## Pondicherry <br> Union Territory

## Reproductive and Child Ilealth

## District Level Household <br> Survey 2002-04



International Institute for Population Sciences,
(Deemed University)
Mumbai-400 088


Ministry of Health \&Family Welfare, Government of India,
New Delhi-110 011


Population Research Centre, Gandhigram Institute of Rural
Health \&Family Welfare Trust Tamil Nadu-624 302

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## PREFACE AND ACKNOWLEDGEMENT

Government of India had launched the Reproductive and Child Health (RCH) program to ensure that couples have access to adequate information and services for reproductive health care. As a first step, family planning target has been withdrawn and an effort is being made to provide a package of reproductive services at different levels of health care centres.

Monitoring of the services is also being improved. New indicators are being added to assess quality of services and provision of an integrated reproductive health care service. The District Level Household Survey (DLHS) was initiated by Government of India and financed by the World Bank covering all the districts in the country. For the second time, district level estimates will be available for most of the critical reproductive health indicators. These important initiatives are certainly quite satisfying for all those who are concerned with taking ICPD reproductive health agenda ahead. The project is being coordinated by International Institute for Population Sciences, Mumbai and implemented by a number of consulting agencies.

For the purpose of data collection, uniform questionnaires, sampling design and field procedures were used throughout the country. The survey thus provided comparable data for all the districts in the state. The present report provides salient findings of Pondicherry and covered all the districts. The findings of selected indicators of reproductive and child health services from the union territory of Pondicherry are presented in the report.

It is believed that the data generated through the survey will meet the requirements of the Programme Administrators and Policy Makers for making effective interventions for providing quality services and achieving multiple objectives.

The DLHS-RCH could not have been successfully completed without cooperation and support from innumerable sources at various stages of the project. Although, it is not possible to acknowledge everyone involve in the survey, several organizations and individuals deserve special mention.

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We would be failing in our duty if we do not thank our respondents who spent their valuable time with tremendous patience.

Dr. Lalitha Kabilan<br>Director<br>GIRH\&FWT, Gandhigram

March, 2007

## KEY INDICATORS, Pondicherry

DISTRICT LEVEL HOUSEHOLD SURVEY- REPRODUCTIVE AND CHILD HEALTH, (DLHS-RCH), 2002-04

| Sample size |  |
| :---: | :---: |
| Households surveyed | 4,433 |
| Currently married women age 15-44. | 3,647 |
| Husband's of eligible women. | 2,773 |
| Characteristics of households |  |
| Percent rural. | 21.3 |
| Percent Hindu.. | 85.8 |
| Percent Muslim. | 6.8 |
| Percent other religion (Christian)......................... | 6.6 |
| Percent scheduled caste. | 18.9 |
| Percent scheduled tribe. | 0.2 |
| Percent with electricity. | 94.9 |
| Percent with flush toilet. | 63.8 |
| Percent with no toilet facility. | 28.9 |
| Percent living in Kachcha houses. | 21.9 |
| Percent living in Pucca houses. | 54.3 |
| Percent with low standard of living | 15.0 |
| Percent with high standard of living. | 57.7 |
| Percent with iodized salt (15+ppm). | 49.1 |
| Characteristics of currently married women age 15-44 years |  |
|  |  |
| Percent below age 30 | 40.8 |
| Percent with age at first cohabitation below age 18. | 23.2 |
| Percent illiterate........................................... | 17.9 |
| Percent having 10 or more years of schooling........ | 44.1 |
| Percent with illiterate husband......................... | 9.8 |
| Percent with husband 10+ years of schooling......... | 52.3 |
| Marriage |  |
| Mean age at marriage for boys ......................... | 27.6 |
| Mean age at marriage for girls. | 22.4 |
| Percent of boys married below age 21 | 2.4 |
| Percent of girls married below age 18................. | 4.9 |
| Fertility |  |
| Mean children ever born to women age 40-44 |  |
| years....................................... | 2.6 |
| Current use of family planning method |  |
| Any method.. | 63.3 |
| Any modern method. | 57.6 |
| Pill. | 0.6 |
| IUD.. | 2.8 |
| Condom................................................ | 5.2 |
| Female sterilization..................................... | 48.5 |
| Male sterilization........................................ | 0.5 |
| Any traditional method................................... | 5.7 |
| Rhythm/safe period..................................... | 3.4 |
| Withdrawal. | 2.2 |
| Unmet need for family planning |  |
| Percent with unmet need for spacing. | 4.5 |
| Percent with unmet need for limiting................... | 12.1 |
| Percent with total unmet need. | 16.6 |
| Maternal care ${ }^{2}$ |  |
| Percent of women received antenatal check-ups.... | 100.0 |
| Antenatal check-up at home............................ | 0.0 |
| Antenatal check-up in first trimester................... | 75.5 |
| Three or more visit for ANC. | 97.9 |
| Two or more tetanus toxoid injections.. | 97.2 |

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## SALIENT FINDINGS

For the assessment of district level Reproductive and Child Health indicators, Government of India proposed to undertake district level household surveys through non-governmental agencies on an annual basis. The District Level Household Survey (DLHS) was the result of government's initiative. In Pondicherry, Population Research Centre, Gandhigram Institute of Rural Health and Family Welfare Trust, Tamil Nadu was entrusted the work of carrying out the survey. The survey for Phase-I of the DLHS covering two districts of the state was conducted during June 2002 to November 2002. The survey for Phase-II covering the remaining two districts of the state was carried out during July 2004. The focus of the survey was on: i) Coverage of ante natal care (ANC) and immunization services, ii) Extent of safe deliveries, iii) Contraceptive prevalence rate and unmet need for family planning, iv) Awareness about RTI/STI and HIV/AIDS and v) Utilization of government health services and users' satisfaction. The salient findings of the survey are presented here.

For both the phases together, the data was collected from 4,433 households in Pondicherry. From these households 3,647 eligible women (usual resident or visitors who stayed in the sample household the night before the interview, currently married aged 15-44 years whose marriage was consummated) and 2,773 husbands of eligible women were interviewed.

Of the total households interviewed in Pondicherry, nearly 79 percent were from urban areas. There were 86 percent Hindu households. Muslim and Christian households constitute seven percent each in the sample. Nearly one-fifth (19 percent) of the households belonged to either scheduled castes or scheduled tribes. Twenty-two percent of the households lived in Kachcha, about 24 percent are in Semi-pucca and 54 percent are in pucca houses. Fifty-eight percent of the households belonged to high standard of living and the remaining households belonged to medium ( 27 percent) and low ( 15 percent) standard of living.

