

e. Postpartum

Only 28% of the women interviewed had a postpartum check-up (Table III A 11). Even in Teg/SPS, fewer than half of the women (46%) had a check-up, while in rural areas only 20% sought care. Most of the women who did get care went to

the health services at the MOH (58%), and, as in the case of prenatal care, the CESAMO provided most of the coverage. The second most important source of care was the private sector (29%). In Teg/SPS, more than half of the check-ups took place at the IHSS (25%) and at private hospitals and clinics (29%). Half of the check-ups (48%) in the smaller urban areas were conducted in the private sector. The MOH provided 77% of the check-ups at the rural level.

Table III A 12 provides information on the percent of women who had a postpartum check-up by place and type of delivery. Women who delivered at private and IHSS hospitals were most likely and women who delivered at home were least likely to have a postpartum check-up. Only 51% of women with cesarean deliveries had a postpartum check-up. Women who feel well, including those that have surgery, may not think that further care is necessary. In comparison with the relatively high coverage of institutional prenatal care (65%), the use of postpartum services is quite low (28%).

f. Check-up for the Newborn

Table III A 13 provides information on the first institutional visit made for the newborn including where and when it occurred and the reason for the visit. Eighty-four percent of the mothers took their children for a check-up; this percentage was 11 points higher in Teg/SPS (91%) than in the rural areas (80%). Three fourths of this baby care was provided by the MOH. As with prenatal, delivery and postpartum care, the MOH was the most important source, and particularly so in rural areas, while the private sector was also important in both urban areas and the IHSS in Teg/SPS. Most women brought their children for a check-up during the first three months. Mothers in

Teg/SPS brought their children in the earliest while mothers in rural areas waited the longest before getting care for the child.

The most frequently reported reason for the first visit was well-baby care and/or immunization; this was similar in all residence areas (Table III A 14). Just over half of check-ups during the first month were motivated by the illness of the child; whereas only 29% of the check-ups for a child 30 days or older were motivated by illness. Generally mothers wait until a child is at least a month old before getting care unless the child is sick. Immunizations are not provided until 6 weeks and mothers apparently delay a first well-baby visit until the baby is old enough for its first immunization.

In summary, of all services, mothers were least likely to get a postpartum check-up. Eighty-three percent of the women received some type of prenatal care, 29% used the postpartum services, and 84% sought care for their children after birth. Health personnel should consider integrating the postpartum visit for the mother with the child check-up.

Prenatal, Delivery and Postpartum References

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B. Breastfeeding and postpartum amenorrhea

1. Introduction

Breastfeeding is one of the most important factors that affect the health of the newborn. The mother's antibodies are transmitted to the child through her milk which provides protection for the child against infectious diseases. It is the most complete food for the child's nutrition during his/her first four to six months, preventing the child from becoming infected when eating other foods with higher levels of contamination.

Breastfeeding also increases the duration of postpartum amenorrhea. The longer a woman breastfeeds, and especially if she breastfeeds exclusively, the longer the duration of postpartum amenorrhea and the longer the time between pregnancies. As breastfeeding becomes less prevalent and the introduction of supplementary foods is begun earlier, the need to use appropriate family planning methods during the postpartum period increases.

In September of 1982, the MOH, the Honduran Institute for Social Security (IHSS), and the National Council for Social Welfare, signed an agreement to develop the National Project for the Support of Breastfeeding (PROALMA) to promote breastfeeding through the development of institutional guidelines and training of health professionals in its promotion (1).

The project concentrated its initial efforts in the IHSS hospitals and the MOH's training hospitals in Tegucigalpa and San Pedro Sula. These cities were chosen because breastfeeding was thought to have declined the most in them.

In 1984, the MOH created a breastfeeding component as a part of the family planning program. Guidelines regarding hospital practices which may affect breastfeeding were written, more than 1000 health professionals were trained, educational materials were prepared, promotional seminars were carried out, and milk banks were established in hospitals. An evaluation of the PROALMA project was conducted recently. Results showed a substantial increase in knowledge of breastfeeding on the part of health personnel and of mothers during the period 1982-1985. Breastfeeding practices have also changed, although these changes are smaller. This is to be expected as behavior changes more slowly than does knowledge (2).

2. Results

The following sections discuss the relationship between breastfeeding and postpartum amenorrhea and contraceptive use. Information regarding breastfeeding was obtained, including whether it was exclusive or partial. Mothers were asked specifically about the introduction of other foods. For every child born since 1979 and still alive, the mothers were asked if the child had been breastfed, and if so, if the child was still being breastfed. If the child was no longer breastfed, the mother was asked at what age the child stopped. Also, mothers were asked when other supplementary foods, including other milks, were added to the child's diet, and what the child had eaten the day before the interview. Finally, women were asked how long after their last birth they resumed menstruating. With this information, it is possible to compare the duration of breastfeeding and of postpartum amenorrhea.

Because retrospective data on duration of breastfeeding and postpartum amenorrhea tends to be unreliable due to heaping of durations and recall error (3,4), the information on breastfeeding and postpartum amenorrhea presented in the tables is based on reported current breastfeeding and menstrual status by age of the child. Means have been computed using the "prevalence/incidence" method. (See footnote on Table III B 1). This method has been shown to give results similar to that of other methods (5). The data presented here refer to women with a living child less than two years old at the time of interview and who are not or have not been pregnant since the birth of that child.

a. Mean duration of breastfeeding

It has been suggested that factors associated with modernization are the cause of the reduction in the prevalence and duration of breastfeeding (6). These factors include residence, education, and employment. Also the attitude of health personnel, the advertisement of infant formula by the manufacturers and distributors, and the attitudes of employers have tended to discourage breastfeeding; however, these latter factors are not analyzed in this survey.

Table III B 1 presents information regarding the mean duration of breastfeeding according to residence and selected characteristics. The mean duration of breastfeeding was 16.2 months. In the rural areas, the mean duration was longer (19.0 months) than in urban areas (11.7 months).

The mean duration of breastfeeding was negatively associated with education but it was not associated with the number of living children. It was higher among women with home deliveries than among those with hospital deliveries. Hospital personnel may discourage breastfeeding or the characteristics of

women with hospital deliveries may be associated with low durations of breastfeeding. Data in this survey can not be used to determine the relative importance of each of these factors.

In urban and rural areas, the mean duration of breastfeeding was negatively associated with education with a difference of approximately six months between the highest and the lowest education groups. When controlling for education, the mean duration of breastfeeding was almost five to six months higher in rural than in urban areas.

In both rural and urban areas, women who worked outside the home breastfed less than did women who did not work outside the home. It may be that the work environment interferes with breastfeeding or that women who work outside the home have characteristics that are associated with a shorter breastfeeding duration. Again we did not collect data to investigate these hypotheses.

b. Comparison between the ENPA 1981 and MCH/FP 1984

Table III B 2 compares the mean duration of breastfeeding during the period 1979-1981 from the ENPA 1981 with data from the present survey. The estimated mean duration of breastfeeding was 15.2 months in 1981 and 16.2 in 1984.

In both surveys, the mean duration of breastfeeding was negatively associated with education and was higher in rural than in urban areas. The largest increases in breastfeeding duration occurred in urban areas and in the highest education group, thereby slightly narrowing breastfeeding differences associated with education and residence. Since programs to increase

breastfeeding were initially urban-based, these data suggest that the efforts to promote breastfeeding have had an impact.

The increases in duration within education and residence categories were all greater than one month but the increase for all women was only one month. Increases in urbanization and education without any change in the mean duration of breastfeeding within residence or education groups would result in an overall decrease.

c. Breastfeeding and supplementary food

Table III B 3 provides information on breastfeeding and supplementary feeding. For each three-month age group, the distribution of women is presented according to the food given to the child. The category "breastfeeding" is divided into exclusive breastfeeding, supplementing with milk, supplementing with other food and supplementing with both. Babies not breastfed include those given either other milk or other milk and other food. While most women breastfed their last baby, even for children two months or less, only 44% were fully breastfed. Another 45% supplemented either with other milk, other food or some combination of the two. Exclusive breastfeeding was much lower at six months, with only 4% of the mothers fully breastfeeding; nevertheless, 72% continued breastfeeding in addition to giving other milk and other foods. Almost all babies were receiving food other than milk by the time they reached six months. For babies 12-17 months, over 60% of mothers were still breastfeeding although all were supplementing; at 18-23 months, about 35% continued to breastfeed.

Table III B 4 shows the distribution of feeding practices according to residence and age of the child. Age groups have been combined because of small cell sizes. For all three age groups, the percentage of children who were breastfed was higher in rural than in urban areas. The differences in the percent breastfed was most pronounced for older children. For babies 0-5 months, the difference was 14 points. At 18-23 months, only 18% of mothers in urban areas were still breastfeeding as compared with 48% of mothers in rural areas.

For babies 0-5 months, the difference in exclusive breastfeeding by residence was greater than the difference in any breastfeeding. For babies 6-17 months, supplementation was more likely to include other milk and other foods in urban areas but other food only in rural areas. Thus, for babies 6-17 months in urban areas, 16% were not receiving supplementary milk as compared with 46% in rural areas. This difference persists for babies 18-23 months old; about 23% of mothers in rural areas have not introduced supplementary milk as compared with only 4% in urban areas.

There were pronounced feeding differentials associated with residence. Both full and partial breastfeeding were of longer duration in rural than in urban areas. Mothers in urban areas were more likely than mothers in rural areas to add both supplementary milk and other food to the baby's diet. Although only 2% of rural mothers were exclusively breastfeeding at 6-17 months, another 44% had not added other milk; the comparable percentages were 1% and 22% for rural mothers of babies 18-23 months.

Table III B 5 presents information on the percentage of babies for whom various foods have been introduced. It can be seen that other types of milk

were introduced earliest in the child's diet (45% at 0-2 months). Only a small percentage of children were eating other foods. The use of other foods substantially increased at 3 months (juices 54%, strained food 31%). After six months practically every other type of food, except coffee, was given to more than 50% of the children. By 18-23 months old, 98% of the children were eating solid foods, including 78% that received supplementary milk and 78% that were drinking coffee.

d. Amenorrhea, breastfeeding and the use of contraceptives

Table III B 6 presents information on the mean duration of postpartum amenorrhea by residence according to selected characteristics (residence, education, living children, place of delivery and work status). The postpartum amenorrhea period was calculated as the difference between the date of the last live birth and the date of resumption of menstruation. The mean duration of postpartum amenorrhea was estimated to be 11 months.

Postpartum amenorrhea was associated in a similar way to education, number of living children, place of birth and work status as was breastfeeding. This is to be expected as the duration of postpartum amenorrhea increased with duration of breastfeeding.

Table III B 7 presents information on infant feeding patterns and contraceptive use by age of the youngest child. As shown previously and again in this table, the percentage breastfeeding exclusively declined with age of the youngest child while the percentage who provided supplementary food increased to age 6-8 months, levelled off over the interval 9-11 months and then declined. The percentage not breastfeeding increased steadily with the

age of the child as did the percentage who were contracepting. Among women with a child two months or less, only 5% were contracepting. At 9-11 months this percentage was 28% and at 18-23 months, 36%. Women obviously realize that the older the child, the more likely they were to be fecund and need contraception. The decision that women make about when to start contracepting is probably related to when they think they are fecund again and this, in turn, may be related to breastfeeding patterns. Women who stopped breastfeeding were more likely to be contracepting than were women who were supplementing. While breastfeeding will prolong the period of postpartum amenorrhea, the introduction of supplements will shorten it. As shown in Table III B 6, the mean duration of postpartum amenorrhea was 11 months so that some women who breastfed were also ovulating and were therefore at risk of pregnancy. If pregnancy is to be delayed, some women will need to begin using contraception before they stop breastfeeding.

Oral contraceptives were not selected by a large percentage of breastfeeding women but they were a popular method for women who had stopped breastfeeding. Oral contraceptives may not be the most appropriate contraceptive choice for breastfeeding mothers. Therefore, other methods need to be introduced in order to protect against pregnancy. For mothers for whom breastfeeding is well established, those, for example, with a child six months or older, oral contraceptives may be an appropriate choice.

Table III B 8 presents information on contraceptive use and method according to whether or not the period of postpartum amenorrhea had ended and number of months since the last delivery. Of the women who were not amenorrheic, 42% were contracepting; in comparison, only 6% of amenorrheic women were contracepting. However, amenorrheic women have younger children than do

fecund women but controlling for age of the child does not change this relationship.

These tables exclude women who have gotten pregnant within the two-year period since their last pregnancy. Of all women who had a child less than two years of age, 14% were or had been pregnant since their last child was born. Of these pregnancies, 60% were unplanned which is considerably higher than for women in the population in general. Some of these pregnancies could have been prevented if these women had used contraception. Whether or not they were breastfeeding when they got pregnant is unknown.

Breastfeeding References

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C. IMMUNIZATION

1. Introduction

The Expanded Program for Immunization (EPI) is of high priority within the Ministry of Public Health (MOH), and is one of the basic components of health services. The objective of EPI is to reduce the morbidity and mortality of six diseases among children younger than 5 years old. The department of Epidemiological Surveillance of the MOH estimated for 1984 the following rates of illnesses which could have been prevented by immunization included in the EPI:

	<u>Cases per 1000 inhabitants</u>
Measles	118.3
Tuberculosis	14.9
Polio	1.4
Tetanus (all ages)	1.1
Diphtheria	0
Tuberculosis	49.2

The immunization program aims to immunize all children under five against polio, pertussis, diphtheria, tetanus, measles, and tuberculosis (1).

Immunization activities started in 1950; at that time the highest priorities were given to smallpox and typhoid vaccines. In 1965, the decision was made by the MOH to protect all children younger than five years old against the additional diseases of polio, diphtheria, pertussis, and tuberculosis. In 1973 immunization goals were modified to include 80% of the population

susceptible to the diseases mentioned above. Legislation for mandatory immunization was enacted in August, 1980. Under this law an infant immunization card must be presented at orphanages, day care centers, supplementary feeding posts, and at government health care facilities (2).

EPI activities are carried out in all health service facilities. The primary strategies include meeting the demand at health care facilities and through special mass immunization campaigns. These campaigns are held three times a year.

Between 1974-1976, the MOH estimated that about 60% of children younger than 5 years old were immunized against polio, DPT, measles, and tuberculosis. However, between 1977-1979 there was a serious deterioration in coverage resulting in new epidemics. In 1977, there was a polio epidemic that lasted until 1979 and left 450 children paralyzed (3,4).

Between 1980-1983 there were 37 polio cases (5). During this period, the polio immunization program estimated that about 70% of children younger than five years old had been immunized (6). Such coverage would seemingly offer a safe margin against a possible epidemic. However, the 1981 Contraceptive Prevalence Survey (ENPA 1981) showed a different picture of immunization coverage. In that survey, information on immunization coverage for the last live birth in the previous five years was obtained. Estimated coverage was 46% for polio, 42% for DPT, 50% for tuberculosis and 60% for measles.* During 1984 there was another polio epidemic with more than 50 cases involving

* These rates of the ENPA 1981 are adjusted using the age distribution of children younger than five years old from the MCH/FP 1984.

paralysis, and between 1984 and 1985 there was a measles epidemic. This situation stimulated a new immunization program the results of which, up through 1984, are presented in this report.

2. Results

This chapter presents data on immunization coverage for the four vaccines of the EPI. For each child under 5 years of age, information was obtained on which immunizations the child had received and where applicable, how many doses the child had received. In addition, the date the child received the last immunization for each vaccine was obtained. In 80% of the cases, the mother had an immunization card so that the information could be verified.

Adequate coverage refers to children who have had the correct number of doses for their age, according to guidelines of the MOH. Those children who are too young to have had a particular immunization are excluded and those children who had had the appropriate number of doses for their age even if they have not had all doses are considered to have had complete coverage. The vaccination schedule recommended by the EPI is the following: BCG at birth; three doses of DPT and of Polio vaccine (at two, four and six months); and measles vaccine at nine months. For Polio and DPT, children younger than two months are excluded from the calculated rates, since they are not old enough to have received a dose. Children between two and three months old who have received at least one dose have adequate coverage as do children between four and five months who have received two doses. For measles, children younger than nine months are excluded from the tables. Since BCG can be given at birth, no child with known age is excluded from the tables.

a. Immunization status, residence and education

Table III C 1 provides information on the coverage of the four vaccines (complete, incomplete, none) by residence. Immunization coverage was most complete for polio and measles. For polio, 82% had complete coverage and an additional 14% had at least one dose. The vaccine with the lowest complete coverage was DPT (67%); 21% had some but not complete coverage. The DPT vaccine is usually applied simultaneously with polio; thus, it is expected to have similar coverage. However, because of the 1984 polio epidemic, immunization against polio was emphasized, which may explain the difference. Eighty-two percent of children have been vaccinated against measles and almost 70% against tuberculosis. For all vaccines, urban-rural differences were small.

In order to determine if socioeconomic factors affect the status of vaccination coverage, rates of immunization according to education controlling for residence were calculated. These rates appear in Table III C 2. There was a direct relationship between vaccination coverage and the mother's education. It is possible that mothers with more education are more conscious of the benefits of immunizing their children. These results point out the need to educate mothers with lower levels of education about the benefits of immunization.

b. Immunization status and child's age

Tables III C 3-6 provide information by age of the child and residence on immunization coverage for polio, DPT, measles and tuberculosis, respectively. The lowest adequate immunization coverage for polio was for children younger

than one year old. For children a year old or more, there was no apparent association with age. Lower vaccination coverage for children less than one year old means that children are vaccinated later than recommended. This situation occurred in every residence area.

Results were similar for DPT (Table III C 4), but the differences between children less than one and those at least one year old were greater. Children younger than one year old were the least likely to have complete coverage (34%), about half that for children aged one year (72%). About one-third of children less than age one have had at least one dose and the remaining 30% have not had even one dose. Thus, children less than one are both less likely to have had any coverage and to have had complete coverage. Among children at least one year or older, 10% or less have not had any coverage. Thus, as with polio, children were vaccinated later than recommended but the percentage with coverage (complete or incomplete) was lower than for polio.

The situation was similar with regard to vaccination against measles. The coverage was lowest for children younger than one year old (47%). Coverage was highest for children two years old (90%). Also for BCG, the lowest coverage was among children younger than one year old (35%) and the highest among children two to four years old. Children were vaccinated later than specified in MOH guidelines.

c. Immunization status in the ENPA 1981 and MCH/FP 1984

In the 1981 Contraceptive Prevalence Survey (ENPA 1981), the analysis of vaccination coverage was based on the last live birth younger than five years old, and in the MCH/FP, it was based on all children younger than five years

old. In order to compare rates from these surveys in Table III C 7, the coverage rates from the ENPA 1981 were adjusted using the age distribution of children younger than five years old that were found in the MCH/FP 1984.

Also, the rates from ENPA 1981 do not take into account that some children are not old enough to have received all the recommended vaccines. Thus, in order to make a reasonable comparison, the 1984 MCH/FP rates shown in Table III C 7 have not taken into consideration that some children were not old enough to receive certain immunizations. Since the table includes children that could not have received complete coverage (they were too young), these 1984 rates are lower than those shown in previous tables, except for BCG where all children are included in all the calculations. The difference in the MCH/FP rates was largest for measles (12 points) because there were more children excluded because of age in earlier tables than for any other vaccine.

In the case of polio, coverage has increased by 30 percentage points, reaching 75%. For DPT, the increase was less, 20 percentage points, reaching 62%. Coverage of measles increased by 10 points and coverage of BCG increased by nineteen. The increases were greater in the rural areas. In 1981 there was a noticeable difference between the coverage in the rural and urban areas; this difference had disappeared by 1984.

d. Immunization status compared to other countries in the region

Table III C 8 compares the immunization coverage in Panama, Guatemala and Honduras. As in Table III C 7, these rates are not adjusted for the child's age. Honduras had the highest rates of coverage for polio and BCG. Coverage for DPT and measles was similar to that of Panama and much higher than in

Guatemala. These results are very encouraging for Honduras and reflect the efforts made during the last two to three years to protect the children against immuno-preventable illnesses. The continuation of these efforts should be one of the priorities of the MOH.

Immunization References

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D. Diarrhea

1. Introduction

Diarrheal diseases are important contributors to morbidity and mortality among children. Records of the MOH show that in Honduras the morbidity rate for diarrhea in 1983 was 219.4 for every 1,000 children under age five; in 1984, the rate was 192.4. Calculations show that more than 2,000,000 episodes of diarrhea will occur annually among Honduran children under age five and that each child will have from two to five episodes, with an average of three per child per year (1).

Although diarrheal diseases are prevalent during all months, they are most intensive during the months of May through August, which are the months of greatest rainfall; they are lowest in the colder months (December and January) (2).

Diarrhea is associated with between 30% and 50% of deaths among children one year of age in Honduras (3). Between 1978 and 1982, the annual average number of deaths in children which were attributed to diarrhea was 1400; in contrast, during 1983 and 1984 there were approximately 950 deaths, a reduction of slightly more than 30%. These data are from the National Census and Statistical Records which is known to have a high rate of underregistration. Even so, this underregistration, while it may affect estimates of the annual number of cases, does not necessarily affect estimates of the percent decline. Also between 1981 and 1984, a decrease was observed in hospital deaths attributed to diarrhea, from 25 per 10,000 patients discharged to 15 (4). Why these changes have occurred is not clear, but it could be the result of some

combination of the impact of the oral rehydration therapy (ORT) program in health centers and in the community, as well as mass education campaigns to promote the use of ORT, the water and sanitation program, and breastfeeding promotion activities.

In recognition of the importance of the problem, the MOH initiated a Diarrhea Disease Control Program (PCED) in 1982. This program is based on four strategies: 1) treatment of cases through the use of ORT; 2) public education through mass media; 3) promotion of breastfeeding; and 4) promotion of environmental sanitation through community participation.

Treatment has emphasized preventing and reducing dehydration at an early stage, through the promotion, dissemination and use of ORT (packets of salts made using the WHO formula and called Litrosol). These activities include: 1) distribution of Litrosol through health centers; 2) distribution of Litrosol through community volunteers (guardians of health); and 3) orientation and motivation of mothers in the use of Litrosol. In addition, the health services of the Honduran Institute of Social Security (IHSS) and other social action organizations have joined together to promote the use of Litrosol.

For 1984, plans were made to provide ORT to 1,276,182 children under five with diarrhea (5).

2. Results

In this chapter, information on the prevalence of diarrheal disease in children under age five and the factors associated with prevalence is

presented. The factors that influence use of health resources to treat cases are examined including factors that affect use of Litrosol.

a. Prevalence of diarrheal disease

For each child under the age of five, information was obtained on whether the child had diarrhea on the day of the interview; if the response was negative, the interviewer asked whether the child had had diarrhea on the two preceding days. Table III D 1 presents data on the prevalence of diarrhea among children under the age of five by age and selected variables thought to be associated with diarrhea. Twenty percent of the children had diarrhea within the past three days. It is important to remember that this study was carried out during the months of September through December, when the prevalence of diarrhea is relatively low. Prevalence varied by residence, lowest in Teg/SPS (16%) and highest in rural areas (21%). The rate may be lowest in Teg/SPS because it has the best socio-economic and environmental sanitation conditions.. The highest prevalence was found among children age one (29%); the rates then decreased with age and were lowest for children age four.

As diarrhea is frequently associated with marginal conditions of sanitation, prevalence was examined with respect to the system of waste disposal and the source of water for use in the house. The existence or non-existence of an adequate system of waste disposal signals an important difference in the prevalence of diarrhea. As can be seen, the percentage varied from 14% in families having a toilet, to 21% and 22% in families having a latrine or no waste disposal system whatsoever. The source of water appears to have no relationship with the prevalence of diarrhea. As shown in Table I 3, waste disposal and source of water vary by place of residence; toilets and water

faucets were more common in houses or on property in urban areas. Diarrhea was more prevalent in homes without electricity; homes with electricity were more likely to be in urban areas and to have an indoor toilet, factors associated with lower prevalence.

The pattern of association between diarrhea and age (Table III D 2), controlling for residence, was similar to the pattern found in Table III D 1 when age was not controlled.

b. Characteristics of diarrheal disease

In order to characterize diarrhea cases according to severity and duration, mothers were asked whether the diarrhea was accompanied by signs or symptoms such as mucus, blood or vomiting and the number of days that the child had had diarrhea. Although these elements do not define precisely and completely the severity of cases, they do highlight factors which motivate the mother to take specific action.

Table III D 3 provides information on signs and symptoms by duration. The percentage of cases which did not present any signs/symptoms was greatest (57%), followed by cases presenting blood or mucus (24%), vomiting (10%), and both (8%). The percentage that had some sign/symptom increased with the number of days that the child had diarrhea. Although 26% of the children who had diarrhea for only one day showed the presence of some sign/symptom, this percentage was more than twice as high (60%) in children who had diarrhea for a period of seven days or more.

c. Seeking of attention and place where sought

The decision of the mother to seek medical attention for the child may depend on the duration of the episode of diarrhea and on the associated signs and symptoms presented by the child. Table III D 4 shows the proportion of mothers that sought medical attention, and if so, where they sought attention by signs/symptoms of diarrhea. In only 18% of cases in which there were no signs/symptoms was attention sought, either in a health center, from a community volunteer, or from some other source. In 24% of cases in which there was either mucus or blood, or vomiting attention was sought; but if all symptoms were present, attention was sought in 48% of cases. In simple cases, it would appear that the child is treated at home or not treated at all.

Table III D 5 provides the same information as Table III D 4 except that the seeking of treatment is analyzed with respect to a variable that combines data on duration and signs/symptoms. Both the presence of symptoms and the duration of the diarrhea affected whether attention was sought. Among children with no signs/symptoms, attention was sought in 22% of cases lasting 3 days or longer compared with 14% in cases lasting two or fewer days. There were similar differences for children with signs/symptoms; of cases in which the diarrhea had lasted for three days or longer, attention was sought in 33% of cases with symptoms and only 18% of cases without symptoms.

The most common source of attention was the MOH which provided help in well over half the cases (12.1/22). The second most common source was the private sector.

d. Treatment of diarrhea

PCED norms indicate that the only treatment to be administered for diarrhea is Litrosol, except in those cases where there is unquestionable evidence that there exists an etiological agent requiring additional specific treatment. The use of antidiarrheal medications is contraindicated in all cases. Table III D 6 provides information on treatment by whether attention was sought and by where it was sought. The results of the survey showed that three quarters of all cases of diarrhea (74%) received some treatment, regardless of whether attention was sought. The treatment in 22% of cases was with antibiotics only, and in 15% with antidiarrheal medication only. It is important to point out that the use of antibiotics and antidiarrheal medications may be higher because they were also used in combination with other medications. Only 6% received Litrosol alone, although an additional 11% received Litrosol in combination with other medications so that the total receiving Litrosol was 17%.

Practically 100% of those who received medical attention received some sort of treatment, regardless of the place where attention was sought: almost half of these cases received Litrosol (42%), whether alone or in combination with antibiotics or antidiarrheal medication. The use of antidiarrhetics was relatively high in all places where medical attention was provided.

In 67% of cases in which attention was not sought, some medication was given to the child. It is important to emphasize that in 10% of the cases, Litrosol was given to the child.

Table III D 7 provides information on treatment according to both signs/symptoms and provision of medical attention. In the group for which attention was provided, total use of Litrosol (alone and in combination) was greater when signs/symptoms were present (52%) than when there were no signs/symptoms (30%). Also among women who did not seek attention, children showing signs/symptoms were more likely (13%) than children not showing signs/symptoms (8%) to have had Litrosol.

The use of Litrosol is low, and when it is used, it is often used in combination with other medications. Mothers often do not seek attention until the diarrhea is severe and when they medicate their children, they usually do not use Litrosol. Even in health institutions, other medications are more often used than Litrosol which, in turn, is generally used in combination with other forms of treatment. Efforts need to be made to encourage the use of Litrosol alone and to encourage its use before the diarrhea becomes severe.

Diarrhea References

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CHAPTER IV. FAMILY PLANNING

A. Planning status and fertility plans

1. Introduction

This section covers the perceptions that women have regarding their last pregnancy, their desire for additional children and their ideal family size. This information is important for programmatic reasons since the decision to adopt contraception, to choose a particular method or to switch methods depends on where the woman is in the family building process. Decisions affecting contraceptive use are dependent on previous pregnancy experience, desire for and timing of the next pregnancy, fecundity status and family size plans.

All women who reported at least one pregnancy were asked a sequence of questions about whether they had wanted to become pregnant at the time of their most recent conceptions and, if they had not, whether they had ever wanted to have any more children at the time of that pregnancy or if they had wanted to delay the pregnancy. On the basis of these questions, each woman's last pregnancy was classified as either "planned", "mistimed", "unwanted", or "of unknown status"(1). Planned pregnancies were defined as those that were desired and occurred when they were intended. Mistimed pregnancies were those that were desired but had occurred before they were intended and unwanted pregnancies were defined as those which had not been wanted at any time. The remainder were classified as unknown because of insufficient data about reproductive intentions. These four categories are mutually exclusive and exhaustive. Mistimed and unwanted pregnancies comprise the category "unplanned pregnancies".

2. Results

Based on these definitions, 60% of married women's most recent pregnancies were reported as planned, 18% as mistimed, and 21% as unwanted (Table IV A 1). Only 0.6% of pregnancies could not be classified. About 39% of recent pregnancies could thus be considered unplanned.

Differences among the three residential groups were small; however, the percentage reporting their last pregnancy as unwanted was highest in rural areas and lowest in Teg/SPS. The percentage of unwanted last live births increased with both age and number of living children. Forty-four percent of women with six or more children reported that their last pregnancy was unwanted and an additional 11% said that it was mistimed.

Among women 35 and older, one third or more reported that their last pregnancy was unwanted; the older the woman, the larger her family so that the association of age and planning status may be explained by the association between age and number of children. Although the percentage of women reporting an unwanted pregnancy was negatively associated with education, this finding may be explained by the older age and higher parity of women with less education.

Table IV A 2 presents information on women's pregnancy and fecundity status and their desire for additional children. Of all women currently in union, 16% reported that they were pregnant and 8% were categorized as subfecund. Women were classified as subfecund if they had gone through menopause or had not used a contraceptive in the last three years and had been sexually active but had not gotten pregnant. The remaining 76% of the women were then classified

according to their current desire for an additional pregnancy. Nine percent of the women said that they wanted to get pregnant soon while 25% said that they desired pregnancy but not in the next few months. Forty per cent of the women said that they did not want to have another child. (Sterilized women are included in this group.) The percentage currently pregnant varied by residence, highest in rural areas and lowest in Teg/SPS; this relationship is to be expected since variations in fertility show the same association with residence.

The percentage of women who reported that they were pregnant or wanted to become pregnant was negatively associated with both age and the number of living children, while the percentage who wanted no more children increased with both age and the number of children. Over half of the women aged 30 and over or with 4 or more children reported that they did not want additional children. The percentage classified as subfecund increased with age; over one-quarter of women 40-44 were in this group.

All women were asked about their ideal family size; specifically they were asked, "If it depended only on you, how many children would you like to have?" Table IV A 3 provides information on ideal family size and number of living children according to residence. Ideal family size varied from an average of three for women 15-19 to 4.5 for women 40-44. For younger women, ideal family size was greater than actual; for women 35 and over, actual family size was greater than ideal. The ideal family size is a purer measure for younger women since their answers are uncontaminated by their experiences related to pregnancy. Older women may find it difficult to say that they would like a smaller family than the one that they have. Consequently, family size may be lower than reported among older women and the divergence between actual and

ideal family size even larger. Ideal family size follows the same general pattern with respect to residence as does fertility and current pregnancy with the lowest values in Teg/SPS and the highest in rural areas.

Of particular interest are the fertility plans of young women. The fertility decisions of these women will have a major impact on fertility in Honduras over the next few years. While ideal family size was not much greater for women 20-24 (3.2) than for women 15-19 (3.0), there were some important differences when these data were examined by marital status. Data on ideal family size for women in the two youngest age groups according to residence and marital status are shown in Table IV A 4. Ever married women reported a higher ideal family size than women who were single; a difference of 0.3 children for women 15-19 and 0.6 children for women 20-24. When ideal family size was examined controlling for residence, however, the differences were usually attenuated. This is because marriage occurs earlier in rural areas so that the rural group includes a disproportionate share of rural married. While women in urban areas want about 2.5 - 3.0 children, women in rural areas generally want at least 3.0 and usually 3.5 or more.

B. Contraceptive knowledge, use and source

1. Introduction

In 1983 the Ministry of Public Health initiated a family planning program as a component of its Maternal and Child Health Division. Honduran policy-makers view family planning as the right of the individual to choose the number of children desired, free of imposition or coercion; family planning

is also viewed as a means to improve maternal and infant survival. The general objectives of the program are as follows:

- Promote and offer family planning services to decrease maternal and child morbidity and mortality.
- Contribute to fertility regulation with the development of information, education and communication (IEC) programs.
- Decrease the incidence of illegally induced abortion by increasing the use of family planning.

In 1984, family planning services were being delivered at regional and area hospitals, CESAMOs (urban health centers) and CESARs (rural health centers). At the community level, some methods and educational activities were offered.

Because of the resources necessary to perform sterilization and to treat infertility, these specific activities were carried out only in hospitals. CESAMOs offer oral contraceptives, IUD insertion and barrier methods, while CESARs offer only oral contraceptives and barrier methods.

The program has established as high priority the provision of methods to poor women, women less than 35, and women who are postpartum, postabortum or at high risk for other reasons.

The Honduran Family Planning Association (ASHONPLAFA) was the first Honduran agency to offer family planning services and began operation in 1963 with a two-fold mission: first, to provide the population with information and counseling in sex education and family planning, using

responsible parenthood as its guiding theme; and secondly, to provide contraceptive methods through the establishment of clinics, a community-based distribution (CBD) program, and a voluntary sterilization program.

ASHONPLAFA maintains two clinics, one each in Tegucigalpa and San Pedro Sula where IUDs are inserted, oral contraceptives prescribed, barrier methods made available, and referrals made for male and female sterilizations. Laboratory facilities are available for blood and urine exams, pregnancy tests and pap smears. Besides the provision of these services, occasional home visits are made to motivate women and frequent discussion groups are held at the clinics and in the community. ASHONPLAFA has developed information dissemination programs aimed at community and national leaders (PIPOM).

In 1975 ASHONPLAFA initiated an urban based CBD program in Tegucigalpa and San Pedro Sula. A year later, the program was extended to other communities. The program has grown substantially since its inception. In 1978 there were 414 distributors and at the time of the MCH/FP 1984, there were 1096 distribution points serving 744 communities. The distributors work out of their homes or small shops and are supervised by promoters who visit the distributors once every three months.

Distributors may sell as many as six different products, including two standard-dose brands of oral contraceptives, a low-dose brand, foaming tablets, aerosol foam and condoms. As of early 1985, the CBD program was serving 42,561 active users, 94% of whom were using oral contraceptives.

ASHONPLAFA'S voluntary sterilization program is carried out in 16 hospitals most of which belong to the MOH. This program was initiated in 1977, using governmental and private hospitals.

In 1981, ASHONPLAFA started the Social Marketing Program to increase knowledge and use of contraceptive methods through the use of commercial establishments authorized by the Law of Pharmacies and Health Stores which sell orals and condoms. In support of its activities, advertising campaigns have been developed to promote its products.

2. Results

a. Contraceptive knowledge

One of the goals of the Honduran Family Planning Program has been to increase women's knowledge of contraceptive methods through information, education and communication programs.

During the interview all women were read a list of contraceptive methods and were asked if they had ever heard of each method. For methods such as withdrawal, colloquial expressions were used or the method was explained. The methodology used for the 1981 survey was to ask women to spontaneously list methods known, and for those methods not mentioned, knowledge was prompted with the question, "Have you ever heard of this specific method?"

The percentage of women who reported that they had heard of any particular method of contraception was almost unchanged over the period of the two surveys (Table IV B 1). Knowledge of clinical methods (orals, female

sterilization and the IUD) was high; over 75% of women had heard of each of these methods in each of the two surveys. Knowledge of spermicides was lower. The only methods for which there was a reported increase in knowledge were vasectomy and withdrawal. In the case of withdrawal, this may have more to do with differences in questionnaire design or interview techniques than with any real increase in knowledge. The reported increase in knowledge was highest for vasectomy. While this method is rarely used in Honduras, perhaps the increase in knowledge is an indication of growing interest in it.

While knowledge of methods was higher in urban (it is not very different in Teg/SPS as compared with other urban areas) than in rural areas, for the most well known methods, the difference was minimal (Table IV B 2).

b. Current and ever use of contraceptives

Table IV B 3 shows for each contraceptive method, the percentage of women in union who have no knowledge of it, and for those who have knowledge, previous and current use. For example, 5% of women in union have never heard of the pill, 55% have heard of it but have never used it, 27% have used it previously and 13% are currently using it. Because oral contraceptives are the most widely used method in Honduras, a later section is devoted to studying the reasons for the high discontinuation rate and the contraceptive choices made by discontinuers.

One of the most important objectives of the survey was to provide information on current use of contraception. These data are presented in Table IV B 4. At the time of the survey, 35% of women in union said that they were currently using contraception (in the last 30 days). The two most prevalent methods

were oral contraceptives and female sterilization. Contraceptive use was highest in the cities of Tegucigalpa and San Pedro Sula and lowest in rural areas. While oral contraceptives were the most prevalent method in urban areas, sterilization was the most prevalent method in rural areas.

Table IV B 5 presents information from the 1981 and 1984 surveys on current contraceptive use by residence. Over the period 1981-84, the percentage of women who were contracepting increased from 27% to 35%. Almost half of this increase (43%) was accounted for by the increase in the prevalence of female sterilization. Use of the pill increased by only one percentage point so that in 1984, use of female sterilization and orals was about equal. Because of the increase in the use of female sterilization, a separate section of this chapter is devoted to discussing its determinants and potential demand. Use of the IUD and of rhythm increased by similar amounts and accounted for most of the remaining increase in contraceptive use.

The increase in contraceptive use was much higher in rural than in urban areas; while contraceptive use increased by 3.5 percentage points in urban areas it rose by almost 8 percentage points in rural areas resulting in a 50% increase in contraceptive prevalence in the region. In rural areas, the use of sterilization almost doubled while the increase in use of the pill was much smaller. In urban areas, use of oral contraceptives declined while use of the IUD and of sterilization increased.

Table IV B 6 presents data on contraceptive use by age. The prevalence rate among women 15-19 was only 13%. As shown earlier, a high percentage of women in this group were pregnant or trying to get pregnant. It was considerably higher among women 20-29 and highest among women 30-39. It declined for women

40-44 who had a rate similar to that of women 20-29. The method chosen by women varied with age. Among women under 30, the pill was the most prevalent method whereas among women 30 or older, sterilization was the most important method. The percentage of women who have been sterilized showed a sharp increase for women 30 and above. This may be related to age and parity criteria for sterilization which until recently specified that a woman should be at least 30.

The relationship between number of living children and contraceptive use was shown in Table IV B 7. Since age and number of living children are strongly associated, the relationship between number of children and contraception was similar to that between age and contraception. Contraceptive use was very low for women with no children, increased sharply for women with one child and increased further for women with two and three children and then declined for women with large families. A high percentage of women with none or one child were pregnant or trying to get pregnant; thus contraceptive use is low for these groups. The pattern of contraceptive use was very different between families with two children and those with three or more with the prevalence of sterilization substantially higher for women with at least three children. As with age, this finding may be related to age-parity guidelines for sterilization which specify that a woman have at least three children. But it is also related to ideal family size; most women want at least 3 children so that demand for sterilization will be low for women with fewer than three children.

Table IV B 8 provides information on contraceptive use among women in union by education. Contraceptive use showed a positive association with education; women with seven or more years of education were about three times as likely to be using contraceptives as were women with no education. Use of most

methods was positively associated with education although this relationship was much stronger for some methods (IUD, orals, rhythm) than for others (female sterilization). However, the higher a woman's education the more likely she was to be a resident of an urban area so that some part of the association between education and contraceptive use may be attributed to residence.

Table IV B 9 shows the relationship between education and contraceptive use controlling for residence. While controlling for residence attenuates the relationship between contraceptive use and education, the relationship between contraceptive use and education remained strong. Within residence categories, women who had completed primary school or better were far more likely to be using contraception than were women who had not completed primary school. Also, within education groups, contraceptive use decreased when comparing the larger urban areas to rural areas. The percentage of women using orals in the country as a whole was 13%, for residents of urban areas with four years of education or more, it was over 20% while for women in rural areas who had not completed three years or less it was only five percent.

Over time, educational attainment in Honduras as well as in many developing countries is increasing. Consequently younger women have completed more schooling than have older women. Table IV B 10 presents information on contraceptive use by education standardizing for age. While rates of use were largely unaffected by the standardization, the method mix for the standardized rates was different from that of the unstandardized rates (see Table IV B 8). The relationship of education with sterilization becomes stronger while that with orals becomes weaker.

Table IV B 11 provides information on contraceptive use for countries in Central America in which either a World Fertility Survey (WFS) or a Contraceptive Prevalence Survey (CPS) was conducted. Only Guatemala has a significantly lower percentage of women using contraception. Contraceptive use today is probably higher in El Salvador than in Honduras; it increased over the period 1975-78 and has probably continued to increase. While sterilization has accounted for half of the increase in contraceptive use in Honduras over the period 1981-84, the prevalence of sterilization is lower only in Guatemala.

c. Source of contraception

One of the most important goals of the survey was to determine where women had received their contraceptives. This information is needed to determine how well programs are doing in providing services. In countries in which services are available from different sources, it is important to design questions that can distinguish one source from another. This was particularly important in Honduras where the respondent may not be able to name the source or may name it incorrectly but can provide information to correctly establish the source. Some examples follow.

At the time of the survey, auxiliary nurses at health centers worked as distributors in the community based distribution (CBD) program. Women who received their contraceptives at health centers from an ASHONPLAFA distributor may have identified the source as the health center whereas in reality it is the CBD program. Information on brand and price can be used to supplement the information on the source named or declared to determine the correct or

attributed source. ASHONPLAFA charges for contraceptives whereas the MOH does not; there is a fee for the visit to a CESAMO but not to a CESAR; nevertheless, there is no fee for contraceptives at either type of health center. Also, there are differences in the brands made available at the MOH and ASHONPLAFA, but some overlap does exist; for example, ASHONPLAFA and the MOH both supply Noriday but only ASHONPLAFA supplies Norminest.

Sterilization is provided at both MOH and private hospitals through agreements with ASHONPLAFA. All sterilizations performed at MOH hospitals should be attributed to the MOH and to ASHONPLAFA whereas sterilizations carried out at private hospitals may or may not be funded through ASHONPLAFA. Since ASHONPLAFA provides sterilization at subsidized prices, information on price paid can be used to determine if the source is private or ASHONPLAFA.

Table IV B 12 provides information on declared (source named by the respondent) and attributed source (source credited with making available the contraceptive) for the two main methods: oral contraceptives and sterilization. After taking into consideration price and brand to determine the attributed source, the percentage of women who got their oral contraceptives from ASHONPLAFA increased from 37% to 52%. About half of the increase came from the private sector; ASHONPLAFA's Social Marketing Program in March of 1984 initiated sales of the oral contraceptive, Perla, which is available at a price lower than that of the commercial pills. Sales of Perla are attributed to ASHONPLAFA in Table IV B 12. Also some women purchased pills from a CBD distributor working at a store and these sales are also attributed to ASHONPLAFA. Most of the remaining increase in ASHONPLAFA's share of the market comes from the MOH. These are generally sales at health

centers by ASHONPLAFA distributors. However, ASHONPLAFA personnel no longer sell oral contraceptives at the health centers.

Although the private sector was the declared source for 35% of sterilizations, at least 14% in the private sector should be attributed to ASHONPLAFA since the price charged is within the range of ASHONPLAFA's prices. Also for another 12%, price information was not available and some of these may have been provided by ASHONPLAFA. Including sterilizations at the Social Security hospitals, over three-quarters of sterilizations were provided through the non-commercial sector.

Table IV B 13 provides information for orals and sterilization on attributed source by residence. In all residence groups, ASHONPLAFA was the major provider of oral contraceptives. The second most important source in urban areas was the private sector and in rural areas, the Ministry of Public Health. While the MOH and ASHONPLAFA accounted for the majority of sterilizations, the Honduran Institute for Social Security was an important source in Teg/SPS, and the private sector an important source in all other urban areas. Because only the private sector charges other than a minimal fee, women in other urban areas probably pay the most for sterilization.

d. Travel time

In order to obtain more information about accessibility of contraceptives, women were questioned about transportation to source of supply. Table IV B 14 presents data on the distribution of travel time (<30 minutes, <1 hour, 1 hour or more) for the three main clinical methods for the three residence groups. Women sterilized during hospitalization for delivery were excluded from this

table; since they were already hospitalized their travel time is zero. If, however, they decided to come to a hospital in order to get sterilized, then they incurred a real travel cost. While we did not obtain information on which was most important in choosing a hospital - delivery or sterilization - it is likely that the hospital selected would have been the same whether or not she was sterilized.