Eighty-four percent of population aged seven and above are literate. Percent literate among females is 78 where as it is 91 percent for male. Proportion of non-literate is higher among the older cohort compared to the younger ones. Nearly one-fifth (18 percent) of eligible women in the state are non-literate, and 27 percent have completed 11 or more years of schooling. In Pondicherry, the level of literacy among the eligible women and their husbands are high. As regards distribution of non-literate women, lesser proportion of younger women below age 30 are illiterate compared to older women age 30 and above. One-tenth ( 10 percent) of the men are non-literate and 34 percent have completed 11 or more years of schooling.

The reporting of the marriages during three yeas prior to survey gives the mean age at marriage among the boys and girls in the state as 28 and 22 years respectively. Two percent of boys and five percent of girls in the state got married before attaining the minimum legal age at marriage of 21 and 18 years respectively. In the districts of Karaikal and Mahe less than one percent of the boys got married below the legal minimum age at marriage. The proportion of girls married below the minimum legal age at marriage in Karaikal and Mahe districts are three percent and two percent respectively. In Yanam district at the highest of 12 percent of boys and 31 percent of girls married below the minimum legal age at marriage. In Pondicherry, the boys and girls married below the legal age at marriage are three percent and five percent respectively.

Nearly one-half of the households (49 percent) use cooking salt that is iodized at the recommended level of 15 parts per million or higher level of iodine content whereas 32 percent of households used salts that are not iodized at all. Lowest proportion of households in Mahe (13 percent) are using non-iodized salt whereas Yanam had the highest proportion of households (57 percent) used non-iodized salt. Thirty-seven percent of households in Karaikal and 36 percent of households in Pondicherry were using non-iodized salt.

On an average, women on the verge of completion of reproductive period have given birth to 2.6 children. The completed fertility in the state varies from the lowest of 2.6 children ever born per women in Mahe to the highest of 3.3 children in Yanam.

The share of births of order 3 and above in the total births that occurred three years prior to survey is 14 percent. In Pondicherry district, proportion of higher order births ranging from the lowest of around 12 percent in Pondicherry, to the highest of about 25 percent in Karaikal.

Out of pregnancies during the past three years to the survey, 88 percent ends in live births, five percent in induced abortions, six percent in spontaneous abortions and less than one percent ( 0.4 percent) in still births.

The data collected on the utilization of antenatal check-up (ANC) services for the women who had their last live/still birth during three years prior to survey shows that any ANC coverage in the state is 100 percent. Health workers visit to home of the women during their pregnancy is not reported for providing ANC. Forty-six percent of the women visited private health facilities and 70 percent received ANC from government health facilities.

In Pondicherry among women who had received ANC, 97 percent of women had checkup of weight and blood pressure and 95 percent examined abdomen. Fifty percent did sonography/ultrasound. Thirty percent of women received Iron and Folic Acid (IFA) tablets and 97 percent got at least one TT injection. A full package of ANC including minimum three ANC visits, at least one TT injection and 100 or more IFA tablets/Syrup was received by 29 percent of women.

Minimum three ANC and timing of first check up is crucial for maternal and child care. In Pondicherry nearly 76 percent of women got ANC in the first trimester and 98 percent had minimum three antenatal check-ups. An extent of ANC in first trimester varies from a minimum of 72 percent in Karaikal to the maximum of 87 percent in Yanam district. In Pondicherry district the lowest, 98 percent of women had minimum three ANC, whereas in Yanam it was the highest at 100 percent.

Ninety-seven percent of the total deliveries in Pondicherry were conducted in the health institutions; five percentages point up from RCH Round-I (92 percent). Government (70 per cent) health facilities were preferred more for delivery than private ( 27 percent) health facilities and a small proportion of births took place at home (2 percent). Ninety-nine percent of the total deliveries were safe i.e., assisted by midwifery trained persons such as Doctor/Nurse/ ANM/LHV. So in all, six percent points up from RCH Round-I (93 percent). The extent of institutional deliveries varies from the highest of 100 percent in Mahe and 99 percent in Pondicherry districts to the lowest of 82 percent in Yanam.

In Pondicherry, 25, 35 and 13 percent of the women experienced pregnancy, delivery and post delivery complications respectively. About 61 percent of the women sought treatment for the pregnancy and post-delivery complications. The pregnancy complication varies from the lowest of 16 percent in Yanam to the highest of 37 percent in Karaikal.

In Pondicherry district, the practice of breast-feeding is almost universal. However, the practice of initiation of breastfeeding within two hours of birth of the child is not universal. In Pondicherry, nearly three-fourths ( 74 percent) of women started breastfeeding the child within two hours of birth and 13 percent started after one day of birth. There is great deal of variation in the pattern of breastfeeding across the districts. The percentage of women breastfed the child within two hours of birth ranges from the lowest of 55 percent in Mahe district to the highest of 90 percent in Yanam district.

In Pondicherry, the percentage of children received the BCG vaccine, three doses of DPT, Polio and measles vaccine were 99, 93, 95 and 96 respectively. There is three percentage points drop from BCG to measles. It means that a smaller number of children that have contact with services providers are missed out of subsequent services. The complete schedule of immunization including BCG, three doses of DPT and Polio each and measles was received by 89 percent of the children, whereas the percentage of the children did not receive a single vaccination under routine programme is 0.1 percent. About 42 percent of the children received supplementation of at least one dose of vitamin A and only 11 percent children received IFA tablets/liquid for iron supplementation.

The extent of complete immunization consisting of BCG, three injections of DPT, three doses of Polio and measles is the lowest in Karaikal ( 85 percent) and highest in Yanam (95 percent).

In Pondicherry, 66 percent of the women were aware of diarrhoea management and 26 percent were aware of Oral Rehydration Salt (ORS). During the two-weeks period prior to survey, only six percent of the children suffered from diarrhoea, and 48 percent of children were treated by giving ORS. In comparison to awareness about diarrhoea management, the awareness about danger sings of pneumonia is quite low. Only six percent of the women reported awareness about danger sings of pneumonia. Only six percent of the women reported that their children suffered from cough, cold and difficulty in breathing in two-weeks period prior to survey and among them 90 percent sought treatment.

The knowledge of family planning methods is universal in all districts of Pondicherry. All the (100 percent) women reporting knowledge of one method or the other. However, the knowledge of any spacing method is marginally low, but the proportion per se is quite high ( 98 percent). The knowledge of any modern methods is also universal in all the districts, though the knowledge of all modern methods is 75 percent.

In DLHS, knowledge about No-Scalpel Vasectomy has been asked to husbands of eligible women. Twenty-nine percent of the husbands were aware of No-Scalpel Vasectomy in the state. The proportion of husbands knowing No-Scalpel Vasectomy varies from about three percent in Yanam to 35 percent in Karaikal.