Women who used oral contraceptives spent the longest time travelling to the source of supply but there was no consistent difference between users of the IUD and of sterilization. In general, for all methods, women in Teg/SPS spent the least time travelling and women in rural areas the most time.

e. Non-use of contraception

All women who were not contracepting were asked the reason why they were not using family planning. This information is needed in determining which women are likely to be future users and what can be done to encourage women to contracept. In all three residence groups, Table IV B 15 shows that about 80% of the women were not contracepting for reasons related to pregnancy, fecundity and sexual activity. This group included women who said that they were not sexually active, that they were pregnant or desired pregnancy, were menopausal or subfecund (sexually active but had not been pregnant in the last three years and no contraception had been used). Breastfeeding was considered a reason for not contracepting only if the woman said this was the reason she was not contracepting or she said that she could not get pregnant because she was breastfeeding.

Over 60% of the women said that they were not contracepting because they were pregnant, postpartum/breastfeeding or they wanted to get pregnant. These women are future potential users of contraception. The 12% of women who were subfecund/menopausal, on the other hand, will not need contraception. Some of the 3% of the women who said they were not sexually active will resume sexual activity and become potential users.

Of the remaining 20% of women, reasons given included fear or negative experiences with contraception, lack of knowledge, opposition of partner and general dislike. Women in rural areas were more likely to cite lack of knowledge or partner's opposition than were women in urban areas.

Non-contraceptors were also asked if they were interested in using contraceptives in the future. Table IV B 16 presents data on the percent interested in using family planning for fecund women not currently contracepting. Over 75% said that they were interested. Interest was higher in urban than in rural areas, higher among women 34 or younger, and among women with at least four years of primary education completed.

Women who were sexually inactive, pregnant or postpartum were the most likely to say that they were interested in using contraception; women who gave reasons unrelated to pregnancy, desire for pregnancy or sexual activity were the least likely to be interested. Previous users of contraception were more likely to say they wanted to contracept again than were women who had never contracepted. The reasons women gave for not contracepting and their contraceptive history provide important information on which groups of women are likely to use contraception and which will require special recruiting and counseling efforts.

Women who said that they were interested in using contraception were asked what method they would like to use (Table IV B 17). The two most frequently mentioned methods were orals and female sterilization, the two most prevalent methods. The source at which methods would be obtained that was most frequently mentioned was the MOH.

f. Unmet need

Family planning programs have as a goal the channeling of their activities to women who are in need of but not using contraceptives. Various definitions of unmet need have been used including the percentage of married women who do not want more children and who are not using a method (2). The percentage is reduced if unmet need is limited to women who are not pregnant or subfecund and further reduced if women in their first 12 months of breastfeeding are excluded. The percentage will increase if women who want more children but not immediately and are not contracepting are included.

Figure IV B 1, which shows how unmet need is determined, is modified from a diagram used for Thailand (3). Women who are currently using contraception are clearly not in need of contraception. Women who are pregnant or who cannot get pregnant, at least at this time, because they are amenorrheic, subfecund or not sexually active are not in need, although some of them will eventually be in need. The remaining women may be classified according to whether they desire and, if so, when they desire an additional pregnancy. Women who have uncertain fertility desires are classified as not in need. Women who want to get pregnant in the next few months are clearly not in need. The remaining women are either in need because they want more children but do

not desire pregnancy now (spacers) or they do not want additional children (limiters).

Of currently married women 15-44, 14% were in need of contraception: 5% had an unmet need for spacing and 9% had an unmet need for limiting. Table IV B 18 presents information on unmet need according to selected characteristics and residence. The percentage of women with unmet need was lowest in Teg/SPS and highest in rural areas. Unmet need was unrelated to age except that women 40-44 were more likely to be classified as in need than were younger women. This relationship occurred only in rural areas. Even though older women may have had a recent pregnancy or said that they were not menopausal, they may think pregnancy is less likely because they are older. Unmet need was generally twice as high among women with 0-3 years of education as among women with 4 or more years of education. This relationship was present in all residence groups.

Unmet need was lowest for women with no children and highest for women with six or more children but unrelated to family size for women with 1-5 children. Contraceptive use was low among women with no children, but need was also low because a high percentage of these women were pregnant or trying to get pregnant.

Using the definition of unmet need specified above, women who are breastfeeding may be in need if their menses has returned. Women who were breastfeeding were more likely to be in need (19%) than were women who breastfed but had stopped (14%) and this group, in turn, was more likely to be in need than women who never breastfed or did not have a live birth recently (7%). The difference in need between women currently breastfeeding and those

who breastfed but stopped was greatest in Teg/SPS. Women who breastfeed even if they have started menstruating may mistakenly believe that they can not get pregnant. Also, such women may be reluctant to use oral contraceptives because the use of combined oral contraceptives interferes with breastfeeding.

The reasons given for not contracepting for women in need of contraception are presented in Table IV B 19. Over 20% said they were postpartum or breastfeeding but they also responded positively that they were menstruating. Such women are in need although they are unaware that they should be using contraception.

The distribution of women in need according to selected characteristics is presented in Table IV B 20. Distributions are presented separately according to whether the woman wants more children. For purposes of comparison, the distribution of all women in union for each selected characteristic is also presented. Women in need were more likely to be rural residents, to have had no education, to be age 40 or older, or to have six or more children than were women in the general population. However, the characteristics of women in need differ according to whether they want more children. It can be seen that it is only in the group of limiters that women were more likely to be rural residents, to be older, to have large families and low levels of education in comparison to all women in union. Women who wanted more children were, in fact, younger, had smaller families and were better educated than were women in the general population.

Thus, it may be seen that the older age, lower level of education and higher parity of women in need compared to the general population may be explained by

the dominating influence of "limiters" in affecting the distribution of women in need.

C. Oral Contraceptives

1. Introduction

While oral contraceptives are one of the most popular methods of family planning, they are also one of the most discontinued methods. There is no concern when oral contraceptives are discontinued because women want to get pregnant or because they switch to more effective methods, as they are likely to do if they do not want any more children. However, one of the most frequently given reasons for discontinuing oral contraceptives is side effects and such women may adopt less effective methods of contraception or stop contracepting altogether.

This section explores women's experiences with oral contraceptives including problems experienced, advice sought, and new methods adopted. This information will be useful to program managers concerned with improving continuation rates for oral contraceptives and ensuring that discontinuers of orals who do not want to get pregnant adopt other methods of contraception.

2. Results

Table IV C 1 presents information on various health problems experienced in the last three days, menstrual problems in the last month and the presence of varicose veins for nonpregnant women by age and residence. Also information on smoking is included. These conditions are often cited as contraindications

to or side effects of oral contraceptives. In general, headaches, dizziness, chest pains, vision problems and varicose veins were more often reported by older women; rural residents were more likely than were urban residents to report any problem. Older women were also more likely than were younger women to report that they smoked; smoking was also more prevalent in urban than in rural areas.

In Table IV C 2 the data on health conditions is shown according to method of contraceptive used (orals, other, none) and age. Among women 20-34, users of oral contraceptives were generally the least likely to report that they had any health problems. Either women who had health problems decided not to take the pill or were advised not to do so, or women with health problems stopped using the pill. Also, those women for whom the health problems disappeared were probably the most likely to continue. Among women 35 and over there were few users of orals; however, users of both orals and of other methods were generally less likely or about as likely to report that they had health problems. Even though smoking was most prevalent in the oral contraceptive group, the proportion of women 35 and over using orals was low (about 7%, Table IV B 6).

The next group of tables presents information on oral contraceptive use for women who began to take the pill in 1979 or later. Women who began to take the pill earlier are excluded because they are more likely to have forgotten the circumstances surrounding their initial use of it. Table IV C 3 presents data on the women's ages when they first started to use the pill and on the place they obtained it. Over 80% of the women were under 30 when they adopted the pill and over 50% were 24 or less. Women in rural areas were slightly older when they started to use the pill. About two-thirds of women obtained

their first cycle in the non-commercial sector with this proportion highest in rural areas and lowest in Teg/SPS.

Less than one third of ever users of orals reported that they had a medical exam before they started to use the pill (Table IV C 4). Women who lived in Teg/SPS and who got their pills from the non-commercial sector were the most likely to have had a medical exam. Women who purchased pills in the commercial sector and were residents of rural areas were the least likely to have had a medical exam. The greater access to medical resources in urban areas combined with the requirement of a medical exam in some parts of the non-commercial sector help to explain these differences.

Table IV C 5 presents information on the percentage of women who ever experienced problems that they associated with the pill, and of these, the percentage that sought medical attention. Almost half of ever users of the pill said that they had experienced problems. The percentage of women who experienced problems was highest in urban areas outside Teg/SPS but was not associated with level of schooling, age of the woman when she began to take the pill or where she obtained it. About 40% of women who experienced problems sought medical attention. Women in Teg/SPS and women in the highest education group were the most likely to seek attention. Such women have the greatest access to and ability to afford private care. However, as discussed below, the MOH is an important source of care and the charge for service is minimal (about US \$.50). Neither age when the woman began to take the pill nor the place that she got her initial supplies affected whether or not she sought attention.

Women who sought help were most likely to go to a MOH facility or to a private physician (Table IV C 6). In urban areas they were most likely to go to a private physician although MOH facilities were a close second. In rural areas, over 75% of women went to a MOH facility. These choices, of course, reflect the different health facilities available in each of the regions.

Women who sought help were more likely to continue to contracept than were women who didn't seek help (Table IV C 7). Half of the women who didn't seek medical attention reported that they stopped contracepting when they experienced problems; in comparison, one-third of women who sought attention stopped contracepting. Also, women who sought help were less likely to continue with the same brand of pills and more likely to switch brands and methods. The type of advice women got affected what decision they made although they may have interpreted the advice in light of the action that they decided to take. The most frequently given advice was to change methods (36%) or to change brands (30%). Only 18% of the women reported that they were advised to continue using the same pill; apparently health workers generally advise women to try something else, either another pill or another method, rather than trying to encourage them to persevere with the same pill when they experience problems. When women disregarded the advice given they generally quit using contraception altogether.

Table IV C 8 shows the current contraceptive use of ever users of orals by whether they experienced problems, and if so, according to whether they sought attention. Of ever users, 58% were currently contracepting and 44% were using oral contraceptives. Women who experienced side effects were less likely to be contracepting and to be using orals than were women who did not experience side effects. Some women who experienced side effects switched to other

methods of contraception including both modern and traditional methods but the contraceptive use of this group was still far below that of women who did not experience problems. Women who sought medical attention were more likely to be using contraception than were women who did not seek attention although they were less likely to be using contraception than were women who did not experience problems. Women who sought attention were the most likely to be using the IUD and female sterilization, methods that require a visit to a physician.

Women who had stopped using the pill were asked the reason why they discontinued. These data are presented in Table IV C 9 for women who were no longer contracepting. The reasons women gave differed strongly according to whether or not the woman said that she had experienced problems. Among women who had experienced problems, 69% said that they stopped because they felt bad or had medical reasons for stopping. Only 4% of women who did not experience problems gave this as a reason for stopping. The most frequently given reason for the group who reported no problems was "wanted more children". Another 11% said that the method failed; whether the method failed or women used the method incorrectly and it failed is not known.

D. Female Sterilization

1. Introduction

As discussed earlier, the increase in female sterilization accounted for 50% of the rise in contraceptive prevalence over the period 1981-84. It is the second most prevalent method of contraception ranking just behind oral contraceptives in use.

Age and parity guidelines for sterilization have recently been eased. In 1980, although there were no written requirements, women who were at least 30 years of age and had 3 or more living children were generally considered acceptable candidates for sterilization. In 1984, requirements for sterilization were changed: women aged 24-29 who have three or more children are now eligible as are women 35 or older with one or two children. Women not meeting these criteria, however, may qualify on other grounds, including the mental and physical well being of the woman. This change in requirements should increase the demand for sterilization. Efforts on the supply side have included, as discussed earlier, new facilities and training programs of the Ministry of Public Health, the Honduran Institute for Social Security and ASHONPLAFA. In view of the current and increasingly important role of sterilization in Honduras, this section considers additional questions concerning its use including user satisfaction and the potential demand for surgery.

2. Results

Table IV D 1 presents information on both the characteristics of women who have been sterilized and for all currently married women. Sterilized women, as expected, are both older and of higher parity than are married women in the general population. Notwithstanding the age-parity guidelines, 40% of sterilized women were under 30 at the time of surgery and 7% had fewer than 3 children.

Over 75% of sterilized women were sterilized in the 5 years previous to the survey (1979-1984). These data are in agreement with service statistics provided by ASHONPLAFA which show that small numbers of sterilizations were performed in 1977, which was the first year of the program. There was a

substantial increase in 1978 but the number for that year was still considerably below the number of surgeries performed in 1979 and later.

Of women who had been sterilized, 41% were sterilized at the same time that they were hospitalized for their last delivery; the remaining women were sterilized during some subsequent hospitalization (Table IV D 2). Of the women sterilized during hospitalization for delivery, 56% had vaginal and 44% had cesarean deliveries. The percentage of women sterilized subsequent to delivery was higher outside Teg/SPS; this is to be expected as home deliveries are higher outside the country's two largest cities and women who deliver at home must obtain interval sterilizations. The same relationship occurred between education and timing of sterilization probably because better educated women live in urban areas.

Women sterilized before 1979 were most likely to be sterilized at delivery. A high percentage of these women were sterilized before the ASHONPLAFA program had begun or during its initial stages so that the number of hospitals providing interval sterilizations was low. Furthermore, some of the women who were sterilized at delivery or had interval procedures in the 1970s were too old to be included in this survey.

Women who did not meet the parity guideline or even those who had exactly three children were more likely to be sterilized concurrently with a cesarean delivery than were women with larger families. Women with small families were probably most likely to have had medical indications for sterilization. Among women who met the parity guideline, the distribution of women according to type of delivery and timing of sterilizations was similar for women in both age

groups. If the parity guideline is met, medical indications apparently have little impact on sterilization.

Because of concern not only in Honduras but also internationally that women may be coerced into getting sterilized, we asked women a series of questions concerning why they had decided to be sterilized, who had influenced their decision and if they were satisfied with the outcome of the decision. About half of the women said (Table IV D 3) that the reason they had sought sterilization was that they did not want more children or that socio-economic conditions had influenced their decision. Remaining women cited recommendation of physician, health reasons or side effects of other methods.

About two-thirds of women said that the main person influencing their decision had been themselves or their husbands; about one-fifth said their physician had been the most influential person (Table IV D 4). Since some sterilizations are done for medical reasons, it is not surprising to find that for a significant percentage, the physician plays the major role in the decision to be sterilized. Among women who had cesarean deliveries, 54% said that the physician was the main person influencing their decision (data not shown). This finding supports the argument that the physician will play an important role in the decision to choose sterilization in situations in which health factors predominate.

Over 85% of the women said that they discussed their plans with their husband; about 5% of husbands were opposed. About 9% of women said that some other person was opposed to their decision. Greater than 90% of the women said that they were satisfied with the sterilization and almost 60% had recommended the method to another person (Table IV D 5). Of the women not satisfied with their

decision to get sterilized, 45% cited subsequent health problems as their primary reason and 27% the desire to have another child.

Tables IV D 6 and IV D 7 provide information on demand for sterilization. This information is important in determining the need for new facilities and for training of health personnel and for designing IEC campaigns. To be interested in sterilization a woman must first report that she no longer wants additional children. (Since desire for additional children is more difficult to assess for pregnant women, these women are excluded from the following tables.) Of non-sterilized women, 45% want additional children, about 4% were unable to say whether they wanted more children and the remaining half reported that they did not want more children (Table IV D 6). Of women who reported that they did not want any more children, about 40% said that they had already experienced an unwanted pregnancy (20.7%/30.5%+20.7%).

The percentage of women who reported both that they did not want any more children and that they didn't want their last pregnancy was lowest in Teg/SPS and highest in rural areas. This percentage increased with both age and number of living children. When women are categorized according to both age and number of living children, it can be seen that while the highest percentage of possible sterilizations may be found in the group of women previously eligible (age \geq 30, living children \geq 3), there are women previously ineligible under the guidelines who will now be eligible. This includes most of the women under 30 with at least 3 children, almost 60% of whom said that they did not want more children.

About 10% of women said they were interested in getting sterilized "now" and 54% said that they would be interested in the "future" (Table IV D 7).

(Unfortunately, the question was not phrased with respect to any particular time period.) Interest, in general, ("now" or "in the future") was highest in other urban areas while interest now was lowest in rural areas. While age was associated with interest (but not interest now), neither education nor number of living children was associated with interest. (The influence of age on interest is also seen in the relationship between the age-parity variable and interest.) Among women with four or more children, over one-third were not interested. Women who did not want their last pregnancy were more likely than were women who wanted it to say that they were interested in sterilization now although there were no differences in percent ever interested (now or in the future). About 36% of women who had already experienced at least one unintended pregnancy were not interested.

Women who said that they were interested now were asked where they would go to get information about sterilization (Table IV D 8). Only 74% could name a source; the most important source named was the Ministry of Public Health.

The primary reason given for not getting sterilized among women who were interested in sterilization was that they could not afford the operation (Table IV D 9). Of second most importance was that the physician had refused to sterilize them on the basis that they were either too young or had too few children. Fear of the operation was the third most frequent reason given.

As shown in Table IV D 10, the most important reason given for lack of interest was fear of dying (49%) with this reason most important in rural areas. Women with the most education (>7 years) were least likely to give fear of dying as the main reason for lack of interest (Table IV D 11).

Family Planning References

- 1- Westoff, C.F. The Decline of Unplanned Births in the United States, *Science* 191(1976):38.
- 2- Westoff C.F., and Pebley A.R. "Alternative Measures of Unmet Need for Family Planning in Developing Countries," IFPP, vol. No. 4, Dec. 1981.
- 3- Kamnuansilpa P. and Chamratrithirong: Contraceptive Use and Fertility in Thailand: Results from the 1984 Contraceptive Prevalence Survey. National Family Planning Program, Ministry of Public Health. Bangkok, Thailand, 1985.

Table I 1

Number of Census Sectors, Households per Sector and Estimated Households in the EDENH-II and MCH/FP 1984 and Weighting Factors for the MCH/FP 1984 by Residence

Honduran MCH/FP Survey, 1984

Residence	Sectors	EDENH-II 1983		MCH/FP 1984			Weighting Factors
		Households per Sector	Estimated Households	Sectors per Sector	Households Estimated	Households	
Teg/SPS	154	18	2772	93	18	1674	1.656
Other urban	126	18	2268	76	18	1368	1.658
Rural Teg/SPS	12	18	216	8	18	144	1.5
Other rural	145*	46	6670	98	23	2254	2.959
Total	438	--	12026	275	--	5440	--

*147 originally planned

100

Table I 2

Distribution of Results of Household Visits by Residence

Honduran MCH/FP Survey, 1984

Result	Total	Residence		
		Teg/SPS	Other Urban	Rural
Interview completed	83.5	84.8	82.9	83.2
Residents absent	3.8	2.7	3.7	4.2
Refusals	0.4	1.0	0.2	0.2
Vacant household	6.8	5.9	5.8	7.5
Other	5.6	5.6	7.4	5.0
Total	100.0	100.0	100.0	100.0
No. of Cases	(5771)	(1753)	(1471)	(2547)

Observations for this table and all that follow:

- 1) Numbers in parentheses are unweighted, however, percentages are based on weighted numbers.
- 2) Due to rounding, the sum of percentages does not always equal 100.
- 3) The sum of the subcategories does not always equal the total due to cases with incomplete information.

Table 1 3

Distribution of Households Visited by Source of Water, Waste
Disposal and Electricity by Residence

Honduran MCH/FP Survey, 1984

Type of Service	Total	Residence		
		Teg/SPS	Other Urban	Rural
<u>Source of Water</u>				
Faucet inside the home	25.1	52.5	38.9	9.4
Faucet outside home but on the property	33.7	36.6	41.4	30.0
Faucet outside the property	9.1	7.9	12.0	8.6
Well	17.7	2.0	3.6	28.8
Other*	14.3	1.0	4.2	23.1
Total	100.0	100.0	100.0	100.0
<u>Waste Disposal</u>				
Toilet	30.9	80.2	45.2	6.2
Outhouse	32.9	14.7	40.8	37.6
None	36.1	5.0	13.9	56.1
Other	0.1	0.1	0.2	0.1
Total	100.0	100.0	100.0	100.0
<u>Electricity</u>				
Yes	44.4	95.4	76.6	13.1
No	55.6	4.6	23.4	86.9
Total	100.0	100.0	100.0	100.0
No. of Cases	(4818)	(1482)	(1220)	(2116)

*River, lake, stream, etc.

Table I 4

Distribution of Inhabited Households by Source of Water,
Waste Disposal, Electricity, and Residence in the
EDENH-II 1983 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Type of Service	EDENH-II 1983			MCH/FP 1984		
	Total	Urban	Rural	Total	Urban	Rural
<u>Source of Water</u>						
Faucet inside the home	20.3	43.1	3.8	25.1	46.3	9.4
Faucet outside the home	38.3	43.2	34.7	42.8	48.5	38.6
Other	41.4	13.7	61.5	32.0	5.1	51.9
Total	100.0	100.0	100.0	100.0	100.0	100.0
<u>Waste Disposal</u>						
Toilet	30.5	66.1	4.5	30.9	64.4	6.2
Outhouse and other	27.2	23.7	29.7	33.0	26.6	37.7
None	42.3	10.2	65.8	36.1	9.0	56.1
Total	100.0	100.0	100.0	100.0	100.0	100.0
<u>Electricity</u>						
Yes	41.9	84.7	10.7	44.4	86.9	13.1
No	58.1	15.3	89.3	55.6	13.1	86.9
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Cases	(10885)	(4587)	(6298)	(4818)	(2702)	(2116)

Table I 5

Distribution of the Non-weighted Number of Eligible Women by Residence

Honduran MCH/FP Survey, 1984

Eligible Women	Total	Residence		
		Teg/SPS	Other Urban	Rural
0	35.0	30.1	34.3	37.2
1	45.7	41.4	42.0	48.7
2	14.3	20.1	16.2	11.3
3	3.7	6.0	5.2	2.3
4	0.9	1.5	1.8	0.4
5	0.3	0.6	0.5	0.1
6	0.1	0.2	0.1	0.0
7	0.0	0.1	0.0	0.0
Total	100.0	100.0	100.0	100.0
No. of Cases	(5771)	(1753)	(1471)	(2547)

Table I 6

Distribution of Non-weighted Results of Interview with Eligible Women
by Residence

Honduran MCH/FP Survey, 1984

Result of Interview	Total	Residence		
		Teg/SPS	Other Urban	Rural
Completed	86.0	89.9	85.8	87.9
Incomplete	10.2	8.1	12.7	10.4
Refusal	0.6	1.1	0.4	0.2
Other	1.2	0.9	1.0	1.6
Total	100.0	100.0	100.0	100.0
No. of Cases	(5454)	(1932)	(1470)	(2052)

Table I 7

Distribution of Women by Age Groups and Residence
in the ENPA 1981, EDENH-II 1983 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Age	ENPA 1981			EDENH-II 1983			MCH/FP 1984		
	Total	Urban	Rural	Total	Urban	Rural	Total	Urban	Rural
15-19	25.7	28.2	23.8	26.5	27.4	25.5	25.6	26.9	24.3
20-24	22.7	25.2	20.7	22.5	23.4	21.6	22.2	24.0	20.4
25-29	16.9	17.5	16.4	17.1	17.3	16.9	17.7	17.6	17.8
30-34	13.1	11.7	14.3	13.4	13.4	13.4	13.9	12.4	15.4
35-39	11.4	8.6	13.6	11.5	10.6	12.3	11.5	11.1	11.8
40-44	10.2	8.8	11.2	9.1	7.9	10.2	9.1	8.0	10.3
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(3377)	(1299)	(2078)	(13179)	(6479)	(6700)	(4805)	(3000)	(1805)

Table I 8

Distribution of Women by Education and
Residence in the EDENH-II 1983 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Education	EDENH-II 1983			MCH/FP 1984		
	Total	Urban	Rural	Total	Urban	Rural
None	17.2	7.3	26.7	15.5	7.6	23.1
Primary 1-3	26.0	15.6	36.0	26.9	17.5	36.0
Primary 4-6	31.6	32.3	30.9	33.7	32.9	34.6
>7 years	25.3	44.8	6.4	23.9	42.0	6.4
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(13168)	(6469)	(6699)	(4805)	(3000)	(1805)

Table I 9

Percentage of Women Currently in Union by Age Groups and
Residence in the ENPA 1981, EDENH-II 1983, and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Age	ENPA 1981			EDENH-II 1983			MCH/FP 1984		
	Total	Urban	Rural	Total	Urban	Rural	Total	Urban	Rural
15-19	23.7	14.7	31.9	18.5	11.1	26.1	20.8	12.9	29.2
20-24	54.7	40.5	68.2	51.3	39.0	64.2	53.5	43.4	64.9
25-29	76.2	63.9	86.5	68.5	58.7	78.3	74.0	64.6	83.0
30-34	84.5	80.2	87.0	74.2	66.8	81.3	79.4	72.7	84.6
35-39	80.2	67.7	86.4	76.8	70.4	82.1	79.6	72.9	85.6
40-44	80.1	77.7	81.7	72.0	65.1	77.1	76.9	71.5	80.9
Total	59.8	47.6	69.2	53.4	43.9	62.7	57.5	48.1	66.6
No. of Women	(3377)	(1299)	(2078)	(13179)	(6479)	(6700)	(4805)	(3000)	(1805)

Table I 10

Mean Age of Women at Union by Age at the Time of Interview,
Education and Residence in the ENPA 1981 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Age and Education	ENPA 1981			MCH/FP 1984		
	Total	Urban	Rural	Total	Urban	Rural
Total*	18.1	18.8	17.7	18.5	19.1	18.0
<u>Age</u>						
15-19	15.6	15.7	15.6	15.8	16.1	15.7
20-24	17.0	17.7	16.5	17.8	18.1	17.5
25-29	18.4	19.2	17.8	18.6	19.6	17.7
30-34	18.6	19.1	18.2	19.1	19.6	18.7
35-39	18.7	19.9	18.1	19.2	19.3	19.2
40-44	19.0	19.8	18.6	19.5	20.5	18.8
<u>Education*</u>						
None	17.4	17.2	17.5	17.8	18.2	17.6
Primary 1-3	17.8	18.1	17.7	18.1	18.2	18.1
Primary 4-6	18.1	18.4	17.7	18.2	18.5	17.9
Secondary 1-3	18.9	19.2	17.6	19.1	19.0	19.5
Secondary 4-6 and university/ superior	21.5	21.5	21.6	21.5	21.5	21.2
No. of Women	(2643)	(1001)	(1642)	(3335)	(1930)	(1405)

*Women aged 45-49 are included in the denominator of the ENPA 1981.

Table II 1

Mean Number of Children Ever Born by Age in the ENPA 1981,
EDENH-II 1983 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Age	ENPA 1981	EDENH-II 1983	MCH/FP 1984
15-19	0.3	0.2	0.2
20-24	1.5	1.4	1.4
25-29	3.1	2.9	3.0
30-34	4.6	4.2	4.4
35-39	6.1	5.7	5.6
40-44	7.0	6.5	6.6
Total			
Not standardized	3.0	2.7	2.8
Standardized*	2.9	2.7	2.8
No. of Women	(3377)	(13179)	(4805)

*Standardized by the age distribution of women in the MCH/FP 1984.

Table II 2

Mean Number of Children Ever Born by Age and Residence in the
ENPA 1981 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Age	ENPA 1981		MCH/FP 1984	
	Urban	Rural	Urban	Rural
15-19	0.2	0.3	0.2	0.3
20-24	1.0	2.0	1.1	1.9
25-29	2.2	3.8	2.2	3.8
30-34	3.7	5.2	3.6	4.9
35-39	4.2	6.9	4.6	6.6
40-44	5.4	7.9	5.4	7.5
Total				
Not standardized	2.0	3.7	2.1	3.4
Standardized	2.2	3.4	2.2	3.3
No. of Women	(1299)	(2078)	(3000)	(1805)

Table II 3

Age-specific Fertility Rates by Age and Total Fertility Rate
in the ENPA 1981, EDENH-II 1983 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Age	ENPA 1981	EDENH-II	MCH/FP 1984	
	12 months*	12 months*	12 months*	24 months*
15-19	.1244	.1240	.1157	.1229
20-24	.2999	.2719	.2492	.2682
25-29	.2819	.2540	.2682	.2672
30-34	.2403	.2030	.2006	.1840
35-39	.2301	.1690	.1553	.1672
40-44	.0991	.0833	.0772	.0864
TFR	6.38	5.53	5.33	5.48

*Reference period before the date of interview used in calculating the fertility rate.

Table II 4

Age-specific Fertility Rates Based on the 12 Month Period Prior to Interview
and Total Fertility Rate by Residence in the ENPA 1981 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Age	ENPA 1981 Residence			MCH/FP 1984 Residence		
	Total	Urban	Rural	Total	Urban	Rural
15-19	.1244	.0845	.1632	.1157	.0746	.1611
20-24	.2999	.2172	.3761	.2492	.2038	.2988
25-29	.2819	.2070	.3453	.2682	.2050	.3278
30-34	.2403	.1558	.2970	.2006	.1321	.2530
35-39	.2301	.1165	.2833	.1553	.1193	.1863
40-44	.0991	.0354	.1502	.0772	.0434	.1038
TFR	6.38	4.08	8.08	5.33	3.89	6.65

Table II 5

Age-specific Fertility Rates Based on the 24 Month Period Prior to Interview
and Total Fertility Rate by Residence

Honduran MCH/FP Survey, 1984

Age	Total	Residence		
		Teg/SPS	Other Urban	Rural
15-19	.1229	.0846	.0960	.1609
20-24	.2682	.1799	.2601	.3288
25-29	.2676	.1855	.2235	.3287
30-34	.1840	.1099	.1698	.2252
35-39	.1672	.0855	.1575	.2076
40-44	.0864	.0321	.0582	.1202
TFR	5.48	3.39	4.82	6.86

Table II 6

Fertility and Crude Birth Rates Based on the 24 Month Period
Prior to Interview by Residence

Honduran MCH/FP Survey, 1984

Rates	Residence		
	Total	Urban	Rural
Total Fertility Rate	5.48	4.01	6.86
General Fertility Rate	192	144	239
Crude Birth Rate	37	34	39

Table II 7

Mean Number of Children Ever Born and Children Still Surviving
by Age Group of Women

Honduran MCH/FP Survey, 1984

Age Group of Women	Mean Number of Children Ever Born	Mean Number of Children Surviving	Proportion Dead of CEB
15-19	.246	.228	.073
20-24	1.440	1.327	.078
25-29	3.018	2.737	.093
30-34	4.358	3.921	.100
35-39	5.638	4.898	.131
40-44	6.610	5.614	.151

CEB = Children ever born.

Table II 8

Indirect IMR Estimates* by Age Group of Women
and Time Period of Estimate

Honduran MCH/FP Survey, 1984

Age Group of Women	Time Period of Estimate	IMR Estimates By Model Variant (per 1000)			
		East	South	West	North
20-24	1981	72	71	68	64
25-29	1979	75	75	72	65
30-34	1977	76	76	72	63
35-39	1975	91	91	85	74

*IMR estimates were based on the Trussell model.

Table II 9

Indirect IMR Estimates* by Residence

Honduran MCH/FP Survey, 1984

Age Group of Women	Time Period of Estimate	IMR Estimates Based on the South Model (per 1000)		
		Teg/SPS	Other Urban	Rural
20-24	1981	43	62	82
25-29	1979	42	71	85
30-34	1977	67	68	81
36-39	1975	75	103	91
Percentage Decline (1975-77 to 1978-81)		40%	22%	3%

*IMR estimates were based on the Trussell model.

1/8.

Table II 10

Recent IMR Estimates from Various Sources

Honduran MCH/FP Survey, 1984

Source	Type of Data	Type of Estimate*	Time Period	IMR Estimate
EDENH I	CEB-CS	Indirect	1967-68	127
Census 1974	CEB-CS	Indirect	1968-70	112
EDENH I	Births and Infant Deaths Reported in a Multiround Survey	Direct	1971-72	117
ENPA 1981	CEB-CS	Indirect	1976-78	90
EDENH-II	CEB-CS	Indirect	1978-80	85
MCH/FP 1984	CEB-CS	Indirect	1981	71

CEB = Children ever born

CS = Children surviving

*All indirect estimates were based on the Trussell model.

Table III A 1

Distribution of Women whose Last Delivery Occurred between 1979-1984
by Prenatal Care and Residence

Honduran MCH/FP Survey, 1984

Prenatal Care	Total	Residence		
		Teg/SPS	Other Urban	Rural
<u>Received Prenatal Care</u>				
<u>and With Whom</u>				
Institutional only	37.5	65.3	43.8	25.1
TBA only	18.2	4.6	15.5	24.0
Both	27.5	12.4	24.8	34.0
None	16.6	16.8	15.8	16.7
Unknown	0.3	0.8	0.0	0.2
Total	100.0	100.0	100.0	100.0
No. of Women	(2599)	(756)	(664)	(1179)
<u>Source of Institutional</u>				
<u>Care</u>				
MOH hospital	9.9	6.9	15.8	9.1
CESAMO	34.5	34.4	36.0	34.0
CESAR	22.1	0.2	3.9	39.7
IHSS hospital	8.7	30.3	1.3	0.9
Private hospital, clinic, physician	22.9	27.1	40.8	14.0
Other	1.8	0.9	2.0	2.2
Unknown	0.1	0.2	0.2	0.0
Total	100.0	100.0	100.0	100.0
No. of Women	(1746)	(590)	(456)	(700)
<u>Month of Pregnancy of First</u>				
<u>Institutional Visit</u>				
<3 months	59.4	74.6	65.6	49.5
4-6 months	30.5	20.3	25.7	37.3
7-9 months	9.1	4.7	7.2	11.9
Unknown	1.1	0.3	1.5	1.3
Total	100.0	100.0	100.0	100.0
No. of Women	(1746)	(590)	(456)	(700)

Table III A 2

Distribution of Women whose Last Delivery Occurred between 1979-1984 by
Month of Pregnancy of First Prenatal Visit and Source of Care

Honduran MCH/FP Survey, 1984

Month of Pregnancy	Total	MOH Hospital	CESAMO	CESAR	IHSS Hospital	Private Hospital	Other
<3 months	59.4	57.5	55.7	45.4	79.8	72.8	46.7
4-6 months	30.5	30.2	33.5	42.0	17.2	20.0	30.0
7-9 months	9.1	10.6	10.1	11.2	2.6	6.5	20.0
Unknown	1.1	1.7	0.7	1.4	0.5	0.7	3.3
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(1746)	(175)	(601)	(294)	(194)	(450)	(30)

Distribution of Women whose Last Delivery Occurred between 1979-1984 by Tetanus Vaccination,
Residence, First Live Birth, Prenatal Care, Month of First Prenatal Visit and
Place of Delivery

Honduran MCH/FP Survey, 1984

Characteristics	<u>Tetanus Vaccination</u>			Unknown	Total	No. of Women
	<u>Number of Doses</u>					
	0	1	2 or more			
Total	64.2	12.7	21.8	1.3	100.0	(2599)
<u>Residence</u>						
Teg/SPS	70.1	11.2	16.3	2.4	100.0	(756)
Other urban	69.4	11.1	18.1	1.4	100.0	(664)
Rural	60.3	13.8	25.0	0.9	100.0	(1179)
<u>First Live Birth</u>						
Yes	61.7	13.2	24.2	0.9	100.0	(505)
No	64.8	12.6	21.2	1.3	100.0	(2086)
<u>Received Prenatal Care and Where</u>						
Yes, institutional	49.9	16.9	31.6	1.5	100.0	(1746)
MOH hospital	56.3	13.8	26.4	3.4	100.0	(175)
CESAMO	34.1	22.6	42.1	1.3	100.0	(601)
CESAR	25.8	21.6	52.2	0.4	100.0	(294)
IHSS hospital	76.2	11.1	8.6	4.1	100.0	(194)
Private hospital, clinic, physician	80.7	8.6	9.6	1.1	100.0	(450)
Other	93.2	4.4	0.0	2.4	100.0	(30)
Yes, only with TBA	89.1	6.5	3.8	0.6	100.0	(418)
Never Received	93.5	3.2	3.0	0.3	100.0	(429)
<u>Month of First Institutional Prenatal Visit</u>						
1-3 months	54.0	13.6	30.4	2.0	100.0	(1093)
4-6 months	41.6	20.5	37.0	1.0	100.0	(492)
7-9 months	50.2	26.1	22.8	0.9	100.0	(142)
<u>Place of Delivery</u>						
Institutional	66.6	12.5	19.3	1.6	100.0	(1374)
At home	62.5	13.0	23.8	0.7	100.0	(1221)

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Table III A 4

Distribution of Women whose Last Delivery Occurred between 1979-1984
by Place of Delivery and Residence

Honduran MCH/FP Survey, 1984

Place of Delivery	Total	Residence		
		Teg/SPS	Other Urban	Rural
At Home	55.1	10.6	36.7	77.6
With TBA	41.6	7.1	25.9	59.4
Without TBA	10.6	2.2	6.8	15.0
At TBA's Home	2.8	1.3	3.5	3.2
Other	0.1	0.0	0.5	0.0
Institutional	44.8	89.1	63.3	22.3
MOH hospital	27.6	49.1	37.0	16.5
CESAMO, CESAR	1.2	0.3	3.6	0.7
IHSS hospital	6.7	27.9	1.2	0.6
Private hospital	7.7	10.7	13.2	3.2
Other	1.6	1.1	3.3	1.3
Unknown	0.2	0.3	0.0	0.2
Total	100.0	100.0	100.0	100.0
No. of Women	(2599)	(756)	(664)	(1179)

Table III A 5

Distribution of Women whose Last Delivery Occurred between 1979-1984
by Place of Delivery, Residence and Education

Honduran MCH/FP Survey, 1984

Place of Delivery	Total Education		Teg/SPS Education		Residence		Rural Education	
	<3	>4	<3	>4	Other		<3	>4
					Urban	Education		
At Home	73.5	35.5	20.8	7.0	57.7	24.7	84.2	64.8
With TBA	55.6	26.6	11.4	5.6	43.2	16.1	64.5	49.6
Without TBA	14.9	6.0	6.4	0.7	10.0	5.0	17.1	10.9
At TBA's home	2.9	2.8	3.0	0.7	4.1	3.1	2.6	4.3
Other	0.1	0.1	0.0	0.0	0.4	0.5	0.0	0.0
Institutional	26.3	64.5	78.7	92.8	42.3	75.4	15.5	35.3
MOH hospital	20.4	35.2	56.4	46.4	35.7	37.8	12.2	24.7
CESAMO, CESAR	0.7	1.7	0.0	0.4	2.9	4.0	0.4	1.3
IHSS hospital	2.3	11.3	18.8	31.2	0.0	1.9	0.3	1.2
Private hospital	2.3	13.5	3.5	13.4	3.7	26.5	1.8	5.8
Other	0.6	2.8	0.0	1.4	0.0	5.2	0.8	2.3
Unknown	0.3	0.1	0.5	0.2	0.0	0.0	0.3	0.0
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(1206)	(1393)	(202)	(554)	(241)	(423)	(763)	(416)

Table III A 6

Distribution of Women whose Last Delivery Occurred Institutionally between 1979-1984 by Type of Delivery, Residence, Education, Place of Delivery, Prenatal Care, Parity, Age of Women at Last Delivery and Time Period of Last Birth

Honduran MCH/FP Survey, 1984

Characteristics	Type of Delivery			Total	No. of Women
	Vaginal	Cesarean	Unknown		
<u>Total</u>	89.3	10.7	0.1	100.0	(1374)
<u>Residence</u>					
Teg/SPS	87.5	12.5	0.0	100.0	(673)
Other urban	89.8	10.0	0.2	100.0	(421)
Rural	91.3	8.7	0.0	100.0	(280)
<u>Education</u>					
None	88.7	11.3	0.0	100.0	(114)
Primary 1-3	91.0	9.0	0.0	100.0	(270)
Primary 4-6	92.4	7.4	0.2	100.0	(525)
≥ 7 years	84.2	15.8	0.0	100.0	(465)
<u>Place of Delivery</u>					
MCH hospital	90.0	9.9	0.1	100.0	(816)
IHSS hospital	86.2	13.8	0.0	100.0	(229)
Private hospital	85.9	14.1	0.0	100.0	(248)
CESAMO, CESAR, other	97.9	2.1	0.0	100.0	(81)
<u>Received Prenatal Care Institutionally and When</u>					
Yes, received	87.9	12.0	0.1	100.0	(1095)
< 3 months	87.8	12.1	0.1	100.0	(775)
4-6 months	87.8	12.2	0.0	100.0	(248)
7-9 months	91.8	8.2	0.0	100.0	(62)
No prenatal care	94.2	5.8	0.0	100.0	(279)
<u>Parity</u>					
0-1	85.0	15.0	0.0	100.0	(345)
2-3	88.3	11.7	0.0	100.0	(531)
4-5	91.7	8.0	0.3	100.0	(277)
≥ 6	94.3	5.7	0.0	100.0	(221)
<u>Age of Woman at Last Delivery</u>					
13-17	88.5	11.5	0.0	100.0	(73)
18-34	89.7	10.3	0.1	100.0	(1136)
≥ 35	87.1	12.9	0.0	100.0	(161)
<u>Time Period of Last Delivery</u>					
1979-1982	91.0	8.9	0.1	100.0	(673)
1983-1984	87.7	12.3	0.0	100.0	(698)

Table III A.7

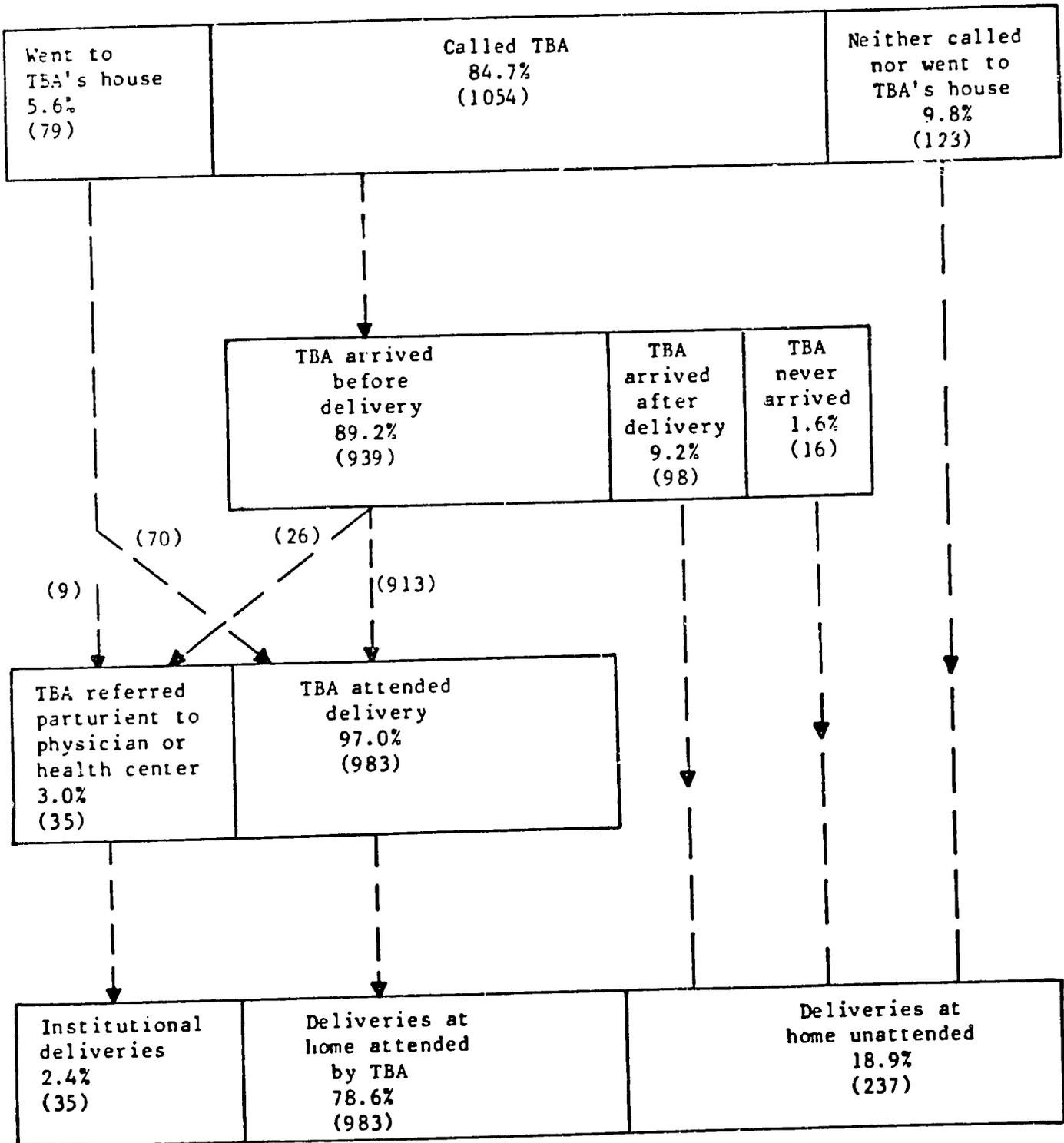
Percentage of Women whose Last Delivery Occurred by Cesarean
between 1979-1984 by Time Period of Delivery, Residence,
Education, Parity and Place of Delivery