The contraceptive prevalence rate (any methods) in the state is 63 percent, four percentage points up from RCH Round-I, comprising of prevalence of 58 percent of modern methods and six percent of traditional methods. Forty-nine percent of the women adopted sterilization. The percent user of the two male methods i.e., sterilization and condom is 0.5 and five percent respectively. There has been a negative association between contraceptive use and female education and standard of living and positive association between contraceptive use and availability of health facility. The highest contraceptive prevalence is in Yanam (71 percent) followed by Pondicherry ( 65 percent) and Mahe and Karaikal (59 percent each).

In Pondicherry, a total of 17 percent of women were found to have unmet need for family planning, with 12 percent for limiting and five percent for spacing. There are inter-district differences observed in the pattern of unmet need. The total unmet need varies from 14 percent in Yanam to 27 percent in Mahe.

Nearly one-fourth (23 percent) of the women in the state reported that a doctor, ANM/LHV, or male health worker visited them at their residence at least once in the past three months. Ninety-one percent of the women who were visited by ANM felt that ANM had given them sufficient time to discuss health-related matters and 92 percent were satisfied with the services/advices received from them.

In Yanam districts, only 10 percent of the women reported the visit of ANM/LHV to their residence. The percentage of the women reported visits of ANM/LHV to their residence in Pondicherry, Mahe and Karaikal are 21 percent, 36 percent and 43 percent respectively.

It has been observed that in three months period prior to survey, 44 percent of the eligible women who were required to consult health facility visited any of the Government health facilities. A small proportion of the women who visited the Government health facility ranging from seven percent to 17 percent rated facility as excellent. On the other hand, among the 56 percent of the women who did not visit the government health facility, 27 percent reported 'poor quality of services’ and for 30 percent 'time is not suited', 26 percent felt about 'heavy rush' and for two percent of them health facility is 'non-conveniently located' and for three percent of them doctors/health workers are not examine properly and bad quality of medicine as reasons.

The district level variation in the utilization of the government health facilities ranges from 43 percent in Pondichrry to 68 percent in Yanam. A large percentage of women visited to private health facilities ranges from 32 percent in Yanam to 56 percent in Pondicherry.

In Pondicherry 39 and 98 percent of women were aware of RTI/STI and HIV/AIDS respectively. The corresponding level of awareness among husbands of eligible women is 82 and 100 percent. The percent of women who are aware of RTI/STI is lowest in Pondicherry (34 percent) and to highest in Mahe (52 percent). Awareness of HIV/AIDS is lowest in Yanam (85 percent) and highest in Mahe (100 percent). Similarly awareness level of husbands of eligible women of RTI/STI is lowest in Yanam (39 percent) to highest in Pondicherry (87 percent). Awareness of HIV/AIDS is highest (about 99 percent) in all the districts.

Thirteen percent of women and one percent of husbands of eligible women in the state reported having at least one symptoms of RTI/STI. In all the districts the reported prevalence of RTI/STI among husbands was low. The prevalence of RTI/STI for women and men is lowest in Yanam ( 6 percent and 0.2 percent respectively) and highest in Karaikal ( 22 percent and 2 percent respectively). Eight percent of women reported vaginal discharge with a lowest at three percent in Mahe and highest at 10 percent each in Pondicherry and Karaikal. Thirty-five percent of women sought treatment for vaginal discharge problem.

## CHAPTER I

## INTRODUCTION

### 1.1 Background and Objectives of the Survey

The Reproductive and Child Health ( RCH ) programme that has been launched by Government of India (GoI) in 1996-97 is expected to provide quality services and achieve multiple objectives. It ushered a positive paradigm shift from method-oriented, target-based activity to providing client-centred, demand-driven quality services. Also, efforts are being made to reorient provider's attitude at grassroots level and to strengthen the services at outreach levels.

The new approach requires decentralization of planning, monitoring and evaluation of the services. The district being the basic nucleus of planning and implementation of the RCH programme, Government of India has been interested in generating district level data on utilization of the services provided by government health facilities, other then that based on service statistics. It is also of interest to assess people's perceptions on quality of services. Therefore, it was decided to undertake District Level Household Survey (DLHS) under the RCH programme in the country.

The Round I of RCH survey was conducted in India during the year 1998-99 in two phases (each phase covered half of the districts from all states/union territories) in 504 districts for which International Institute for Population Sciences (IIPS), Mumbai was designated as the nodal agency.

In Round II, survey was completed during 2002-04 in 593 districts as per the 2001 Census. In DLHS-RCH, information about RCH has been collected using a slightly modified questionnaire. In Round II, some new dimensions, such as test of cooking salt to assess the consumption of salt fortified with iodine, collection of blood of children, adolescents and pregnant women to assess the level of anaemia, and measurement of weight of children to assess the nutritional status, were incorporated.

The main focus of the DLHS-RCH has been on the following aspects:
$>$ Coverage of ANC \& immunization services
> Proportion of safe deliveries
> Contraceptive prevalence rates
> Unmet need for family planning
> Awareness about RTI/ STI and HIV/AIDS
$>$ Utilization of government health services and users' satisfaction.
For the purpose of conducting DLHS-RCH, all the states and the union territories were grouped into 16 regions. A total of twelve research organizations including Population Research Centres (PRCs) were involved in conducting the survey in 16 regions with IIPS as the nodal agency.

### 1.2 Survey Design

In Round II, a systematic, multi-stage stratified sampling design was adopted. In each district, 40 Primary Sampling Units (PSUs - Villages/Urban Frame Size) were selected with probability proportional to size (PPS) using the 1991 Census data. All the villages were stratified according to population size, and female literacy was used for implicit arrangement within each strata. The number of PSUs in rural and urban areas was decided on the basis of percent of urban population in the district. However, a minimum of 12 urban PSUs were selected in each district in case the percent urban was low. The target sample size in each district was set at 1,000 complete residential households from 40 selected PSUs. In the second stage, within each PSU, 28 residential households were selected with Circular Systematic Random Sampling (CSRS) procedure after house listing. In order to take care of non-response due to various reasons, sample was inflated by 10 percent (i.e. 1,100 households).

For selecting the urban sample, the National Sample Survey Organization (NSSO) provided the list of selected urban frame size (UFS) blocks in the district. The UFS blocks were made available separately for each district for urban areas. The maps of selected blocks were obtained from the NSSO field office located in each state/union-territory.

But in each state, in two districts, the PSUs that were surveyed in Round I of DLHS-RCH (also known as RHS-RCH) were also selected for survey in Round II. This was done in order to measure the changes more accurately. Two districts, one with the highest proportion of safe delivery and another with the lowest proportion of safe delivery among those surveyed during Round I of the survey were selected for this purpose. In all other districts, fresh sample of PSUs were selected.