Honduran MCH/FP Survey, 1984

Characteristics	Delivery by Cesarean			
	1979 - 1982		1983 - 1984	
Total	8.9	(673)	12.3	(698)
Residence				
Teg/SP ^r	11.2	(347)	13.6	(324)
Other urban	7.1	(210)	12.9	(210)
Rural	6.3	(116)	10.3	(164)
Education				
None	6.9	(57)	15.5	(57)
Primary 1-3	8.2	(135)	9.2	(132)
Primary 4-6	5.3	(239)	9.1	(286)
>7 years	13.6	(242)	18.1	(223)
Parity				
0-1	13.0	(140)	16.1	(202)
2-3	9.9	(274)	13.5	(257)
4-5	8.0	(143)	7.9	(134)
>6	3.0	(116)	8.5	(105)
Place of Delivery				
MOH hospital	6.6	(374)	12.6	(440)
IHSS hospital	14.4	(129)	12.1	(99)
Private hospital	12.3	(135)	16.2	(113)
CESAMO, other	2.6	(35)	1.7	(46)

Figure III A 1

Deliveries Planned at Home: Place and Person who Attended



TBA = traditional birth attendant

Table III A 8

Percentage of Women whose Last Delivery Occurred between 1979-1984
and Was Attended by a TBA with or without a Kit by Attention Received

Honduran MCH/FP Survey, 1984

Attention	Total	TBA with Kit	TBA without Kit
<u>Attention Before Delivery</u>			
Washed hands	79.5	86.7	66.0
Asked about contractions	65.3	75.2	48.0
Listened to fetus	40.7	50.5	24.1
Gave injection	15.3	20.4	5.9
No. of Women	(1018)	(628)	(368)
<u>Care of Umbilical Cord</u>			
Nothing or gauze	1.5	0.6	2.7
Only modern*	57.9	69.7	38.3
Only traditional**	17.1	7.6	33.3
Modern and traditional	21.4	20.4	24.1
Unknown	2.0	1.8	1.7
Total	100.0	100.0	100.0
No. of Women	(1076)	(657)	(393)
<u>Attention to the Newborn</u>			
Placed drops in eyes	25.6	37.0	7.3
Removed phlegm	66.9	73.5	55.9
Gave "chupon"	64.3	64.8	64.1
Cleaned infant	95.8	97.6	93.8
Weighed infant	27.8	38.3	10.3
No. of Women	(1076)	(657)	(393)

* Merthiolate, iodine, alcohol

**Candle, alcanfor, hot iron, etc.

Table III A 9

Distribution of Women whose Last Delivery Occurred between 1979-1984
and Was Attended by a TBA with or without a Kit by Recommendations
Received about Breastfeeding, Immunization and Use of Contraception

Honduran MCH/FP Survey, 1984

Recommendations	Total	TBA with Kit	TBA without Kit
<u>Breastfeeding</u>			
Did not recommend	32.6	28.2	40.1
Recommended immediately	44.7	47.6	41.2
Recommended 6 hours later	9.4	9.8	8.2
Recommended to feed on demand	11.1	12.5	8.3
Powdered milk	0.7	0.3	0.9
Breastfeeding and other milk	0.8	1.0	0.5
Other	0.4	0.3	0.8
Unknown	0.3	0.3	0.0
Total	100.0	100.0	100.0
<u>Immunization</u>			
Yes	68.5	78.6	53.3
No	31.2	21.2	46.7
Unknown	0.3	0.2	0.0
Total	100.0	100.0	100.0
<u>Use of Contraception</u>			
Yes	12.0	14.9	7.4
No	87.9	84.8	92.6
Unknown	0.2	0.3	0.0
Total	100.0	100.0	100.0
No. of Women	(1076)	(657)	(393)

Table III A 10

Distribution of Women whose Last Delivery Occurred between 1979-1984
by a TBA with or without a Kit by Payment for the Delivery

Honduran MCH/FP Survey, 1984

Payment (Lempiras)	Total	TBA with Kit	TBA without Kit
0-9	27.3	20.2	38.8
10-19	37.3	38.0	37.1
>20	33.8	40.1	23.1
Unknown	1.6	1.8	0.9
Total	100.0	100.0	100.0
Average*	15.3	17.1	11.9
No. of Women	(1076)	(657)	(393)

* Nine women (0.9%) said that they paid more than 80 Lempiras. In order to calculate averages, their payment was considered to be only 80 Lps. (2 Lempiras = US\$1.00)

Table III A 11

Distribution of Women whose Last Delivery Occurred between 1979-
1984 by Postpartum Care, Type of Health Service Visited and Residence

Honduran MCH/FP Survey, 1984

Postpartum Care and Type of Health Service	Total	Residence		
		Teg/SPS	Other Urban	Rural
<u>Postpartum Care</u>				
Yes	28.5	45.6	36.0	19.7
No	71.0	53.8	63.7	79.8
Unknown	0.4	0.5	0.3	0.5
Total	100.0	100.0	100.0	100.0
No. of Women	(2599)	(756)	(664)	(1179)
<u>Type of Health Service</u>				
MOH hospital	16.1	16.2	18.0	14.9
CESAMO	29.9	25.5	31.8	32.4
CESAR	12.4	0.3	0.8	29.5
IHSS hospital	9.3	24.9	0.4	1.1
Private hospital	28.8	29.3	47.7	17.1
Other	3.2	2.9	0.8	4.9
Unknown	0.4	0.9	0.4	0.0
Total	100.0	100.0	100.0	100.0
No. of Women	(822)	(345)	(239)	(238)

Table III A 12

Percentage of Women whose Last Delivery Occurred between 1979-1984
who Received Postpartum Care by Place of Delivery and Type of
Delivery

Honduran MCH/FP Survey, 1984

Place and Type of Delivery	Received Post- partum Care	No. of Women
<u>Place of Delivery</u>		
TBA/at home	18.4	(1221)
MOH hospital	33.9	(816)
CESAMO, CESAR	37.6	(34)
IHSS hospital	54.7	(229)
Private hospital	55.4	(248)
Other institutional place	42.1	(47)
<u>Type of hospital delivery</u>		
Vaginal	39.9	(1223)
Cesarean	51.1	(149)

Table III A 13

Distribution of Women whose Last Delivery Occurred between 1979-1984 by Medical Attention for the Newborn, Place and Age of Infant at the Time of First Medical Visit and Residence

Honduran MCH/FP Survey, 1984

Medical Attention, Place and Age of Infant	Total	Residence		
		Teg/SPS	Urban	Rural
<u>Medical Attention for Infant</u>				
Yes	84.0	90.9	88.4	80.0
No	15.5	8.6	11.3	19.5
Unknown	0.4	0.5	0.3	0.5
Total	100.0	100.0	100.0	100.0
No. of Women	(2599)	(756)	(664)	(1179)
<u>Place of Attention</u>				
MOH hospital	10.7	11.4	16.4	8.4
CESAMO	36.6	36.4	48.4	32.5
CESAR	27.7	1.6	5.8	46.5
IHSS hospital	7.8	29.7	1.4	0.8
Private hospital	15.3	20.5	27.1	8.5
Other	2.0	0.4	1.0	3.0
Total	100.0	100.0	100.0	100.0
No. of Women	(2221)	(687)	(587)	(947)
<u>Age of Infant at First Visit</u>				
<1 month	22.1	39.4	27.8	12.7
>1 month and <2 months	23.5	23.9	24.7	22.8
>2 months and <3 months	33.4	24.8	31.2	37.9
>3 months	21.0	12.0	16.4	26.6
Total	100.0	100.0	100.0	100.0
No. of Women	(2221)	(687)	(587)	(947)

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Table III A 14

Distribution of Women whose Last Delivery Occurred between 1979-1984
by Reason for First Medical Visit, Age of Infant at Time of Visit
and Residence

Honduran MCH/FP Survey, 1984

Reason for First Medical Visit and Age of Infant	Total	Residence		
		Teg/SPS	Other Urban	Rural
<u>Reason for First Visit</u>				
Sick child	33.9	33.8	37.1	32.7
Well-baby care	65.7	65.5	62.4	67.1
Other	0.4	0.7	0.5	0.2
Total	100.0	100.0	100.0	100.0
No. of Women	(2221)	(687)	(587)	(947)
<u>< 29 days</u>				
Sick child	52.0	42.2	61.1	57.6
Well-baby care	46.8	56.0	38.3	41.6
Other	1.2	1.9	0.6	0.9
Total	100.0	100.0	100.0	100.0
No. of Women	(550)	(268)	(162)	(120)
<u>> 30 days</u>				
Sick child	28.6	28.2	28.0	28.9
Well-baby care	71.2	71.8	71.5	71.0
Other	0.2	0.0	0.5	0.1
Total	100.0	100.0	100.0	100.0
No. of Women	(1666)	(418)	(425)	(823)

Table III B 1

Mean Duration in Months of Breastfeeding in Women with a Child less than 2 Years of Age at the Time of Interview by Education, Number of Living Children, Place of Delivery, Work Status and Residence

Honduran MCH/FP Survey, 1984

Characteristics	Total	No. of Women	Residence			
			Urban	No. of Women	Rural	No. of Women
Total	16.2	(1290)	11.7	(663)	19.0	(627)
<u>Education</u>						
None	19.6	(237)	15.6	(66)	20.5	(171)
Primary 1-3	18.5	(362)	14.4	(140)	19.9	(222)
Primary 4-6	14.9	(459)	11.4	(247)	17.3	(212)
>7 years	9.8	(232)	9.0	(210)	14.4	(22)
<u>Number of Living Children</u>						
1	14.6	(290)	11.2	(184)	17.9	(106)
2	15.3	(259)	10.8	(149)	18.9	(110)
3	15.0	(214)	11.3	(126)	18.0	(88)
4-5	17.0	(277)	11.6	(120)	19.5	(157)
>6	18.8	(250)	14.9	(84)	20.0	(166)
<u>Place of Delivery</u>						
Home	19.0	(627)	13.9	(150)	20.0	(477)
Hospital	12.6	(663)	11.0	(513)	15.8	(150)
<u>Works</u>						
Yes	12.7	(316)	10.0	(233)	17.1	(83)
No	17.2	(974)	12.6	(430)	19.3	(544)

Note: The average length of breastfeeding is estimated by dividing the number of women currently breastfeeding (duration is not important) by the number of women who have had a live birth in the 24 months prior to the interview, and multiplying this ratio by 24. J.E. Anderson, W. Rodrigues, and M.T. Thome, "Breastfeeding and Use of the Health Care System in Bahia State, Brazil: Three Multivariate Analyses," Studies in Family Planning 15, no. 3 (May/June 1984):127-135.

In all the tables of Section III B, women who have gotten pregnant again in the 24 month period prior to interview have been excluded.

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Table III B 2

Mean Duration in Months of Breastfeeding in Women with a Child less than 2 Years of Age at the Time of Interview by Residence, Age of the Mother and Education in the ENPA 1981 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Characteristics	ENPA 1981	No. of Women	MCH/FP 1984	No. of Women
Total	15.2	(1284)	16.2	(1290)
<u>Residence</u>				
Urban	9.6	(352)	11.7	(663)
Rural	17.7	(932)	19.0	(627)
<u>Age</u>				
15-24	15.2	(506)	15.7	(550)
25-34	14.8	(553)	16.3	(537)
35-44	15.9	(225)	17.6	(203)
<u>Education</u>				
None	18.4	(322)	19.6	(237)
Primary 1-3	17.1	(492)	18.5	(362)
Primary 4-6	13.2	(357)	14.9	(459)
>7 years	7.2	(113)	9.8	(232)

The methodology used in Table III B 1 was also used in this table.

Table III B 3

Distribution of Women with a Child less than 2 Years of Age at the Time of Interview by Breastfeeding Practices, Supplementary Feeding and Age of the Child

Honduran MCH/FP Survey, 1984

Age of Child in Months	Breastfeeding				Not Breastfeeding		No. of Women
	Exclusive	Breast and Other milk	Breast and Other Food*	Breast, Other Milk and Other Food	Total		
<2	43.8	21.4	11.0	12.8	11.0	100.0	(176)
3-5	23.5	9.0	18.1	32.2	17.2	100.0	(189)
6-8	4.3	0.8	32.6	38.1	24.1	100.0	(170)
9-11	1.9	0.0	32.5	38.4	27.2	100.0	(195)
12-14	0.0	0.0	32.8	27.7	39.4	100.0	(190)
15-17	0.0	0.0	37.5	23.9	38.6	100.0	(160)
18-20	0.0	0.0	10.3	24.2	65.5	100.0	(108)
21-23	1.3	0.0	18.3	16.7	63.8	100.0	(102)
All Ages	10.3	4.3	25.3	27.8	32.3	100.0	(1290)

* Coffee, juice, "atoles", strained or solid food

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Table III B 4

Distribution of Women with a Child less than 2 Years of Age at the Time of Interview by
Breastfeeding Practices, Supplementary Feeding, Age of the Child and
Residence

Honduran MCH/FP Survey, 1984

Type of Feeding	Total		Age of Child in Months					
			0-5 Months		6-17 Months		18-23 Months	
	Urban	Rural	Urban	Rural	Urban	Rural	Urban	Rural
Breastfeeding	48.7	79.3	77.2	91.2	43.8	81.3	18.3	48.5
Exclusive	4.7	13.7	15.9	44.4	0.3	2.3	0.0	1.2
With other milk	6.0	3.2	20.6	11.4	0.3	0.1	0.0	0.0
With other food*	12.7	33.1	12.7	15.9	15.5	44.0	4.2	22.0
With other milk and other food	25.3	29.3	28.0	19.5	27.7	34.9	14.2	25.4
Not breastfeeding	51.3	20.7	22.8	8.7	56.2	18.7	81.7	51.5
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(663)	(627)	(189)	(176)	(354)	(361)	(120)	(90)

*Coffee, juice, "atoles", strained or solid food

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Table III B 5

Percentage of Women with a Child less than 2 Years of Age at the Time of Interview that Have Begun Supplementary Feeding by Type of Food and Age of the Child

Honduran MCH/FP Survey, 1984

Type of Food	Age of Child in Months					
	0-2	3-5	6-8	9-11	12-17	18-23
Milk	44.8	58.4	63.1	65.6	64.2	78.2
Coffee	12.2	18.1	43.6	51.9	63.1	77.5
Juice	16.6	54.1	80.7	73.3	82.4	86.2
"Atoles"	5.2	24.9	50.2	49.5	65.0	68.5
Strained food	0.8	30.7	69.5	77.1	80.1	83.9
Solid food	1.6	15.2	64.2	86.0	96.0	98.0
No. of Women	(176)	(189)	(170)	(195)	(350)	(210)

Table III B 6

Mean Duration in Months of Postpartum Amenorrhea in Women with a Child less than 2 Years of Age at the Time of Interview by Education, Number of Living Children, Place of Delivery, Work Status and Residence

Honduran MCH/FP Survey, 1984

Characteristics	Total	No. of Women	Residence		No. of Women	
			Urban	No. of Women		
Total	11.1	(1290)	7.7	(663)	13.2 (627)	
<u>Education</u>						
None	13.8	(237)	12.0	(66)	14.2 (171)	
Primary 1-3	12.5	(362)	9.4	(140)	13.6 (222)	
Primary 4-6	10.0	(459)	6.6	(247)	12.4 (212)	
>7 years	6.3	(232)	6.5	(210)	8.4 (22)	
<u>Number of Living Children</u>						
1	9.3	(290)	6.3	(184)	12.4 (106)	
2	10.6	(259)	7.6	(149)	12.9 (110)	
3	10.2	(214)	7.4	(126)	12.5 (88)	
4-5	12.3	(277)	7.8	(120)	14.3 (157)	
>6	12.9	(250)	11.4	(84)	13.3 (166)	
<u>Place of Delivery</u>						
Home	13.3	(627)	10.1	(150)	13.8 (477)	
Hospital	8.3	(663)	7.0	(513)	11.0 (150)	
<u>Works</u>						
Yes	8.5	(316)	7.1	(233)	10.9 (83)	
No	11.8	(974)	8.0	(430)	13.6 (544)	

Note: The average length of postpartum amenorrhea is estimated by dividing the number of women currently not menstruating by the number of women who have had a live birth in the 24 months prior to the interview, and multiplying this ratio by 24. J.E. Anderson, W. Rodrigues, and M.T. Thome, "Breast-feeding and Use of the Health Care System in Bahia State, Brazil: Three Multivariate Analyses," Studies in Family Planning 15, no. 3 (May/June 1984):127-135.

Table III B 7

Distribution of Women with a Child less than 2 Years of Age at
the Time of Interview by Contraceptive Use, Infant Feeding
Practices and Age of the Child

Honduran MCH/FP Survey, 1984

Feeding and Contraceptive Use	Total	Age of Child in Months					
		0-2	3-5	6-8	9-11	12-17	18-23
<u>Exclusive Breastfeeding</u>	10.3	43.8	23.5	4.3	1.9	0.0	0.7
Oral contraceptives	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Other methods	0.3	0.8	1.1	0.0	0.0	0.0	0.0
No method	10.0	43.0	22.4	4.3	1.9	0.0	0.7
<u>Breastfeeding and Supplementary Feeding</u>	57.4	45.2	59.3	71.6	70.9	60.9	34.7
Oral contraceptives	1.8	0.4	2.2	1.3	2.7	2.1	1.7
Other methods	5.8	1.9	6.9	6.9	7.6	6.6	3.8
No method	49.8	42.9	50.2	63.4	60.6	52.2	29.2
<u>Not Breastfeeding</u>	32.2	11.0	17.2	24.0	27.2	39.0	64.7
Oral contraceptives	8.4	0.8	4.3	9.2	11.2	9.2	14.0
Other methods	8.7	1.2	5.7	7.8	6.9	11.3	16.1
No methods	15.1	9.0	7.2	7.0	9.1	18.5	34.6
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(1290)	(176)	(189)	(170)	(195)	(350)	(210)

Table III B 8

Distribution of Women with a Child less than 2 Years of Age at the Time of Interview by Menstrual Status, Contraceptive Use and Age of the Child

Honduran MCH/FP Survey, 1984

Menstrual Status	Total	Age of Child in Months					
		0-2	3-5	6-8	9-11	12-17	18-23
Menstruating							
Oral contraceptives	18.9	*	20.0	20.7	25.5	16.3	17.5
Other methods	22.9	*	26.0	20.2	23.2	24.6	22.4
No method	58.2	*	54.0	59.1	51.3	59.1	60.1
Total	100.0	*	100.0	100.0	100.0	100.0	100.0
No. of Women	(729)	(15)	(65)	(90)	(111)	(258)	(190)
Not Menstruating							
Oral contraceptives	0.3	0.0	0.0	1.5	0.8	0.0	0.0
Other methods	6.2	4.3	7.8	11.6	6.3	3.7	0.0
No method	93.4	95.7	92.2	86.9	92.9	96.3	100.0
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(557)	(161)	(124)	(79)	(82)	(91)	(20)

*Less than 25 cases

Table III C 1

Distribution of Children less than 5 Years of Age by Immunization Status
Adjusted for the Age of the Child, Type of Immunization and
Residence

Honduran MCH/FP Survey, 1984

Immunization and Status	Total	Residence		
		Teg/SPS	Other Urban	Rural
<u>Polio</u>				
Adequate	81.9	84.9	82.1	81.0
Inadequate	13.5	12.3	14.8	13.6
None	4.1	2.1	3.0	4.9
Unknown	0.4	0.7	0.1	0.4
Total	100.0	100.0	100.0	100.0
No. of Children	(3472)	(889)	(836)	(1747)
<u>DPT</u>				
Adequate	66.7	66.1	62.8	68.0
Inadequate	21.0	21.7	22.8	20.4
None	10.8	10.3	12.2	10.5
Unknown	1.5	1.8	2.2	1.2
Total	100.0	100.0	100.0	100.0
No. of Children	(3472)	(889)	(836)	(1747)
<u>Measles</u>				
Adequate	81.5	80.3	78.6	82.6
None	17.6	18.8	20.8	16.3
Unknown	1.0	0.9	0.5	1.1
Total	100.0	100.0	100.0	100.0
No. of Children	(3037)	(770)	(730)	(1537)
<u>BCG</u>				
Adequate	69.3	71.9	67.7	69.1
None	29.6	26.5	31.7	30.0
Unknown	1.0	1.6	0.7	0.9
Total	100.0	100.0	100.0	100.0
No. of Children	(3607)	(918)	(872)	(1817)

Children whose age is unknown (22 cases) have been excluded from all immunization tables. In Tables III C1-C6, immunization status has been adjusted for the child's age; for example, children between 2-3 months of age with one dose of polio or DPT are considered adequately protected. Children have been excluded if according to the norm they are not old enough to receive the first dose.

Table III C 2

Distribution of Children less than 5 Years of Age by Type of
Immunization, Education of the Mother and Residence

Honduran MCH/FP Survey, 1984

Immunization and Status	Total		Residence					
	Education		Teg/SPS Education		Other Urban Education		Rural Education	
	0-3	>4	0-3	>4	0-3	>4	0-3	>4
<u>Polio</u>								
Adequate	77.9	86.7	78.8	87.3	74.6	86.6	78.3	86.4
Inadequate	16.3	10.3	17.6	10.2	20.3	11.5	15.5	9.8
None	5.4	2.5	2.8	1.9	5.1	1.7	5.8	3.4
Unknown	0.4	0.4	0.8	0.6	0.0	0.2	0.5	0.4
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1698)	(1774)	(250)	(639)	(315)	(521)	(1133)	(614)
<u>DPT</u>								
Adequate	64.0	69.9	60.0	68.5	55.2	67.4	65.9	72.0
Inadequate	21.5	20.5	23.2	21.1	24.8	21.7	20.8	19.5
None	13.0	8.2	14.4	8.8	17.1	9.2	12.2	7.3
Unknown	1.5	1.5	2.4	1.6	2.9	1.7	1.1	1.3
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1698)	(1774)	(250)	(639)	(315)	(521)	(1133)	(614)
<u>Measles</u>								
Adequate	79.6	83.7	74.8	82.4	76.5	79.9	80.7	86.5
None	19.4	15.4	23.4	17.1	22.8	19.7	18.4	12.2
Unknown	1.0	0.9	1.9	0.5	0.7	0.4	1.0	1.3
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1498)	(1539)	(214)	(556)	(272)	(458)	(1012)	(525)
<u>BCG</u>								
Adequate	66.6	72.5	67.3	73.6	62.6	70.7	67.2	72.7
None	32.6	26.3	29.9	25.2	37.1	28.4	32.2	25.9
Unknown	0.8	1.2	2.8	1.2	0.3	0.9	0.7	1.4
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1761)	(1846)	(254)	(664)	(329)	(543)	(1178)	(639)

Table III C 3

Distribution of Children less than 5 Years of Age by Immunization Status of Polio Adjusted for the Age of the Child, and by Residence and Age of Child

Honduran MCH/FP Survey, 1984

Immunization Status and Residence	Total	Age of Child in Years				
		<1 Year	1	2	3	4
<u>Total</u>						
Adequate	81.9	72.8	85.7	84.3	83.8	82.0
Inadequate	13.5	17.0	12.0	13.0	13.8	12.2
None	4.1	9.9	2.0	2.4	2.3	4.6
Unknown	0.4	0.3	0.3	0.4	0.1	1.1
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(3472)	(649)	(777)	(720)	(687)	(639)
<u>Teg/SPS</u>						
Adequate	84.9	77.7	85.4	89.5	88.2	83.1
Inadequate	12.3	13.3	13.1	8.9	10.6	15.7
None	2.1	9.0	0.5	0.5	0.6	0.6
Unknown	0.7	0.0	1.0	1.0	0.6	0.6
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(889)	(166)	(199)	(191)	(161)	(172)
<u>Other Urban</u>						
Adequate	82.1	75.6	85.2	85.0	82.6	80.9
Inadequate	14.8	13.5	13.8	13.8	16.8	15.9
None	3.0	10.3	1.1	1.1	0.6	3.2
Unknown	0.1	0.5	0.0	0.0	0.0	0.0
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(836)	(156)	(189)	(167)	(167)	(157)
<u>Rural</u>						
Adequate	81.0	70.6	85.9	82.4	82.9	82.0
Inadequate	13.6	19.1	11.3	13.8	13.9	10.0
None	4.9	10.0	2.7	3.5	3.2	6.3
Unknown	0.4	0.3	0.1	0.3	0.0	1.7
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1747)	(327)	(389)	(362)	(359)	(310)

Table III C 4

Distribution of Children less than 5 Years of Age by Immunization
Status of DPT Adjusted for the Age of the Child, and by
Residence and Age of Child

Honduran MCH/FP Survey, 1984

Immunization Status and Residence	Total	Age of Child in Years				
		<1 Year	1	2	3	4
<u>Total</u>						
Adequate	66.7	34.1	71.5	74.2	76.4	75.1
Inadequate	21.0	35.6	20.0	20.0	15.8	14.4
None	10.8	29.5	7.9	4.1	6.4	7.5
Unknown	1.5	0.9	0.6	1.6	1.4	3.0
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(3472)	(649)	(777)	(720)	(687)	(639)
<u>Teg/SPS</u>						
Adequate	66.1	36.7	66.3	74.3	73.3	78.5
Inadequate	21.7	32.5	22.6	19.9	19.3	14.5
None	10.3	30.1	9.5	3.7	3.7	5.8
Unknown	1.8	0.6	1.5	2.1	3.7	1.2
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(889)	(166)	(199)	(191)	(161)	(172)
<u>Other Urban</u>						
Adequate	62.8	34.0	67.7	73.1	66.5	70.7
Inadequate	22.8	33.3	21.2	21.6	21.0	17.8
None	12.2	30.8	10.6	3.0	10.2	7.6
Unknown	2.2	1.9	0.5	2.4	2.4	3.8
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(836)	(156)	(189)	(167)	(167)	(157)
<u>Rural</u>						
Adequate	68.0	33.3	74.0	74.5	79.9	75.3
Inadequate	20.4	37.1	19.0	19.6	13.5	13.3
None	10.5	28.9	6.6	4.6	6.0	8.0
Unknown	1.2	0.6	0.4	1.3	0.6	3.3
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1747)	(327)	(389)	(362)	(359)	(310)

Table III C 5

Distribution of Children less than 5 Years of Age by Immunization Status
of Measles Adjusted for the Age of the Child, and by
Residence and Age of Child

Honduran MCH/FP Survey, 1984

Immunization Status and Residence	Total	Age of Child in Years				
		>1 Year	1	2	3	4
<u>Total</u>						
Adequate	81.5	47.1	78.6	89.9	86.3	82.4
None	17.6	52.9	21.1	9.1	13.2	15.2
Unknown	1.0	0.0	0.4	0.9	0.6	2.4
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(3037)	(214)	(777)	(720)	(687)	(639)
<u>Teg/SPS</u>						
Adequate	80.3	34.0	72.9	90.1	85.7	85.5
None	18.8	66.0	26.1	8.9	13.7	13.4
Unknown	0.9	0.0	1.0	1.0	0.6	1.2
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(770)	(47)	(199)	(191)	(161)	(172)
<u>Other Urban</u>						
Adequate	78.6	50.0	75.7	88.6	77.2	82.2
None	20.8	50.0	23.8	10.8	22.2	17.2
Unknown	0.5	0.0	0.5	0.6	0.6	0.6
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(730)	(50)	(189)	(167)	(167)	(157)
<u>Rural</u>						
Adequate	82.6	49.4	81.0	90.2	88.8	81.5
None	16.3	50.6	18.8	8.8	10.6	15.2
Unknown	1.1	0.0	0.1	1.0	0.6	3.3
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1537)	(117)	(389)	(362)	(359)	(310)

Table III C 6

Distribution of Children less than 5 Years of Age by Immunization Status of BCG Adjusted for the Age of the Child, and by Residence and Age of Child

Honduran MCH/FP Survey, 1984

Immunization Status and Residence	Total	Age of Child in Years				
		>1 Year	1	2	3	4
<u>Total</u>						
Adequate	69.3	35.0	73.7	80.7	79.8	82.1
None	29.6	63.9	25.6	18.4	19.5	16.1
Unknown	1.0	1.1	0.6	0.9	0.7	1.8
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(3607)	(784)	(777)	(720)	(687)	(639)
<u>Teg/SPS</u>						
Adequate	71.9	44.6	76.4	80.6	77.6	82.6
None	26.5	54.9	22.1	17.3	19.9	15.7
Unknown	1.6	0.5	1.5	2.1	2.5	1.7
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(918)	(195)	(199)	(199)	(161)	(172)
<u>Other Urban</u>						
Adequate	67.7	36.5	70.9	82.6	73.7	79.6
None	31.7	62.5	28.6	17.4	25.7	19.1
Unknown	0.7	1.0	0.5	0.0	0.6	1.3
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(872)	(192)	(189)	(167)	(167)	(157)
<u>Rural</u>						
Adequate	69.1	31.8	73.7	80.3	82.1	82.7
None	30.0	66.8	25.9	19.0	17.6	15.3
Unknown	0.9	1.3	0.4	0.7	0.3	2.0
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(1817)	(397)	(389)	(362)	(359)	(310)

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Table III C 7

Percentage of Children less than 5 Years of Age with Complete Immunization
Coverage of Polio, DPT, Measles and BCG in the ENPA 1981
and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Immunization	ENPA 1981			MCH/FP 1984		
	Total	Urban	Rural	Total	Urban	Rural
Polio	45.5	52.7	38.3	75.0	76.0	74.5
DPT	42.3	49.9	39.5	62.4	60.2	63.7
Measles	60.4	67.3	56.6	69.3	67.4	70.4
BCG	50.3	60.0	44.9	69.3	69.8	69.1

Note: Immunization coverage reported in the ENPA 1981 has been adjusted to the age distribution of children less than 5 years of age in the MCH/FP 1984.

Table III C 8

Percentage of Children less than 5 Years of Age with Complete Immunization
Coverage of Polio, DPT, Measles or BCG in Panama, Guatemala and Honduras

Honduran MCH/FP Survey, 1984

Immunization	Panama* (1979)	Guatemala (1983)	Honduras (1984)
Polio	62.8	33.4	75.0
DPT	61.0	32.9	62.4
Measles	67.3	52.9	69.3
BCG	55.3	57.7	69.3
No. of Children	(2399)	(4190)	(3607)

* Data from Panama include children less than 6 years of age.

Table III D 1

Prevalence of Diarrhea* among Children less than 5 Years of Age by Residence, Age of Child, Waste Disposal, Source of Water and Electricity

Honduran MCH/FP Survey, 1984

Characteristics	Children with Diarrhea %	No. of Children
<u>Total</u>	20.1	(3629)
<u>Residence</u>		
Teg/SPS	16.1	(922)
Other urban	20.2	(873)
Rural	21.2	(1834)
<u>Age of Child</u>		
< 1 year	25.2	(784)
1 year	29.1	(777)
2 years	18.7	(720)
3 years	14.3	(687)
4 years	11.2	(639)
<u>Waste Disposal</u>		
Toilet	14.5	(1058)
Outhouse	21.3	(1297)
Other	**	(6)
None	22.0	(1266)
<u>Source of Water</u>		
Faucet in home or on property	18.8	(2161)
Faucet outside of property	21.3	(375)
Well, other	20.5	(1089)
<u>Electricity</u>		
Yes	16.8	(1679)
No	22.0	(1945)

* Children with diarrhea on the day of the interview and/or the two days prior to the interview. This applies to all tables on diarrhea.

**Less than 25 cases.

Table III D 2

Prevalence of Diarrhea among Children less than 5 Years of Age by
Residence, and Age of the Child

Honduran MCH/FP Survey, 1984

Residence	Total	Age of Child in Years				
		<1	1	2	3	4
Total	20.1 (3629)	25.2 (784)	29.1 (777)	18.7 (720)	14.3 (687)	11.2 (639)
Teg/SPS	16.1 (922)	20.0 (195)	23.6 (199)	17.3 (191)	11.2 (161)	6.4 (172)
Other urban	20.2 (873)	22.4 (192)	30.7 (189)	24.6 (167)	11.4 (167)	9.6 (157)
Rural	21.2 (1834)	27.4 (397)	30.2 (389)	17.6 (362)	15.9 (359)	13.2 (310)

Table III D 3

Distribution of Children with Diarrhea less than 5 Years of Age by
Signs/Symptoms Associated with Diarrhea and Duration of Episode

Honduran MCH/FP Survey, 1984

Signs/ Symptoms	Total	Days of Diarrhea				
		1	2	3	4-6	≥7
None	57.0	73.0	66.7	54.0	47.8	40.1
Mucus or blood	24.2	20.6	18.3	29.8	19.8	34.3
Vomiting	10.5	4.9	10.5	8.1	18.1	11.9
Both	7.6	1.0	3.1	8.1	14.3	13.7
Unknown	0.7	0.6	1.5	0.0	0.0	0.0
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Children	(711)	(130)	(174)	(170)	(133)	(102)

Table III D 4

Distribution of Children with Diarrhea less than 5 Years of Age by Whether or Not Medical Attention Was Sought, Place of Attention, and Signs/Symptoms Associated with Diarrhea

Honduran MCH/FP Survey, 1984

Medical Attention Sought and Place	Total	Signs/Symptoms			
		None	Mucus or Blood	Vomiting	Both
Yes	22.0	17.6	24.1	23.6	48.1
MOH	12.1	8.7	14.9	12.8	29.4
Health agent	1.8	1.6	0.7	1.7	7.1
IHSS	1.8	2.5	0.4	1.0	2.6
Private physician	3.9	2.7	5.4	6.3	5.3
Other	2.3	2.1	2.6	1.9	3.7
None	78.0	82.4	75.9	76.4	51.9
Total	100.0	100.0	100.0	100.0	100.0
No. of Children	(711)	(409)	(169)	(74)	(54)

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Table III D 5

Distribution of Children with Diarrhea less than 5 Years of Age by Whether or Not Medical Attention Was Sought, Place of Attention, Duration and Signs/Symptoms Associated with Diarrhea

Honduran MCH/FP Survey, 1984

Medical Attention Sought and Place	Total	<2 Days Without Signs/Symptoms	<2 Days With Signs/Symptoms	>3 Days Without Signs/Symptoms	>3 Days With Signs/Symptoms
Yes	22.0	13.5	17.7	21.7	32.6
MOH	12.1	6.9	7.2	10.5	21.0
Health agent	1.8	1.2	4.4	1.9	1.2
IHSS	1.8	0.7	0.8	4.3	1.0
Private physician	3.9	3.0	3.9	2.4	6.3
Other	2.3	1.7	1.5	2.6	3.1
None	78.0	86.5	82.3	78.2	67.4
Total	100.0	100.0	100.0	100.0	100.0
No. of Children	(711)	(212)	(89)	(197)	(208)

Signs/symptoms = blood/mucus and/or vomiting.

Table III D 6

Distribution of Children with Diarrhea less than 5 Years of Age by Treatment, Whether or Not Medical Attention Was Sought and Place of Attention

Honduran MCH/FP Survey, 1984

Treatment	Total*	Sought Attention			Did Not Seek Attention
		Total*	MOH**	IHSS/Private	
Treatment	73.7	98.2	99.3	96.4	66.5
Litrosol	5.9	10.8	14.3	6.6	4.5
Antibiotics	21.4	13.3	10.4	16.2	23.7
Antidiarrhetics	15.0	23.5	22.1	17.6	12.7
Others	11.7	10.2	4.9	22.1	12.0
Combination w/ Litrosol	11.2	31.3	39.0	22.1	5.5
Combination w/o Litrosol	8.5	9.0	8.6	11.9	8.2
No Treatment	25.8	1.2	0.7	1.8	32.9
Unknown	0.5	0.6	0.0	1.8	0.6
Total	100.0	100.0	100.0	100.0	100.0
No. of children	(711)	(170)	(103)	(50)	(541)

Private = private physician

* Seventeen cases have been included from the category "other" (not shown separately) for the place of attention.

**The health agents have been included.

Table III D 7

Distribution of Children with Diarrhea Less than 5 Years of Age by Treatment, Whether or Not Treatment Was Sought and Signs/Symptoms Associated with Diarrhea

Honduran MCH/FP Survey, 1984

Treatment	Sought Attention		Did Not Seek Attention	
	Without Signs/ Symptoms	With Signs/ Symptoms	Without Signs/ Symptoms	With Signs/ Symptoms
Treatment	99.0	98.3	63.5	71.7
Litrosol	12.5	9.4	3.7	5.7
Antibiotics	12.4	14.1	22.2	26.4
Antidiarrhetics	33.0	15.0	13.2	12.0
Others	14.6	7.2	12.4	11.0
Combination w/ Litrosol	17.3	43.1	4.6	7.0
Combination w/o Litrosol	9.2	9.5	7.4	9.5
No Treatment	0.0	1.7	36.1	28.3
Unknown	1.0	0.0	0.4	0.0
Total	100.0	100.0	100.0	100.0
No. of children	(79)	(91)	(330)	(208)

Table IV A 1

Distribution of Women in Union who Have Been Pregnant by Planning Status of the Last Pregnancy, Residence, Age, Number of Living Children and Education

Honduran MCH/FP Survey, 1984

Characteristics	Planning Status of Last Pregnancy				Total	No. of Women
	Planned	Mistimed	Unwanted	Unknown		
Total	60.4	18.0	21.0	0.6	100.0	(2542)
<u>Residence</u>						
Teg/SPS	62.5	16.6	17.3	0.6	100.0	(773)
Other urban	61.3	18.5	20.2	0.0	100.0	(615)
Rural	58.2	18.4	22.8	0.7	100.0	(1154)
<u>Age</u>						
15-19	77.2	19.7	1.8	1.4	100.0	(190)
20-24	63.2	26.1	10.7	0.0	100.0	(526)
25-29	60.3	22.5	17.1	0.1	100.0	(597)
30-34	58.2	16.6	24.6	0.7	100.0	(500)
35-39	55.8	10.1	33.1	1.0	100.0	(412)
40-44	55.2	7.5	36.2	1.1	100.0	(317)
<u>Number of Living Children</u>						
0	84.4	13.4	0.8	1.4	100.0	(96)
1	85.8	12.3	1.5	0.4	100.0	(395)
2	65.2	29.1	5.2	0.5	100.0	(469)
3	59.1	24.1	16.8	0.0	100.0	(439)
4-5	54.3	17.0	28.2	0.6	100.0	(623)
>6	44.2	10.7	44.1	1.1	100.0	(520)
<u>Education</u>						
None	59.6	12.4	27.0	0.9	100.0	(446)
Primary 1-3	57.7	18.4	23.3	0.7	100.0	(755)
Primary 4-6	60.1	20.4	19.2	0.3	100.0	(824)
>7 years	57.3	19.5	12.7	0.5	100.0	(517)

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Table IV A 2

Distribution of Women in Union by Current Pregnancy Intention, Residence, Age, Number of Living Children and Education

Honduran MCH/FP Survey, 1984

Characteristics	Current Pregnancy Intention					Sub fecund*	Unknown	Total	No. of Women
	Currently Pregnant	Desires Pregnancy in the Immediate Future	Desires Pregnancy But Later	Does Not Desire Pregnancy					
Total	15.7	9.2	24.9	39.9	7.7	2.5	100.0	(2639)	
<u>Residence</u>									
Teg/SPS	10.5	9.1	29.6	42.1	7.2	1.5	100.0	(803)	
Other urban	13.9	8.0	27.7	38.8	9.1	2.5	100.0	(639)	
Rural	18.4	9.6	22.1	39.4	7.6	2.9	100.0	(1197)	
<u>Age</u>									
15-19	26.0	23.2	39.6	10.1	1.1	0.0	100.0	(233)	
20-24	23.3	9.1	43.3	21.7	2.5	0.1	100.0	(553)	
25-29	18.3	9.5	29.6	37.3	4.0	1.2	100.0	(607)	
30-34	13.1	8.4	16.9	51.6	6.0	4.0	100.0	(504)	
35-39	9.1	6.0	10.7	57.4	12.1	4.8	100.0	(422)	
40-44	3.4	3.4	4.4	56.9	26.1	5.8	100.0	(320)	
<u>Number of Living Children</u>									
0	42.3	25.6	16.2	0.8	15.0	0.0	100.0	(191)	
1	18.2	18.7	48.5	6.3	8.3	0.0	100.0	(395)	
2	15.1	11.2	43.2	26.0	4.5	0.0	100.0	(470)	
3	13.6	4.9	27.9	47.4	4.7	1.4	100.0	(439)	
4-5	12.9	5.1	14.8	56.1	8.1	2.9	100.0	(623)	
>6	10.5	3.7	7.6	61.5	9.4	7.3	100.0	(521)	
<u>Education</u>									
None	13.5	8.3	16.7	48.2	10.8	3.3	100.0	(457)	
Primary 1-3	18.2	8.0	21.3	39.4	10.5	2.5	100.0	(778)	
Primary 4-6	16.0	9.9	29.8	36.8	5.0	2.4	100.0	(872)	
>7 years	13.1	11.0	32.3	36.6	5.2	1.7	100.0	(532)	

*Subfecund women include those in menopause and those that during three years or more have been sexually active but have not used a contraceptive method and have not become pregnant.

Table IV A 3

Ideal and Current Family Size for All Women Interviewed by Residence and Age of the Woman
Honduran MCH/FP Survey, 1984

Age	Total		Residence					
	Ideal	Current	Teg/SPS		Other Urban		Rural	
			Ideal	Current	Ideal	Current	Ideal	Current
15-19	3.0	0.2	2.5	0.1	2.6	0.2	3.5	0.3
20-24	3.2	1.3	2.7	0.9	2.9	1.1	3.7	1.7
25-29	3.7	2.7	3.0	1.8	3.2	2.5	4.2	3.4
30-34	4.0	3.9	3.2	3.2	3.6	3.5	4.5	4.4
35-39	4.5	4.9	3.6	3.6	4.3	4.5	5.1	5.7
40-44	4.5	5.6	4.0	4.5	4.2	5.3	4.9	6.2

Note: Women who answered 8 or more have been coded as 8.

Table IV A 4

Ideal Family Size for Women who Have Never Been in Union and Women
Currently or Ever in Union by Age and Residence

Honduran MCH/FP Survey, 1984

Residence	Age			
	15-19		20-24	
	Never in Union	Currently or Ever in Union	Never in Union	Currently or Ever in Union
Total	2.9 (955)	3.2 (295)	2.8 (367)	3.4 (724)
<u>Residence</u>				
Teg/SPS	2.5 (398)	2.7 (75)	2.7 (181)	2.8 (235)
Other urban	2.6 (266)	2.6 (68)	2.7 (113)	3.0 (192)
Rural	3.5 (291)	3.5 (152)	3.0 (73)	3.8 (297)

Note: Women who answered 8 or more are coded as 8.

Table IV B 1

Percentage of All Women Interviewed who Have Knowledge of
Contraceptive Methods in the ENPA 1981 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Method	ENPA 1981	MCH/FP 1984
Orals	94.7	92.9
Female sterilization	86.0	89.1
IUD	78.8	75.0
Vasectomy	25.4	42.1
Injection	74.7	73.9
Condom	52.9	56.7
Foam*	44.0	36.9
Vaginal tablets*	-	43.9
Rhythm	41.1	45.3
Withdrawal	17.5	25.4
No. of Women	(3377)	(4805)

*In the ENPA 1981, foam and vaginal tablets are grouped together.