### 1.3 House Listing and Sample Selection

The household listing operation was carried out in each of the selected PSU segment prior to the data collection that provided the necessary frame for selecting the households. The household listing operation also involved preparation of location map and layout sketch map of the structures and recording the details of the households in these structures in each selected PSU. This exercise was carried out by independent teams each comprising one lister, one mapper and one supervisor under the overall guidance and monitoring of the survey coordinator of households of the selected regional agencies.

A complete listing of households was carried out in villages with households up to 300 . In case of villages with more than 300 households but less than or equal to 600 households, two segments of more or less same size were formed and one segment was selected at random and household listing was carried out. In case of villages with more than 600 households, segments each of about 150 households were formed and two segments were selected for listing using the systematic random sampling method.

Small villages with less than 50 households were linked with a nearest village. After combining it with the nearest village, the same sampling procedure was adopted as mentioned above.

For the urban PSUs, the selected UFS blocks needed no segmentation as they were of almost equal size and contained less than 300 households.

No replacement was made if selected household was absent during data collection. However, if a PSU was inaccessible, a replacement PSU with similar characteristics was selected by the IIPS and provided to the regional agency for survey.

### 1.4 Questionnaire

DLHS-RCH collected information on a various indicators pertaining to RCH that would assist policymakers and programme managers to formulate and implement the goals set for RCH programmes. The International Institute for Population Sciences (IIPS), Mumbai, the Nodal Agency for DLHS-RCH project has made necessary modifications in the two Questionnaires: Households Questionnaire and Women's Questionnaire and added three more Questionnaires i.e., Husband's Questionnaire, Village Questionnaire and Health Questionnaire, in consultation with MoHFW and World Bank. These Questionnaires were discussed and finalized in training cum workshop organized at IIPS during the first week of November 2001.

These modified questionnaires had been canvassed in Round II of the DLHS-RCH survey, taking into consideration the views of all the regional agencies involved. The house-listing teams and the interviewers and the supervisors for the main survey were given rigorous training based on the manuals developed for the purpose by the Nodal Agency.

All the questionnaires were bilingual, with questions in both regional and English language.
The Details of questionnaires are as follows:
Household Questionnaire: The household questionnaire lists all usual residents in each sample household including visitors who stayed in the household the night before the interview. For each listed household member, the survey collected basic information on age, sex, marital status, relationship to the head of the household, education and the prevalence/incidence of tuberculosis, blindness and malaria. Information was also collected on the main source of drinking water, type of toilet facility, source of lighting, type of cooking fuel, religion and caste of household head and ownership of other durable goods in the household. In addition, a test was conducted to assess whether the household used cooking salt that has been fortified with iodine. Besides, details of marriages and deaths which happen to usual residents within reference period were collected. Efforts were also made to get information about maternal deaths.

Women Questionnaire: Women questionnaire is designed to collect information from currently married women age $15-44$ years who are usual residents of the sample household or visitors who stayed in the sample household the night before the interview. The women questionnaire covered the following sections:

Section I: Background Characteristics: In this section the information collected on age, educational status and birth and death history of biological children including still birth, induced and spontaneous abortions.

Section II: Antenatal, Natal and Post natal Care: In this section the questionnaire collect information only from the women who had live birth, still birth, spontaneous or induced abortion during last three years preceding the survey date. The information on whether women received antenatal and postpartum care, who attended the delivery and the nature of complications during pregnancy for recent births were also collected.

Section III: Immunization and childcare: This section gives information about feeding practices, the length of breastfeeding, immunization coverage and recent occurrence of diarrhoea and pneumonia for young children (below age 3 years).

Section IV: Contraception: This section provides information on knowledge and use of specific family planning methods. Questions were included about reasons for non use, intentions about future use, desire for additional child, sex preference for next child etc.

Section V: Assessment of quality of Government health services and client satisfaction. In this section the questions are targeted to assess the quality of family planning and health services provided by Government health facilities. The information were also collected about the rating of Government health facilities and staffs and reasons for not visiting to government health facilities by eligible woman.

Section VI: Awareness about RTI/STI and HIV/AIDS: In this section the information were collected about women's knowledge of RTI/STI awareness, source of knowledge, awareness on mode of transmission, curability, symptoms and treatment seeking behaviour. About HIV/AIDS; awareness, source of knowledge, aware of mode of transmission and prevention etc., were canvassed.

Husband Questionnaire: In DLHS-RCH, Round II, husband questionnaire was used to collect information from eligible women's husbands about age, educational status, knowledge and source of knowledge of RTI/STI and HIV/AIDS, reported symptoms of RTI/STI and male participation. Apart from these information desires for children, reasons for not using F.P. methods, future intention to use F.P. methods and knowledge about no scalpel vasectomy (NSV) has also been collected.

Health Questionnaire: In DLHS-RCH, Round II, a health questionnaire is included. The information collected were weight of children age $0-71$ months old and the blood sample to assess the haemoglobin levels of children age $0-71$ months old, adolescents $10-19$ years old and pregnant eligible women. This information is useful for assessing the levels of nutrition prevailing in the population and prevalence of anaemia among women, adolescent girls and children.

Village Questionnaire: A village questionnaire is also added in this round of DLHS. The information collected on the availability and accessibility of various facilities in the village especially on accessibility of educational and health facilities.

### 1.5 Fieldwork and Sample Coverage

The fieldwork for RCH Round II was done in two phases. During Phase I, two districts were covered from June 2002 to November 2002 and remaining two districts were covered during Phase II in July 2004.

During Round II, a total of 4,433 households were covered. From these surveyed households, 3,647 currently married women (aged 15-44 years) and 2,773 husbands of eligible women were interviewed.

### 1.6 Data processing

All the five types of completed questionnaires were brought to the headquarter of regional agencies and data were processed using microcomputers. The process consisted of office editing of questionnaires, data entry, data cleaning and tabulation. Data cleaning included validation, range and consistency checks. For both data entry and tabulation of the data, IIPS developed the software package. The district and state level reports were prepared by regional agency whereas national report is prepared by the nodal agency.

### 1.7 Sample Weights

In generating district level demographic indicators sample weight for household, women and husband, weight have been used and these for a particular district are based on three selection probabilities $f_{1},{ }^{i},{ }_{2}{ }^{i}$ and $f_{3}{ }^{i}$ pertaining to $i^{\text {th }}$ PSU of the district. These probabilities are defined as
$f_{1}^{i}=$ Probability of selection of $\mathrm{i}^{\text {th }}$ PSU in a district

$$
=\frac{\left(n_{r}^{*} H_{i}\right)}{H}
$$

Where, $n_{r}$ is the number of rural PSU to be selected in a district, $H_{i}$ refers to the number of household in the $\mathrm{i}^{\text {th }}$ PSU and $H=\sum_{H i}$, total number of household in a district.
$f_{2}^{i}=$ Probability of selecting segment (s) from segmented PSU (in case the $\mathrm{i}^{\text {th }}$ selected PSU is segmented)
$=$ (Number of ${ }_{i}$ segments selected after segmentation of PSU) / (number of segment created a PSU) The value of $f_{2}$ is to be equal to one for un-segmented PSU.
$f_{3}^{i}=$ probability of selecting a household from the total listed households of a PSU or in segment(s) of a PSU
$=\frac{28^{*} H R_{i}}{H L_{i}}$
Where $\mathrm{HR}_{\mathrm{i}}$ is the household response rate of the $\mathrm{i}^{\text {th }}$ sampled PSU and $\mathrm{HL}_{\mathrm{i}}$ is the number of households listed in $\mathrm{i}^{\text {th }}$ PSU in a district.