Table IV B 2

Percentage of All Women Interviewed who Have Knowledge of
Contraceptive Methods by Residence

Honduran MCH/FP Survey, 1984

Method	Total	Residence		
		Teg/SPS	Other Urban	Rural
Orals	92.9	97.1	96.7	89.0
Female sterilization	89.1	93.4	94.3	84.6
IUD	75.0	86.0	80.9	66.3
Vasectomy	42.1	51.6	49.0	33.9
Injection	74.7	81.2	81.0	68.6
Condom	56.7	73.0	67.5	43.2
Foam, jelly	36.9	49.6	46.2	26.1
Vaginal tablets	43.9	59.1	52.2	32.1
Rhythm	45.3	61.8	53.1	32.8
Withdrawal	25.4	35.3	31.3	17.4
No. of Women	(4805)	(1740)	(1260)	(1805)

Table IV B 3

Distribution of Women in Union by Contraceptive Method, Knowledge
and Use of Method

Honduran MCH/FP Survey, 1984

(n = 2639)

Method	No Knowledge	Has Knowledge			Total
		Never Used	Previous User	Current User	
Orals	5.2	55.1	27.1	12.7	100.0
Female sterilization	8.0	80.0	0.0	12.1	100.0
IUD	19.1	70.1	6.9	3.8	100.0
Vasectomy	52.9	46.9	0.0	0.2	100.0
Injection	18.3	77.1	4.3	0.3	100.0
Condom	38.0	56.5	4.6	0.9	100.0
Foam, jelly	57.8	40.7	1.5	0.0	100.0
Vaginal tablets	51.6	44.2	3.8	0.4	100.0
Rhythm	49.2	42.5	5.4	2.9	100.0
Withdrawal	71.2	23.6	3.4	1.7	100.0

Table IV B 4

Distribution of Women in Union by Current Use of Contraceptive Methods and Residence

Honduran MCH/FP Survey, 1984

Current Use and Method	Total	Residence		
		Teg/SPS	Other Urban	Rural
Currently Using	34.9	55.7	44.9	23.8
Orals	12.7	20.7	18.2	7.9
Female sterilization	12.1	16.1	13.5	10.1
IUD	3.8	9.1	4.8	1.5
Vasectomy	0.2	0.4	0.2	0.1
Injection	0.3	0.7	0.4	0.1
Condom	0.9	1.5	1.9	0.3
Vaginal tablets	0.4	0.4	1.0	0.2
Rhythm	2.9	5.0	2.9	2.0
Withdrawal	1.7	1.9	1.9	1.6
Not currently using	65.1	44.3	55.1	76.2
Total	100.0	100.0	100.0	100.0
No. of Women	(2639)	(803)	(639)	(1197)

Table IV B 5

Distribution of Women in Union by Current Use of Contraceptive Methods and Residence
in the ENPA 1981 and MCH/FP 1984

Honduran MCH/FP Survey, 1984

Current Use and Method	ENPA 1981*			MCH/FP 1984		
	Total	Urban	Rural	Total	Urban	Rural
Currently Using	26.8	47.4	16.0	34.9	50.9	23.8
Orals	11.7	22.0	6.3	12.7	19.6	7.9
Female sterilization	8.0	13.1	5.4	12.1	14.9	10.1
IUD	2.4	5.5	0.9	3.8	7.2	1.5
Vasectomy	0.2	0.2	0.1	0.2	0.3	0.1
Injection	0.3	0.6	0.2	0.3	0.6	0.1
Condom	0.3	0.8	0.1	0.9	1.7	0.1
Vaginal tablets	0.7	1.4	0.3	0.4	0.7	0.2
Rhythm	1.6	2.9	0.9	2.9	4.1	2.0
Withdrawal	1.6	0.8	2.0	1.7	1.8	1.6
Not currently using**	73.2	52.6	84.0	65.1	49.1	76.2
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(2185)	(754)	(1431)	(2639)	(1442)	(1197)

*Women 15-49 have been included.

**In both surveys douches and other ineffective methods are included.

Table IV B 6

Distribution of Women in Union by Current Use of Contraceptive Methods and Age

Honduran MCH/FP Survey, 1984

Current Use and Method	Total	Age					
		15-19	20-24	25-29	30-34	35-39	40-44
Currently Using	34.9	13.1	30.3	33.8	44.3	45.2	33.2
Orals	12.7	9.5	18.4	16.1	12.2	9.0	4.7
Female sterilization	12.1	0.0	2.4	7.3	19.3	23.6	20.2
IUD	3.8	1.2	5.6	4.9	4.0	2.7	2.3
Vasectomy	0.2	0.0	0.0	0.5	0.3	0.0	0.0
Injection	0.3	0.0	0.6	0.1	0.1	0.7	0.2
Condom	0.9	0.0	0.3	1.1	1.4	1.0	0.9
Vaginal tablets	0.4	0.0	0.4	0.1	0.4	1.3	0.0
Rhythm	2.9	2.0	1.3	2.6	4.3	4.1	2.7
Withdrawal	1.7	0.3	1.3	1.2	2.2	2.8	2.2
Not currently using	65.1	86.9	69.7	66.2	55.7	54.8	66.8
Total	100.0						
No. of Women	(2639)	(233)	(553)	(607)	(504)	(422)	(320)

Table IV B /

Distribution of Women in Union by Current Use of Contraceptive Methods and Number of Living Children
Honduran MCH/FP Survey, 1984

Current Use and Method	Total	Number of Living Children					
		0	1	2	3	4-5	>6
Currently Using	34.9	5.4	28.1	39.1	45.1	41.7	31.2
Orals	12.7	4.2	17.1	19.6	16.0	11.3	6.5
Female sterilization	12.1	0.0	0.6	4.3	13.6	21.0	18.2
IUD	3.8	0.0	4.6	6.4	6.9	3.7	0.8
Vasectomy.	0.2	0.4	0.0	0.0	0.4	0.3	0.0
Injection	0.3	0.0	0.6	0.5	0.2	0.2	0.3
Condom	0.9	0.0	0.8	1.0	1.7	0.9	0.5
Vaginal tablets	0.4	0.0	0.8	0.8	0.4	0.0	0.5
Rhythm	2.9	0.8	2.4	4.8	4.0	2.2	2.3
Withdrawal	1.7	0.0	1.2	1.6	1.9	2.0	2.2
Not currently using	65.1	94.6	71.9	60.9	54.9	58.3	68.8
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(2639)	(191)	(395)	(470)	(439)	(623)	(521)

Table IV B 8

Distribution of Women in Union by Current Use of Contraceptive Methods and Education

Honduran MCH/FP Survey, 1984

Current Use and Method	Total	Education			
		None	Primary 1-3	Primary 4-6	>7 Years
Currently Using	34.9	19.1	26.7	40.9	59.5
Orals	12.7	5.1	8.5	17.3	21.1
Female sterilization	12.1	10.1	11.7	13.2	13.1
IUD	3.8	1.0	2.4	5.0	8.1
Vasectomy	0.2	0.0	0.1	0.2	0.4
Injection	0.3	0.1	0.1	0.3	0.9
Condom	0.9	0.0	0.3	0.7	3.3
Vaginal tablets	0.4	0.1	0.2	0.2	1.6
Rhythm	2.9	1.2	1.6	2.5	8.1
Withdrawal	1.7	1.4	1.7	1.3	2.9
Not currently using	65.1	80.9	73.3	59.2	40.5
Total	100.0	100.0	100.0	100.0	100.0
No. of Women	(2639)	(457)	(778)	(872)	(532)

Table IV B 9

Distribution of Women in Union by Current Use of Contraceptive Methods,
Residence and Education

Honduran MCH/FP Survey, 1984

Current Use and Method	Total		Residence					
	Education		Teg/SPS Education		Other Urban Education		Rural Education	
	0-3	>4	0-3	>4	0-3	>4	0-3	>4
Currently Using	23.7	47.1	42.1	60.9	30.7	52.4	19.6	32.3
Orals	7.2	18.6	14.2	23.2	12.1	21.4	5.3	13.0
Female sterilization	11.1	13.2	16.4	15.9	14.3	13.0	9.7	10.9
Vasectomy	0.1	0.3	0.4	0.3	0.0	0.2	0.0	0.3
IUD	1.9	6.0	7.6	9.7	1.3	6.7	1.0	2.5
Injection	0.1	0.5	0.4	0.9	0.4	0.5	0.0	0.3
Condom	0.2	1.6	0.4	1.9	0.4	2.7	0.1	0.7
Vaginal tablets	0.1	0.7	0.0	0.5	0.0	1.7	0.2	0.3
Rhythm	1.4	4.4	0.9	6.6	0.4	4.3	1.7	2.6
Withdrawal	1.6	1.8	1.8	1.9	1.8	1.9	1.6	1.7
Not currently using	76.2	53.0	57.8	39.1	69.2	47.5	80.4	67.8
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(1235)	(1404)	(225)	(578)	(224)	(415)	(786)	(411)

Table IV B 10

Distribution of Women in Union Standardized for Age, by Current Use of
Contraceptive Methods and Education

Honduran MCH/FP Survey, 1984

Current Use and Method	Education			
	None	Primary 1-3	Primary 4-6	>7 Years
Currently Using	17.1	26.7	45.1	59.1
Orals	5.9	8.5	16.4	19.4
Female sterilization	8.2	11.2	17.1	14.3
IUD	0.9	2.6	5.1	8.0
Vasectomy	0.0	0.1	0.2	0.4
Injection	0.1	0.1	0.5	0.8
Condom	0.0	0.4	0.9	3.2
Vaginal tablets	0.1	0.1	0.3	1.6
Rhythm	1.1	1.6	2.5	8.2
Withdrawal	0.8	1.7	1.5	2.8
Other	0.0	0.4	0.6	0.4
Not currently using	82.8	73.4	55.0	40.9
Total	100.0	100.0	100.0	100.0
No. of Women	(457)	(778)	(872)	(532)

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Table IV B 11

Distribution of Women in Union by Current Use of Contraceptive Methods in Central American Countries, Panama and Mexico

Honduran MCH/FP Survey, 1984

Current Use and Method	Panama 1984	Costa Rica 1981*	El Salvador 1978	Guatemala 1983	Mexico 1982*	Honduras 1984
Currently Using	60.6	65.1	34.4	25.0	47.7	34.9
Orals	12.6	20.6	8.7	4.7	14.2	12.7
Sterilization	35.0	17.8	18.0	11.1	13.7	12.3
IUD	6.1	5.7	3.3	2.6	6.6	3.8
Condom	1.6	8.4	1.5	1.2	0.9	0.9
Rhythm	2.0	6.2	1.7	3.4	3.8	2.9
Other method	3.3	6.5	1.2	2.0	8.5	2.4
Not currently using	39.4	34.9	65.6	75.0	52.3	65.1
Total	100.0	100.0	100.0	100.0	100.0	100.0
No. of Women	(4480)	(2593)	(1476)	(2709)	(6059)	(2639)

*Women 15 to 49 years of age.

Table IV B 12

Distribution of Women in Union by Declared and Attributed Source of Oral Contraceptives and Female Sterilization

Honduran MCH/FP Survey, 1984

Source	Declared Attributed	
	<u>Oral Contraceptives</u>	
Ministry of Health	24.2	18.9
ASHONPLAFA		
Clinic, CBD*	37.3	46.0
Social marketing	-	6.5
Private	34.4	26.4
IHSS	1.8	2.0
Other	2.3	0.2
Total	100.0	100.0
No. of Women	(377)	(377)
	<u>Female Sterilization</u>	
Ministry of Health/ASHONPLAFA	50.3	50.3
Private/ASHONPLAFA	-	13.6
ASHONPLAFA	6.4	6.4
Private	35.4	10.2
Private/unknown	-	11.5
IHSS	6.8	6.8
Other	1.1	1.1
Total	100.0	100.0
No. of Women	(341)	(341)

*Community Based Distribution of Contraceptives.

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Table IV B 13

Distribution of Women in Union by Attributed Source of Oral Contraceptives and Female Sterilization and by Residence

Honduran MCH/FP Survey, 1984

Attributed Source	Residence		
	Teg/SPS	Other Urban	Rural
<u>Oral Contraceptives</u>			
Ministry of Health	13.9	10.3	30.2
ASHONPLAFA			
Clinic, CBD*	39.8	50.4	49.4
Social marketing	6.6	6.1	6.6
Private	34.9	32.2	13.7
IHSS	4.8	1.1	0.0
Total	100.0	100.0	100.0
No. of Women	(166)	(115)	(96)
<u>Female Sterilization</u>			
MOH/ASHONPLAFA	35.7	48.8	60.1
Private/ASHONPLAFA	10.1	9.3	17.6
ASHONPLAFA	12.4	2.3	4.3
Private	6.2	24.4	6.9
Private/unknown	14.7	12.8	9.0
IHSS	20.2	1.2	0.9
Other	0.8	1.2	1.3
Total	100.0	100.0	100.0
No. of Women	(129)	(86)	(126)

*Community Based Distribution of Contraceptives.

Table IV B 14

Distribution of Women in Union by Residence, Contraceptive Method and Time to Get to Source
Honduran MCH/FP Survey, 1984

Residence and Method	Time to Source of Method				Total	No. of Women
	<30 min	30-59 min	≥60 min	Unknown		
<u>Total</u>						
Orals	76.1	13.3	9.3	1.3	100.0	(377)
IUD	48.3	30.3	21.4	0.0	100.0	(126)
Female sterilization*	29.7	24.3	43.7	2.3	100.0	(195)
<u>Teg/SPS</u>						
Orals	82.5	15.1	1.2	1.2	100.0	(165)
IUD	52.1	41.1	6.9	0.0	100.0	(73)
Female sterilization*	64.6	26.2	7.7	1.5	100.0	(65)
<u>Other Urban</u>						
Orals	88.8	10.3	0.9	0.0	100.0	(116)
IUD	71.0	6.5	22.6	0.0	100.0	(31)
Female sterilization*	28.3	26.4	39.6	5.7	100.0	(53)
<u>Rural</u>						
Orals	60.5	13.7	23.6	2.2	100.0	(96)
IUD	17.2	28.6	54.2	0.0	100.0	(22)
Female sterilization*	12.9	22.5	63.2	1.4	100.0	(77)

*Does not include postpartum sterilization, only interval procedures.

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Table IV B 15

Distribution of Women in Union by Reason for Not Using
a Contraceptive Method and Residence

Honduran MCH/FP Survey, 1984

Reason for Not Using a Method	Total	Residence		
		Teg/SPS	Other Urban	Rural
<u>Reason related to pregnancy, fecundity, and sexual activity</u>				
	80.0	81.4	84.3	78.8
Postpartum/breastfeeding	34.0	34.9	28.1	37.3
Currently pregnant	24.5	25.1	25.8	24.3
Menopause/subfecund	12.1	16.6	16.8	10.1
Desires pregnancy	6.5	8.9	8.7	5.5
No sexual activity	2.9	6.9	4.9	1.6
<u>Other reason</u>				
	20.0	18.6	15.7	21.2
Fear/bad experience	3.8	5.4	5.5	3.1
Lack of knowledge	3.7	1.4	0.6	4.9
Husband opposes	2.9	1.7	1.2	3.6
Does not like	2.0	3.7	1.2	1.8
Methods too expensive	0.9	0.0	0.9	1.1
Religious reasons	0.6	0.0	0.0	0.8
Other	6.0	6.3	6.4	5.8
Total	100.0	100.0	100.0	100.0
No. of Women	(1588)	(349)	(345)	(894)

Table IV B 16

Percentage of Fecund Women in Union who Are Not Contracepting but
Desire to Use a Method by Residence, Age, Education, Reason for Non-
Use and Previous Use

Honduran MCH/FP Survey, 1984

Characteristics	Desires Method	No. of Women
Total	76.1	(1380)
<u>Residence</u>		
Teg/SPS	79.7	(291)
Other urban	86.7	(286)
Rural	73.2	(803)
<u>Age</u>		
15-19	75.6	(190)
20-24	83.6	(342)
25-29	80.3	(348)
30-34	77.0	(222)
35-39	67.7	(162)
40-44	54.0	(116)
<u>Education</u>		
None	61.8	(312)
Primary 1-3	76.0	(460)
Primary 4-6	85.1	(423)
>7 years	85.5	(185)
<u>Reason for Not Using a Contraceptive Method</u>		
Pregnant/postpartum	79.2	(908)
Desires pregnancy	73.1	(110)
Inactive sexually	82.1	(56)
Other reasons	67.3	(306)
<u>Previous Use</u>		
Yes	89.6	(479)
No	70.1	(901)

Table IV B 17

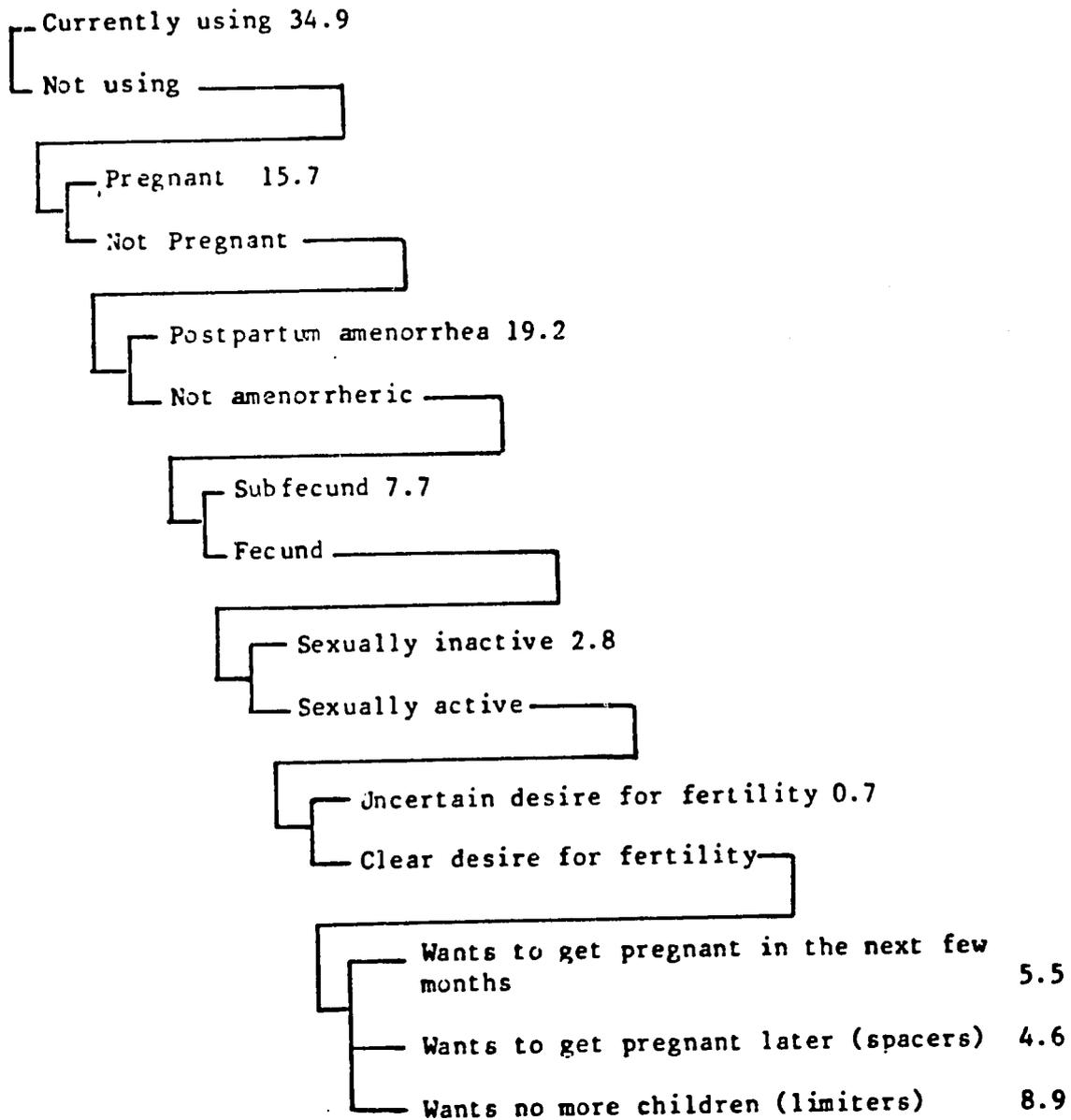
Distribution of Fecund Women in Union who Are Not Contracepting but Desire to Use a Contraceptive Method by Preferred Method and Source

Honduran MCH/FP Survey, 1984

Method and Source	Desires Method
<u>Preferred Method</u>	
Orals	32.6
IUD	6.4
Sterilization	39.4
Condom, vaginal tablets	1.3
Injection	7.7
Rhythm	4.5
Withdrawal	1.0
Other	0.5
Unknown	6.7
Total	100.0
No. of Women	(1070)
<u>Source of Clinical Methods</u>	
MOH	61.3
IHSS	1.5
Private	15.1
ASHONPLAFA	10.0
Other	0.5
Unknown	11.5
Total	100.0
No. of Women	(1011)

Figure IV B 1

Determination of Unmet Need for Contraception among Women in Union
(Potential Demand for Contraception)



Wants to get pregnant later (spacers) 4.6%
Wants no more children (limiters) 8.9%

Potential demand for contraception (Unmet need) 13.5%

No. of Women = 2639

Table IV B 18

Percentage of Women in Union with Potential Demand for Contraception by Age, Education, Number of Living Children, Breastfeeding Status and Residence

Honduran MCH/FP Survey, 1984

(n = 2639)

Characteristics	Total	Residence		
		Teg/SPS	Other Urban	Rural
Total	13.5	9.7	11.0	15.8
<u>Age</u>				
15-19	11.4	12.0	11.1	11.4
20-24	11.3	8.9	11.7	12.2
25-29	11.5	8.6	11.1	12.8
30-34	12.9	11.9	7.8	14.9
35-39	14.4	7.0	13.0	18.2
40-44	22.6	12.6	11.8	29.5
<u>Education</u>				
0-3 years	18.1	13.8	18.3	18.8
>4 years	8.6	8.1	7.0	9.9
<u>Number of Living Children</u>				
0	6.1	1.6	10.5	6.9
1	11.3	10.9	7.9	13.2
2	11.7	9.1	10.0	14.1
3	13.6	9.4	12.3	16.7
4-5	13.3	9.9	12.8	14.6
>6	19.2	16.1	12.1	20.9
<u>Breastfeeding</u>				
Yes, currently	19.3	20.3	18.7	19.2
No, but has breastfed	14.0	8.2	13.1	16.8
No children/never breastfed	7.1	6.9	3.6	8.7

Note: Potential demand for contraception includes women that currently do not desire children.

Table IV B 19

Distribution of Women in Union by Potential Demand for Contraception and Reason for Not Using a Contraceptive Method

Honduran MCH/FP Survey, 1984

Reason	Total	Desires Pregnancy In the Future (Spacers)	Does not Desire More Children (Limiters)
Postpartum/breastfeeding	22.8	22.4	23.0
Fear or bad experience with methods	14.4	9.4	17.1
Family or religious opposition	11.5	17.0	8.6
Lacks knowledge of methods	11.4	7.9	13.3
Does not like	6.7	5.8	7.2
Methods too expensive	4.0	0.6	5.8
Desires more children*	2.9	5.7	1.5
Other	22.4	24.7	21.0
Unknown	3.9	6.7	2.4
Total	107.0	100.0	100.0
No. of Women	(333)	(117)	(216)

*This category exists because of inconsistencies found in the interviews.