For urban PSU, $\mathrm{f}_{1}{ }^{i}$ is computed either as the ratio of number of urban PSUs to be included from the district to the total number of UFS blocks of the district or as the ratio of urban population of the selected PSU to the total urban population of the district.

The probability of selecting a household from the district works out as;

$$
f^{i}=\left(f_{1}^{i} * f_{2}^{i} * f_{3}^{i}\right)
$$

The non-normalized household weight for the $\mathrm{i}^{\text {th }}$ PSU of the district is, $w^{i}=\frac{1}{f^{i}}$, while the normalized weight used in the generation of district indicators as

$$
n_{i}^{d}=\frac{\sum_{i} n_{i}}{\sum_{i} n_{i} * w^{i}} * w^{i}, \mathrm{i}=1,2,3 \ldots \ldots \ldots \ldots .40 .
$$

Where $n_{i}$ is the number of households interviewed in the $i^{\text {th }}$ PSU. The weight for women and husband are computed in the similar manner after multiplication of expression for $f^{i}$ by the corresponding response rate. State weights for households, women and husbands are further derived from the district weights $n_{i}^{d}$ for the $\mathrm{i}^{\text {th }} \mathrm{psu}$ in $\mathrm{d}^{\text {th }}$ district using external control so that for sample results do not deviate from the corresponding information about the population.

Let, $n_{s}=\sum_{i} n_{i}^{d}$ and $N_{I}=\sum_{i} N_{i}^{d}$, denote the number of households in the sample and census of a particular state, then state level households weights are work out as;
$n_{i}^{s}=n_{i}^{d} * \frac{\left(n_{i}^{d} / n_{s}\right)}{\left(N_{i}^{d} / N_{S C}\right)}$, where $n_{i}^{d}$ household sample in $\mathrm{i}^{\text {th }}$ district, $n_{s}$ is the total sample in the state, $N_{i}^{d}$ is the census population in the ith district and $N_{S C}$ is the census population in the state. These households' weights are controlled for rural-urban separately. Considering sample and census currently married women in 15-44 years and married males above 15 years for specified state by districts and rural-urban residence, state level women and husbands' weights are obtained for estimation of state level indicators.

### 1.8 Sample Implementation

Table 1.1 shows the period of fieldwork, number of households interviewed and household's response rates. A total of 4,433 households are interviewed, little more than one-fifth (21 percent) were rural. The overall household response rate - the number of households interviewed per 100 occupied households was 100 percent. The household response rate was 100 percent in all the districts.


In the interviewed households, interviews were completed with 3,647 currently married women who are the usual member of the household or stayed night before the household interview and 2,773 husbands of eligible women were also interviewed (Table1.2). The number of completed interviews per 100 identified eligible women and husbands in the households with completed interviews were 97 and 86 percent respectively. The variation in the women's response rate by district was highest in Karaikal (100 percent) and lowest in Mahe ( 91 percent). Similarly, husband's response rate was found to be highest in Pondicherry (99 percent) and lowest in Mahe (44 percent).

| Table 1.2 NUMBER OF WOMEN AND HUSBANDS INTERVIEWED <br> Number of women and husbands interviewed by district, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Numb | women | viewed |  | Numbe | usband | rviewed |  |
| UT/District | Total | Rural | Urban | rate | Total | Rural | Urban | rate |
| UT | 3,647 | 738 | 2,909 | 96.6 | 2,773 | 688 | 2,085 | 86.3 |
| Mahe | 1,004 | 0 | 1,004 | 91.3 | 286 | 0 | 286 | 43.7 |
| Yanam | 920 | 0 | 920 | 97.8 | 892 | 0 | 892 | 94.8 |
| Karaikal | 899 | 486 | 413 | 99.8 | 807 | 444 | 363 | 98.1 |
| Pondicherry | 824 | 252 | 572 | 98.7 | 788 | 244 | 544 | 98.9 |
| Note: Table based on unweighted cases. |  |  |  |  |  |  |  |  |

### 1.9 Basic Demographic Profile of the State

Before presenting the survey result, the basic demographic features of Pondicherry and its districts (as per census, 2001) are presented here.

The state of Pondicherry, located in the southern part of the country with 9.7 lakhs population in 2001 ranks $28^{\text {th }}$ in population size in India. The union territory of Pondicherry is unique in its geography with its four districts located in four different part of South India. The two major districts of the Union territory, namely Pondicherry and Karaikal are located in coastal border area of Tamil Nadu. The other two fully urban district Mahe and Yanam are located in coastal border area of Kerala and Andhrapradesh respectively. The state is consisted of four districts, six community development blocks, 10 Commune Panchayats (sub-districts), 92 revenue villages. The urban areas of the state comprise 10 towns and 6 statutory towns during 2001. Pondicherry is the capital of the state.

According to 2001 census the population of Pondicherry is 9.7 lakhs out of which 4.8 lakhs are males and 4.9 lakhs are females. The rural and urban breakup of the population shows that 33.4 percent of the population was enumerated in rural areas and 66.6 percent in urban areas. Keeping pace with the national average, Pondicherry has recorded a sharp decline in the decadal growth rate from 33.6 per cent in 1981-91 to 20.6 percent during 1991-2001. Among the districts, Yanam with 54.7 percent has the highest decadal growth rate whereas Mahe with 10.1 percent has the lowest decadal growth rate of total population during 1991-2001.

Percentage of both Scheduled Caste and Schedule Tribe population have experienced a marginal increase during 1991-2001 and the proportion of schedule caste population in total population of 2001 is 16.2 percent. Highest proportion of Schedule Caste population has been recorded in Yanam district ( 18.5 per cent) and Mahe has the lowest proportion of SC ( 0.3 percent). With a population density of 2034 per sq. km., Pondicherry ranks 3rd among the states and union territories in India and this figure is higher than the all India density of 325 persons per square km. Among the districts, Mahe has the highest density (4092 person/sq. km.) and Karaikal has the lowest (1067 person/sq. km).

The sex ratio of the total population in the state has improved since 1991 Census from 979 to 1001 per 1000 males. Mahe has recorded the highest sex ratio (1147) and Yanam has the lowest (975) within the state.

The literacy rate in the state has improved from 74.7 percent in 1991 to 81.2 percent in 2001 and it is higher than even the national average of 64.8 percent. The literacy rate in urban ( 82.5 percent) is considerably higher in the state than that in rural areas ( 66.2 percent). Among the districts, Mahe has the highest literacy rate of 95.7 percent. Yanam has the lowest literacy rate of 73.7 percent. The male literacy for the state is 88.6 percent and the female literacy rate is 73.9 percent. Both the rates have increased from 1991 census to 2001 census.

## Table 1.3 BASIC DEMOGRAPHIC INDICATOR

Basic demographic indicator of India, state and districts, Census 2001

| India/state/district | Population (in thousand) | Percentageurban | Percentage decadal growth rate ${ }^{1}$ | $\begin{aligned} & \text { Sex } \\ & \text { ratio }^{2} \end{aligned}$ | Percentage literate 7+ |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  | Male | Female | Persons |
| India | 1,028,737 | 28.0 | 21.5 | 933 | 75.3 | 53.7 | 64.8 |
| State | 974 | 66.6 | 20.6 | 1001 | 88.6 | 73.9 | 81.2 |
| Karaikal | 171 | 43.6 | 17.1 | 1022 | 89.4 | 74.7 | 81.9 |
| Mahe | 37 | 100.0 | 10.1 | 1147 | 97.6 | 94.0 | 95.7 |
| Pondicherry | 735 | 68.8 | 20.9 | 990 | 88.4 | 72.8 | 80.7 |
| Yanam | 31 | 100.0 | 54.7 | 975 | 78.8 | 68.5 | 73.7 |

## CHAPTER II

## BACKGROUND CHARACTERISTICS OF HOUSEHOLD

This chapter provides a socio-economic and demographic profile of households interviewed in the District Level Household Survey-Reproductive and Child Health. Facilities and services such as health, education and communication available in the representative sampled village are also presented here. The de facto procedure of enumeration is adopted in order to include every individual staying in the sampled Primary Sampling Units (PSU), either a village or an urban area, the night before the survey. The objective of adopting the de facto method is to avoid duplication of persons who are in transit.

### 2.1 Age - Sex Structure

The age-sex distribution of sampled household population classified by residence is presented in Table 2.1. The percent distribution is based on sampled de facto population of 19,833 persons of whom 21 percent lived in the rural areas of Pondicherry. The state of Pondicherry depicts a young and growing population with 26 percent below the age of 15 years (Figure 2.1). Children below 15 years in rural areas ( 26 percent) does not differ much from those in urban areas ( 25 percent).


The higher proportion of females in 20-24 years age group compared to preceding and succeeding age groups may be due to their misreporting of age.

The overall sex ratio of 96 males per 100 females is recorded for the de facto population. The sex ratio is little more in rural areas (98) compared to urban areas (96).

| Table 2.1 HOUSEHOLD POPULATION BY AGE AND SEX |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Age | Total |  |  | Rural |  |  | Urban |  |  |
|  | Total | Male | Female | Total | Male | Female | Total | Male | Female |
| <1 | 1.7 | 2.0 | 1.5 | 1.8 | 1.9 | 1.7 | 1.7 | 2.0 | 1.4 |
| 1-4 | 6.5 | 6.8 | 6.2 | 7.4 | 7.1 | 7.6 | 6.2 | 6.7 | 5.8 |
| 5-9 | 8.3 | 8.7 | 7.8 | 8.3 | 8.3 | 8.3 | 8.2 | 8.8 | 7.7 |
| 10-14 | 9.0 | 9.6 | 8.5 | 8.6 | 8.9 | 8.3 | 9.1 | 9.8 | 8.5 |
| 15-19 | 8.0 | 8.3 | 7.7 | 9.2 | 9.0 | 9.5 | 7.7 | 8.0 | 7.3 |
| 20-24 | 10.6 | 9.8 | 11.3 | 10.5 | 10.5 | 10.6 | 10.6 | 9.6 | 11.5 |
| 25-29 | 9.5 | 9.2 | 9.7 | 10.3 | 10.8 | 9.7 | 9.3 | 8.8 | 9.7 |
| 30-34 | 8.1 | 8.0 | 8.2 | 7.4 | 7.8 | 6.9 | 8.3 | 8.1 | 8.6 |
| 35-39 | 7.9 | 8.1 | 7.7 | 7.1 | 7.0 | 7.1 | 8.1 | 8.4 | 7.8 |
| 40-44 | 7.1 | 7.3 | 7.0 | 7.0 | 6.4 | 7.6 | 7.2 | 7.6 | 6.8 |
| 45-49 | 4.9 | 5.4 | 4.5 | 4.3 | 5.3 | 3.4 | 5.1 | 5.4 | 4.8 |
| 50-54 | 4.8 | 4.8 | 4.8 | 3.8 | 3.7 | 3.9 | 5.1 | 5.0 | 5.1 |
| 55-59 | 3.3 | 2.9 | 3.6 | 3.4 | 3.1 | 3.7 | 3.3 | 2.9 | 3.6 |
| 60-64 | 3.4 | 3.2 | 3.7 | 3.7 | 2.9 | 4.5 | 3.4 | 3.3 | 3.4 |
| 65-69 | 2.3 | 1.9 | 2.7 | 2.4 | 2.3 | 2.5 | 2.3 | 1.8 | 2.7 |
| 70-74 | 2.1 | 2.0 | 2.2 | 2.5 | 2.7 | 2.3 | 1.9 | 1.8 | 2.1 |
| 75-79 | 1.2 | 1.1 | 1.3 | 1.2 | 1.3 | 1.2 | 1.2 | 1.1 | 1.3 |
| 80+ | 1.3 | 0.9 | 1.6 | 1.1 | 0.9 | 1.2 | 1.3 | 0.9 | 1.7 |
| Total percent | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Number of persons | 19,833 | 9,716 | 10,117 | 4,150 | 2,051 | 2,099 | 15,683 | 7,665 | 8,018 |
| Sex ratio ${ }^{1}$ | 96 | NA | NA | 98 | NA | NA | 96 | NA | NA |

Note: Table is based on the de facto population, i.e. persons who stayed in the household the night before the interview (including both usual resident and visitors). NA: Not applicable. ${ }^{1}$ Male per 100 females