Table IV B 20

Distribution of Women in Union by Potential Demand for Contraception and
Distribution of All Women in Union by Residence, Age, Education and Number of
Living Children

Honduran MCH/FP Survey, 1984

Characteristics	Total	Potential Demand for Contraception		Women in Union
		Desires Pregnancy in the Future (Spacers)	Does not Desire More Children (Limiters)	
<u>Residence</u>				
Teg/SPS	16.4	19.8	14.7	22.9
Other urban	14.8	17.3	13.4	18.2
Rural	68.8	62.9	71.9	58.9
Total	100.0	100.0	100.0	100.0
<u>Age</u>				
15-19	7.8	16.1	3.5	9.2
20-24	17.3	38.5	6.3	20.6
25-29	19.4	25.2	16.3	22.8
30-34	18.3	14.4	20.3	19.2
35-39	16.9	3.6	23.8	15.9
40-44	20.4	2.2	29.8	12.2
Total	100.0	100.0	100.0	100.0
<u>Education</u>				
None	30.7	11.3	40.8	20.0
Primary 1-3	39.0	39.8	38.5	32.1
Primary 4-6	22.8	35.1	16.5	31.9
>7 years	7.4	13.8	4.2	16.0
Total	100.0	100.0	100.0	100.0
<u>Number of Living Children</u>				
0-1	15.0	34.8	4.7	21.3
2	14.4	26.3	8.2	16.6
3	15.9	15.1	16.3	15.8
4-5	23.9	15.8	28.1	24.4
>6	30.9	7.9	42.8	21.8
Total	100.0	100.0	100.0	100.0
No. of Women	(333)	(117)	(216)	(2639)

Table IV C 1

Percentage of Non-Pregnant Women in Union that Reported a Health Complaint or that
Smoke by Residence and Age

Honduran MCH/FP Survey, 1984

Health Complaint or Smokes	Total		Residence and Age					
			Teg/SPS		Other Urban		Rural	
	20-34	>35	20-34	>35	20-34	>35	20-34	>35
<u>Health Complaint</u>								
Nausea*	9.4	10.7	7.6	6.7	8.3	7.6	10.6	13.5
Vomiting*	5.0	6.4	4.5	3.4	3.7	6.3	5.6	7.9
Headache*	35.8	40.0	32.4	29.8	32.2	36.7	38.6	45.6
Dizziness*	19.2	25.0	11.9	12.6	12.8	15.8	24.8	33.4
Abdominal pain*	20.3	17.9	17.5	8.8	18.8	9.5	22.1	24.6
Chest pain*	11.8	16.1	11.5	9.2	7.7	13.3	13.4	20.1
Visual problems*	15.0	30.2	15.5	23.9	14.8	29.1	14.6	33.4
Spotting**	7.9	9.6	10.3	5.0	8.3	8.2	6.6	12.1
Excessive menstrual flow**	9.9	10.9	11.7	8.0	8.5	12.0	9.6	11.9
Varicose veins	13.1	30.2	13.7	29.8	11.1	29.1	13.6	30.7
<u>Currently smokes</u>	6.2	10.2	8.5	11.8	6.3	14.6	5.1	8.2
No. of Women	(1378)	(698)	(445)	(238)	(351)	(158)	(582)	(302)

* Felt in the last three days.

** Felt within the last month.

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Table IV C 2

Percentage of Non-Pregnant Women in Union that Reported a
Health Complaint or that Smoke by Age and Contraceptive Method
Currently Used

Honduran MCH/FP Survey, 1984

Age and Health Complaint or Smokes	Oral Contraceptives	Other Methods	Does Not Contracept
<u>Age 20-34</u>			
<u>Health Complaint</u>			
Nausea*	5.9	9.7	10.5
Vomiting*	2.3	6.0	5.5
Headache*	33.1	35.9	36.7
Dizziness*	11.7	16.9	22.8
Abdominal pain*	17.4	20.6	21.2
Chest pain*	9.9	12.8	12.1
Visual problems*	12.6	17.1	14.8
Spotting**	10.0	9.9	6.2
Excessive menstrual flow**	7.7	16.1	7.9
Varicose veins	10.5	20.7	10.7
<u>Currently Smokes</u>	5.9	5.9	6.4
No. of Women	(291)	(375)	(712)
<u>Age >35</u>			
<u>Health Complaint</u>			
Nausea*	9.4	5.5	14.1
Vomiting*	6.5	4.3	7.7
Headache*	42.8	32.4	44.3
Dizziness*	19.8	14.2	32.4
Abdominal pain*	10.5	15.2	20.6
Chest pain*	10.8	10.0	20.7
Visual problems*	28.7	25.4	33.4
Spotting**	14.4	8.9	9.4
Excessive menstrual flow**	11.9	11.3	10.6
Varicose veins	24.1	31.5	30.3
<u>Currently Smokes</u>	15.7	9.1	10.1
No. of Women	(60)	(265)	(373)

*Felt in the last three days.

**Felt in the last month.

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Table IV C 3

Distribution of Women in Union who Have Used Oral Contraceptives (OCs) for the First Time since 1979 by Age, Source and Residence

Honduran MCH/FP Survey, 1984

Age and Source	Total	Residence		
		Teg/SPS	Other Urban	Rural
<u>Age Initiated</u>				
<u>OC Use</u>				
<19	20.6	20.7	22.2	19.6
20-24	39.2	43.8	43.4	33.5
25-29	24.3	23.1	21.2	27.1
>30	15.9	12.5	13.1	19.8
Total	100.0	100.0	100.0	100.0
<u>Source of OCs</u>				
Commercial	32.4	48.1	35.9	20.1
Non-commercial	66.8	50.5	63.6	79.3
Unknown	0.8	1.4	0.5	0.6
Total	100.0	100.0	100.0	100.0
No. of Women	(593)	(208)	(198)	(187)

Table IV C 4

Percentage of Women in Union who since 1979 Have Had a Medical Check-Up
before Taking Oral Contraceptives for the First Time by Residence and
Source of Orals

Honduran MCH/FP Survey, 1984

Residence and Source of OCs	Had Medical Check-Up	No. of Women
Total	30.8	(593)
Commercial	26.9	(210)
Non-commercial	32.2	(378)
Teg/SPS	44.2	(208)
Commercial	36.0	(100)
Non-commercial	51.4	(105)
Other urban	33.8	(198)
Commercial	31.0	(71)
Non-commercial	35.7	(126)
Rural	20.1	(187)
Commercial	8.3	(39)
Non-commercial	22.5	(147)

Table IV C 5

Percentage of Women in Union who Have Used Oral Contraceptives for the First Time since 1979 and Reported Side Effects Associated with the Method and Percentage that Sought Medical Attention by Residence, Education, Age Initiated Use of OCs and Source of OCs

Honduran MCH/FP Survey, 1984

Characteristics	Reported Side Effects	No. of Women That Have Used OCs	Sought Attention	No. of Women
Total	49.3	(593)	40.1	(294)
<u>Residence</u>				
Teg/SPS	45.7	(208)	50.5	(95)
Other urban	54.0	(198)	37.4	(107)
Rural	48.6	(187)	35.5	(92)
<u>Education</u>				
None	50.3	(54)	33.4	(27)
Primary 1-3	49.7	(136)	40.6	(71)
Primary 4-6	49.9	(242)	35.4	(120)
>7 years	47.2	(161)	51.2	(75)
<u>Age Initiated OC Use</u>				
<19	52.3	(126)	39.2	(66)
20-24	45.5	(240)	39.2	(110)
25-29	51.1	(139)	43.8	(70)
>30	51.8	(88)	36.3	(48)
<u>Source of OCs</u>				
Commercial	47.2	(210)	38.5	(99)
Non-commercial	50.4	(378)	40.0	(193)

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Table IV C 6

Distribution of Women in Union who Have Used Oral Contraceptives for the First Time since 1979 and Reported Side Effects Associated with the Method by Place Medical Attention Was Sought and Residence

Honduran MCH/FP Survey, 1984

Place of Attention	Total	Residence		
		Teg/SPS	Other Urban	Rural
MOH hospital	11.8	4.2	12.5	18.0
CESAMO	32.1	31.3	30.0	34.5
CESAR	8.8	0.0	0.0	22.9
IHSS hospital	2.8	8.3	0.0	0.0
Private physician	36.2	43.7	47.5	21.3
Pharmacy	0.7	0.0	2.5	0.0
ASHONPLAFA	2.8	8.3	0.0	0.0
ASHONPLAFA distributor	2.0	0.0	2.5	3.3
Other	2.8	4.2	5.0	0.0
Total	100.0	100.0	100.0	100.0
No. of Women	(121)	(48)	(40)	(33)

Table IV C 7

Distribution of Women in Union who Have Used Oral Contraceptives for the First Time since 1979 and Reported Side Effects Associated with the Method by Whether or not Medical Attention Was Sought, Type of Advice Given and Action Taken

Honduran MCH/FP Survey, 1984

Sought Medical Attention and Type of Advice	Action Taken				Total	No. of Women
	Continued with OC	Changed Brand	Quit Taking OC	Changed Method		
<u>Sought Attention</u>						
<u>for the Side Effect</u>						
Yes	16.2	23.7	33.1	27.0	100.0	(121)
No	31.1	9.0	50.0	9.9	100.0	(171)
<u>Type of Advice</u>						
Continue	72.9	4.0	23.1	0.0	100.0	(22)
Change brand	4.1	71.5	24.4	0.0	100.0	(38)
Quit taking	0.0	0.0	85.5	14.5	100.0	(17)
Change method	4.0	0.0	25.8	70.2	100.0	(42)

Table IV C 8

Distribution of Women in Union who Have Used Oral Contraceptives
for the First Time since 1979 by Current Use of Contraceptive Methods,
Whether or Not They Reported Side Effects Associated with the OCs and
Whether or Not Medical Attention Was Sought

Honduran MCH/FP Survey, 1984

Current Use and Method	Total	Reported Side Effects		Did not Report Side Effects	
		Total	Sought Attention		Did not Seek Attention
Currently Using	58.2	46.1	51.9	42.1	70.2
Orals	44.2	26.0	22.2	28.7	61.9
IUD	5.0	6.7	12.0	3.1	3.4
Female sterilization	3.4	4.6	8.1	2.2	2.3
Injection	0.4	0.6	1.4	0.0	0.3
Condom	0.7	1.1	0.7	1.4	0.3
Foam, jelly	0.7	1.3	1.4	1.3	0.0
Rhythm	2.3	3.7	5.3	2.7	0.8
Withdrawal	1.5	1.8	0.7	2.6	1.2
Not currently using	41.8	53.9	48.1	57.9	29.8
Total	100.0	100.0	100.0	100.0	100.0
No. of Women	(593)	(294)	(121)	(172)	(299)

Table IV C 9

Distribution of Women in Union who Have Used Oral Contraceptives for the First Time since 1979 and Have Quit Taking Them by Reason for Quitting, Whether or Not They Reported Side Effects Associated with the Method and Whether or Not They Sought Medical Attention

Honduran MCH/FP Survey, 1984

Reason for Quitting the Use of Ocs	Total	Reported Side Effects		Did Not Report Side Effects	
		Total	Sought Attention		Did not Seek Attention
Felt side effects, medical reasons	45.1	69.4	73.9	66.7	4.5
Wanted more children	21.4	10.7	15.7	8.4	39.3
Separated from husband	10.3	7.2	1.8	10.0	15.5
Method failed	6.0	3.1	0.0	4.7	10.7
Did not like, wanted to quit	3.8	3.8	5.0	3.3	3.7
Lack of source of OCs, economic reasons	3.8	2.2	1.8	2.4	6.4
Husband opposed	2.8	0.6	0.0	0.9	6.6
Menopause, religious reasons, fear, other	6.8	2.9	1.8	3.5	13.2
Total	100.0	100.0	100.0	100.0	100.0
No. of Women	(212)	(134)	(45)	(88)	(78)

Table IV D 1

Distribution of Women in Union Using Female Sterilization by Age and Date at the Time of Sterilization and at the Time of Interview, and Distribution of All Women in Union by Residence, Age, Education, Number of Living Children and Year of Sterilization

Honduran MCH/FP Survey, 1984

Characteristics	Time of Sterilization	Time of Interview	Women in Union
<u>Residence</u>			
Teg/SPS	-	30.5	22.9
Other urban	-	20.3	18.2
Rural	-	49.2	58.9
<u>Age</u>			
15-19	0.5	0.0	9.2
20-24	9.0	4.1	20.6
25-29	30.0	13.7	22.8
30-34	36.3	30.7	19.2
35-39	19.7	31.0	15.9
40-44	4.5	20.4	12.2
Mean	32.3	34.6	29.5
<u>Education</u>			
None	-	16.7	20.0
Primary 1-3	-	31.1	32.1
Primary 4-6	-	34.8	31.9
>7 years	-	17.4	16.0
<u>Number of Living Children</u>			
0	-	0.0	7.3
1	-	0.7	14.0
2	-	5.9	16.6
3	-	17.9	15.8
4-5	-	42.6	24.4
>6	-	32.9	21.8
Mean		4.8	3.6
<u>Year of Sterilization</u>			
< 1976	9.8	-	-
1977-78	13.5	-	-
1979-80	21.0	-	-
1981-82	26.6	-	-
1983-84	28.9	-	-
No. of Women	(341)	(341)	(2639)

Table IV D 2

Distribution of Women in Union Using Female Sterilization by Time of Sterilization, Type of Delivery, Residence, Education, Year of Sterilization, Age at Sterilization and Number of Living Children

Honduran MCH/FP Survey, 1984

Characteristics	At Delivery		Interval Procedure	Total	No. of Women
	Vaginal	Cesarean			
Total	23.0	18.1	58.9	100.0	(341)
<u>Residence</u>					
Teg/SPS	22.5	27.1	50.4	100.0	(129)
Other urban	23.3	16.2	60.0	100.0	(86)
Rural	22.3	13.0	64.7	100.0	(126)
<u>Education</u>					
0-3 years	22.1	15.5	62.4	100.0	(148)
Primary 4-6	25.0	13.7	61.3	100.0	(123)
>7 years	21.4	33.9	44.7	100.0	(70)
<u>Year of the Sterilization</u>					
<1979	38.3	24.3	37.4	100.0	(82)
1979-80	25.4	13.3	61.4	100.0	(76)
1981-82	15.2	13.5	71.3	100.0	(86)
1983-84	16.2	21.1	62.7	100.0	(96)
<u>Age at Sterilization</u>					
<30	20.3	21.9	57.8	100.0	(134)
>30	24.9	15.7	59.4	100.0	(206)
<u>Number of Living Children</u>					
0-2	17.2	33.3	49.5	100.0	(24)
3	10.5	37.4	52.2	100.0	(65)
>4	26.5	12.2	61.3	100.0	(252)
<u>Age and No. of Living Children</u>					
<30 y >3	19.9	18.7	61.3	100.0	(121)
>30 y >3	25.5	16.0	58.5	100.0	(196)

Table IV D 3

Distribution of Women in Union Using Female Sterilization by
Reason for Sterilization

Honduran MCH/FP Survey, 1984

Reason for Sterilization	Women in Union Using Female Sterilization
Did not want more children	32.1
Socio-economic reasons	18.9
Physician recommended	17.5
Health reasons	13.1
Adverse side effects of other methods	16.0
Other	2.4
Total	100.0
No. of Women	(341)

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Table IV D 4

Distribution of Women in Union Using Female Sterilization by Person
who Influenced the Decision to Get Sterilized

Honduran MCH/FP Survey, 1984

Persons who Influenced Decision	Women in Union Using Female Sterilization
------------------------------------	--

Person who had the Greatest
Influence in the Decision

Woman herself	46.7
Physician	21.7
Husband	20.7
Other	10.9
Total	100.0

No. of Women (341)

Decision Discussed with Husband

Yes	85.9
No	14.1
Total	100.0

No. of Women (341)

Reaction of Husband

In agreement	93.9
Neutral	0.8
Opposed	5.3
Total	100.0

No. of Women (291)

Other Person Opposed

Yes	9.2
No	90.8
Total	100.0

No. of Women (341)

Table IV D 5

Distribution of Women in Union Using Female Sterilization by
Satisfaction and Whether or Not They Recommended the Procedure to Others

Honduran MCH/FP Survey, 1984

Satisfaction and Whether or Not Recommended	Women in Union Using Female Sterilization
<u>Satisfied with the Sterilization</u>	
Yes	92.7
No	7.3
Total	100.0
No. of Women	(341)
<u>Why not Satisfied</u>	
Health problems	45.1
Desires more children	27.2
Other	27.7
Total	100.0
No. of Women	(24)
<u>Recommended to Other People</u>	
Yes	58.9
No	40.9
Unknown	0.2
Total	100.0
No. of Women	(341)

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Table IV D 6

Distribution of Women in Union, Fecund and Not Pregnant, who Have Had at least One Pregnancy by Whether or Not They Desire More Children, Residence, Education, Age and Number of Living Children

Honduran MCH/FP Survey, 1984

Characteristics	Desires More Children	Desired Last Pregnancy but Desires No More	Did Not Desire Last Pregnancy Nor Desires Another	Unknown	Total	No. of Women
Total	44.9	30.5	20.7	4.0	100.0	(1630)
<u>Residence</u>						
Teg./SPS	51.0	30.1	15.7	3.1	100.0	(508)
Other urban	49.6	30.5	18.8	1.0	100.0	(393)
Rural	41.0	30.6	23.2	5.2	100.0	(729)
<u>Education</u>						
None	30.6	35.1	27.5	6.7	100.0	(292)
Primary 1-3	38.2	33.6	23.3	4.9	100.0	(445)
Primary 4-6	53.4	25.8	18.3	2.5	100.0	(537)
>7 years	58.2	28.0	12.0	1.9	100.0	(356)
<u>Age</u>						
15-19	80.3	16.6	0.6	2.6	100.0	(129)
20-24	68.8	18.2	9.9	3.1	100.0	(388)
25-29	50.8	29.5	16.0	3.7	100.0	(424)
30-34	31.9	39.5	24.0	4.7	100.0	(306)
35-39	17.2	41.5	37.4	3.9	100.0	(228)
40-44	9.3	40.0	44.0	6.7	100.0	(155)
<u>Number of Living Children</u>						
0-1	89.8	7.2	1.3	1.7	100.0	(307)
2	65.7	25.5	3.7	5.0	100.0	(361)
3	39.0	38.9	17.4	4.7	100.0	(298)
4-5	26.5	41.6	28.0	3.9	100.0	(348)
>6	13.4	35.2	46.9	4.4	100.0	(316)
<u>Age and Number of Living Children</u>						
< 30 and < 3 children	80.4	14.8	1.8	3.0	100.0	(568)
> 30 and < 3 children	54.5	31.7	7.3	6.5	100.0	(100)
< 30 and > 3 children	38.0	34.2	24.1	3.7	100.0	(373)
> 30 and > 3 children	17.3	41.4	36.6	4.7	100.0	(589)

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Table IV D 7

Distribution of Women in Union, Fecund and Not Pregnant, who Have Had at least one Pregnancy and Want No More Children by their Interest in Sterilization, Residence, Education, Age, Number of Living Children and Desire for Last Pregnancy

Honduran MCH/FP Survey, 1984

Characteristics	Interest in Sterilization		Not Interested	Total	No. of Women
	Now	In the Future			
Total	10.1	53.7	36.1	100.0	(817)
<u>Residence</u>					
Teg/SPS	18.5	46.4	35.2	100.0	(233)
Other urban	9.8	62.4	27.8	100.0	(194)
Rural	7.4	53.8	38.8	100.0	(390)
<u>Education</u>					
None	6.3	44.1	49.7	100.0	(184)
Primary 1-3	10.3	58.5	31.2	100.0	(255)
Primary 4-6	13.4	57.7	28.9	100.0	(238)
>7 years	10.4	52.7	36.9	100.0	(140)
<u>Age</u>					
15-19	3.3	71.9	24.8	100.0	(22)
20-24	7.5	76.4	16.1	100.0	(107)
25-29	12.7	55.9	31.4	100.0	(184)
30-34	13.3	55.2	31.5	100.0	(194)
35-39	7.4	49.9	42.7	100.0	(180)
40-44	8.8	33.1	58.1	100.0	(130)
<u>Number of Living Children</u>					
0-1	9.4	61.0	29.6	100.0	(25)
2	6.6	56.6	36.8	100.0	(109)
3	10.5	60.9	28.6	100.0	(171)
4-5	13.6	52.0	34.4	100.0	(249)
>6	8.1	49.9	42.1	100.0	(263)
<u>Age and Number of Living Children</u>					
<30 and <3 children	5.8	68.2	26.1	100.0	(95)
<30 and >3 children	12.0	62.2	25.7	100.0	(218)
>30 and <3 children	10.8	29.3	59.9	100.0	(39)
>30 and >3 children	10.0	48.7	41.3	100.0	(465)
<u>Desired Last Pregnancy</u>					
Yes	7.8	55.7	36.6	100.0	(388)
No	12.2	52.0	35.7	100.0	(429)

Table IV D 8

Distribution of Women in Union, Fecund and Not Pregnant who Have Had at least One Pregnancy and Are Interested in Sterilization by Knowledge of Where to Obtain Information

Honduran MCH/FP Survey, 1984

Knowledge of Where to Obtain Sterilization Information	Women Interested in Sterilization
Knows where to obtain information	73.5
Ministry of Health	38.8
ASHONPLAFA	18.7
Private Hospital	11.7
IHSS	2.7
Other	1.6
Does not know	26.5
Total	100.0
No. of women	(91)

Table IV D 9

Distribution of Women in Union, Fecund and Not Pregnant who Have Had at least One Pregnancy and Are Interested in Sterilization Now by Reasons for Not Getting Sterilized

Honduran MCH/FP Survey, 1984

Reason for Not Getting Sterilized	Women Interested in Sterilization
Economic reasons	21.8
Physican refused: too young or too few children	14.1
Fear of the operation	13.5
Planning to get sterilized	9.4
Husband opposed	8.0
Lack of time/carelessness	6.9
Lacks child care	5.2
Administrative problems	3.2
Medical reasons	2.5
Lack of knowledge	1.6
Other	12.8
Unknown	0.9
Total	100.0
No. of Women	(91)

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Table IV D 10

Distribution of Women in Union, Fecund and not Pregnant who Have Had at least One Pregnancy but Desire No More Children and Are Not Interested in Sterilization by Reasons Not Interested and Residence

Honduran MCH/FP Survey, 1984

Reason Not Interested in Sterilization	Total	Residence		
		Teg/SPS	Other Urban	Rural
Fear of dying	48.6	32.9	48.1	53.6
It is not necessary	9.6	8.5	16.7	8.5
Prefers other method	7.7	11.0	5.6	7.1
Husband opposed	5.6	7.3	7.4	4.7
Religious reasons	5.3	3.7	3.7	6.1
Lacks information	5.2	2.4	0.0	7.1
Other	18.0	34.1	18.5	12.9
Total	100.0	100.0	100.0	100.0
No. of Women	(287)	(82)	(54)	(151)

Table IV D 11

Distribution of Women in Union, Fecund and Not Pregnant who Have Had at least One Pregnancy and Want No More Children and Are Not Interested in Sterilization by Reasons Not Interested and Education

Honduran MCH/FP Survey, 1984

Reason Not Interested in Sterilization	Total	Education			
		None	Primary		≥7 Years
			1-3	4-6	
Fear of dying	48.6	48.9	53.4	48.8	37.3
It is not necessary	9.6	12.1	7.3	5.5	14.5
Prefers other method	7.7	2.5	10.2	8.8	14.1
Husband opposed	5.6	6.4	3.3	4.3	10.5
Religious reasons	5.3	6.3	7.1	2.3	3.6
Lacks information	5.2	6.3	6.2	5.3	0.0
Other	18.0	17.5	12.4	25.0	19.9
Total	100.0	100.0	100.0	100.0	100.0
No. of Women	(287)	(89)	(79)	(67)	(52)