### 2.2 Household Characteristics

The percent distribution of 4,433 households surveyed in the state of Pondicherry by selected characteristics of the household head and the number of usual household members are shown in Table 2.2. This is based on de jure, the usual resident population. Eighty-one percent of household heads are male. Households headed by male are more in rural ( 84 percent) than in urban ( 80 percent) while only 19 percent are female-headed households. Seventy-two percent of household heads are in the 30-59 years age group. The median age of household heads is 46 years for the state as a whole, while it is 45 years in rural areas and 46 years in urban areas. About seven percent of household heads are younger than 30 years and 20 percent are at least 60 years old. Majority of the household heads are Hindus ( 86 percent), seven percent each are Muslims and Christians. Hindus constitute a higher proportion of population in both urban ( 83 percent) and rural areas ( 95 percent). Only three percent of the rural households and eight percent of the urban households are Muslims or Christians.

| Percent distribution of the household head by selected characteristics of the household head and household size, according to residence, Pondicherry, 2002-04 |  |  |  |
| :---: | :---: | :---: | :---: |
|  |  | Residence |  |
| Characteristic | Total | Rural | Urban |
| Sex of the household head |  |  |  |
| Male | 81.0 | 84.1 | 80.2 |
| Female | 19.0 | 15.9 | 19.8 |
| Age of the household head |  |  |  |
| < 30 | 7.3 | 8.8 | 6.9 |
| 30-44 | 41.2 | 40.7 | 41.3 |
| 45-59 | 31.2 | 30.2 | 31.4 |
| 60+ | 20.3 | 20.3 | 20.3 |
| Median age of the household head | 45.7 | 45.1 | 45.8 |
| Religion of the household head |  |  |  |
| Hindu | 85.8 | 94.7 | 83.4 |
| Muslim | 6.8 | 2.5 | 7.9 |
| Christian | 6.6 | 2.5 | 7.7 |
| Sikh | 0.1 | 0.3 | 0.0 |
| Buddhist | 0.1 | 0.0 | 0.1 |
| Jain | 0.3 | 0.0 | 0.4 |
| Zoroastrian | 0.3 | 0.0 | 0.3 |
| No Religion | 0.2 | 0.0 | 0.2 |
| Caste/tribe of the household head |  |  |  |
| Scheduled caste | 18.9 | 36.4 | 14.1 |
| Scheduled tribe | 0.2 | 0.4 | 0.2 |
| Other backward class | 78.0 | 63.0 | 82.0 |
| Other \# | 2.6 | 0.2 | 3.2 |
| Don't know | 0.3 | 0.0 | 0.4 |
| Number of usual members |  |  |  |
| 1 | 4.0 | 4.8 | 3.8 |
| 2 | 9.9 | 11.3 | 9.5 |
| 3 | 15.6 | 13.1 | 16.3 |
| 4 | 27.3 | 24.7 | 28.1 |
| 5 | 20.3 | 24.2 | 19.2 |
| 6 | 11.9 | 9.9 | 12.5 |
| 7 | 4.8 | 6.4 | 4.3 |
| 8 | 2.5 | 3.0 | 2.3 |
| 9+ | 3.7 | 2.7 | 4.0 |
| Mean household size | 4.4 | 4.4 | 4.4 |
| Total percent | 100.0 | 100.0 | 100.0 |
| Number of households | 4,433 | 945 | 3,488 |
| Note: Table is based on the de jure population <br> \# Higher caste (Not belonging to a scheduled caste, a scheduled tribe and an other backward class) |  |  |  |

Nineteen percent of the households in Pondicherry belongs to schedule caste, 78 percent of the households are headed by other backward classes and three percent are other castes not under schedule caste, schedule tribe and other backward classes. Thirty-six percent of the household head belong to schedule caste in rural areas and it is only 14 percent in urban areas. The overall state average household size is 4.4 persons and it is similar in both rural and urban areas.

### 2.3 Educational Level

The educational background of Pondicherry presented in this section is based on de facto household population. Level of literacy and years of schooling, according to age, sex and residence are shown in Table 2.3.

| Table 2.3 EDUCATIONAL LEVEL OF THE HOUSEHOLD POPULATION <br> Percent distribution of household population age 7 and above by literacy level and years of schooling, according to age , residence and sex, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Literate | Years of schooling |  |  |  |  |  |  |
| Age | Nonliterate | but no schooling | 1-5 | 6-8 | 9-10 | 11 or more | Missing | Total Percent | Number of persons |
| TOTAL <br> Male |  |  |  |  |  |  |  |  |  |
| 7-9 | 3.3 | 0.1 | 95.4 | 0.4 | 0.0 | 0.0 | 0.8 | 100.0 | 491 |
| 10-14 | 1.1 | 0.0 | 31.2 | 58.3 | 9.1 | 0.0 | 0.3 | 100.0 | 932 |
| 15-19 | 2.2 | 0.0 | 3.5 | 19.3 | 36.4 | 38.5 | 0.0 | 100.0 | 802 |
| 20-29 | 5.0 | 0.0 | 5.8 | 17.7 | 25.5 | 46.0 | 0.0 | 100.0 | 1,843 |
| 30-39 | 7.4 | 0.0 | 10.1 | 20.6 | 25.4 | 36.6 | 0.0 | 100.0 | 1,568 |
| 40-49 | 11.5 | 0.0 | 9.9 | 21.5 | 21.3 | 35.9 | 0.0 | 100.0 | 1,233 |
| 50+ | 20.2 | 0.0 | 19.0 | 14.6 | 16.0 | 30.2 | 0.0 | 100.0 | 1,640 |
| Total | 8.5 | 0.0 | 17.5 | 21.8 | 20.8 | 31.4 | 0.1 | 100.0 | 8,508 |
| Female |  |  |  |  |  |  |  |  |  |
| 7-9 | 2.3 | 0.0 | 95.4 | 0.9 | 0.0 | 0.0 | 1.4 | 100.0 | 466 |
| 10-14 | 1.1 | 0.0 | 32.0 | 53.8 | 12.5 | 0.0 | 0.7 | 100.0 | 858 |
| 15-19 | 3.1 | 0.0 | 2.0 | 15.2 | 38.9 | 40.7 | 0.0 | 100.0 | 784 |
| 20-29 | 8.8 | 0.0 | 6.6 | 16.5 | 23.8 | 44.3 | 0.0 | 100.0 | 2,129 |
| 30-39 | 21.8 | 0.0 | 12.5 | 20.9 | 20.3 | 24.5 | 0.0 | 100.0 | 1,608 |
| 40-49 | 29.6 | 0.0 | 16.0 | 17.0 | 19.6 | 17.8 | 0.0 | 100.0 | 1,161 |
| 50+ | 54.7 | 0.0 | 17.2 | 11.7 | 6.6 | 9.8 | 0.0 | 100.0 | 2,012 |
| Total | 22.5 | 0.0 | 17.8 | 18.9 | 17.8 | 22.8 | 0.1 | 100.0 | 9,017 |
| Total |  |  |  |  |  |  |  |  |  |
| 7-9 | 2.8 | 0.1 | 95.4 | 0.6 | 0.0 | 0.0 | 1.1 | 100.0 | 957 |
| 10-14 | 1.1 | 0.0 | 31.6 | 56.1 | 10.8 | 0.0 | 0.5 | 100.0 | 1,790 |
| 15-19 | 2.7 | 0.0 | 2.8 | 17.3 | 37.7 | 39.6 | 0.0 | 100.0 | 1,586 |
| 20-29 | 7.0 | 0.0 | 6.2 | 17.1 | 24.6 | 45.1 | 0.0 | 100.0 | 3,972 |
| 30-39 | 14.7 | 0.0 | 11.3 | 20.7 | 22.8 | 30.5 | 0.0 | 100.0 | 3,176 |
| 40-49 | 20.2 | 0.0 | 12.9 | 19.3 | 20.5 | 27.1 | 0.0 | 100.0 | 2,393 |
| 50+ | 39.2 | 0.0 | 18.0 | 13.0 | 10.8 | 19.0 | 0.0 | 100.0 | 3,652 |
| Total | 15.7 | 0.0 | 17.7 | 20.3 | 19.3 | 27.0 | 0.1 | 100.0 | 17,525 |
| Note: Table is based on de facto population. |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  | Contd. |

Table 2.3 indicates that, 16 percent of the population aged seven and above are non-literate. The proportion of non-literates is more among females ( 23 percent) compared to males ( 9 percent). The proportion of non-literate is much higher among the older cohorts compared to the younger ones. For both males and females, going by expected trend, the level of literacy is higher in the younger population than in the older age groups (Figure 2.2).

Figure 2.2
Percentage Literate by Age and Sex


| Table 2.3 EDUCATIONAL LEVEL OF THE HOUSEHOLD POPULATION <br> Percent distribution of household population age 7 and above by literacy level and years of schooling, according to age , residence and sex, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Literate but | Years of schooling |  |  |  |  |  |  |
| Age | Nonliterate | no schooling | 1-5 | 6-8 | 9-10 | $\begin{aligned} & 11 \text { or } \\ & \text { more } \end{aligned}$ | Missing | Total Percent | Number of persons |
| RURAL Male |  |  |  |  |  |  |  |  |  |
| 7-9 | 4.0 | 0.5 | 94.8 | 0.6 | 0.0 | 0.0 | 0.0 | 100.0 | 99 |
| 10-14 | 2.6 | 0.0 | 34.4 | 51.9 | 9.9 | 0.0 | 1.1 | 100.0 | 183 |
| 15-19 | 3.8 | 0.0 | 2.4 | 25.1 | 36.7 | 32.0 | 0.0 | 100.0 | 185 |
| 20-29 | 6.3 | 0.0 | 7.2 | 17.9 | 32.9 | 35.7 | 0.0 | 100.0 | 437 |
| 30-39 | 11.7 | 0.0 | 10.7 | 26.3 | 28.0 | 23.3 | 0.0 | 100.0 | 305 |
| 40-49 | 26.0 | 0.0 | 14.5 | 23.9 | 15.1 | 20.5 | 0.0 | 100.0 | 240 |
| 50+ | 38.4 | 0.0 | 23.1 | 21.2 | 7.9 | 9.5 | 0.0 | 100.0 | 347 |
| Total | 15.3 | 0.0 | 19.0 | 24.0 | 21.1 | 20.5 | 0.1 | 100.0 | 1,796 |
| Female |  |  |  |  |  |  |  |  |  |
| 7-9 | 1.9 | 0.0 | 98.1 | 0.0 | 0.0 | 0.0 | 0.0 | 100.0 | 98 |
| 10-14 | 0.4 | 0.0 | 24.7 | 63.9 | 10.8 | 0.0 | 0.3 | 100.0 | 174 |
| 15-19 | 3.6 | 0.0 | 4.4 | 24.0 | 40.3 | 27.7 | 0.0 | 100.0 | 198 |
| 20-29 | 12.9 | 0.0 | 7.5 | 25.9 | 29.6 | 24.0 | 0.0 | 100.0 | 426 |
| 30-39 | 40.0 | 0.0 | 17.2 | 19.8 | 11.8 | 11.2 | 0.0 | 100.0 | 295 |
| 40-49 | 56.2 | 0.0 | 16.6 | 14.3 | 8.2 | 4.7 | 0.0 | 100.0 | 232 |
| 50+ | 82.1 | 0.0 | 9.1 | 6.8 | 1.0 | 0.9 | 0.0 | 100.0 | 404 |
| Total | 35.3 | 0.0 | 16.7 | 21.2 | 15.5 | 11.2 | 0.0 | 100.0 | 1,828 |
| Total |  |  |  |  |  |  |  |  |  |
| 7-9 | 3.0 | 0.3 | 96.5 | 0.3 | 0.0 | 0.0 | 0.0 | 100.0 | 197 |
| 10-14 | 1.5 | 0.0 | 29.7 | 57.7 | 10.3 | 0.0 | 0.7 | 100.0 | 356 |
| 15-19 | 3.7 | 0.0 | 3.4 | 24.5 | 38.6 | 29.8 | 0.0 | 100.0 | 383 |
| 20-29 | 9.6 | 0.0 | 7.4 | 21.9 | 31.3 | 29.9 | 0.0 | 100.0 | 863 |
| 30-39 | 25.7 | 0.0 | 13.9 | 23.1 | 20.0 | 17.3 | 0.0 | 100.0 | 600 |
| 40-49 | 40.8 | 0.0 | 15.5 | 19.2 | 11.7 | 12.7 | 0.0 | 100.0 | 472 |
| 50+ | 61.9 | 0.0 | 15.6 | 13.5 | 4.2 | 4.9 | 0.0 | 100.0 | 752 |
| Total | 25.4 | 0.0 | 17.8 | 22.6 | 18.3 | 15.8 | 0.1 | 100.0 | 3,623 |
|  |  |  |  |  |  |  |  |  | Contd. |

Around 95 percent of males and females in 7-9 years age group had 1-5 years of schooling. Eighteen percent of males and females have had education for 1-5 years. Lesser proportion of females are found in higher education of $9-10$ years and 11 or more years (18 percent and 23 percent respectively) compared to the males having corresponding figures of 21 percent and 31 percent respectively. Literate without any formal schooling is not reported.

| Percent distribution of household population age 7 and above by literacy level and years of schooling, according to age , residence and sex, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Literate |  | Years | ooling |  |  |  |  |
| Age | Nonliterate | but no schooling | 1-5 | 6-8 | 9-10 | 11 or more | Missing | Total Percent | Number of persons |
| URBAN <br> Male |  |  |  |  |  |  |  |  |  |
| 7-9 | 3.2 | 0.0 | 95.5 | 0.3 | 0.0 | 0.0 | 1.0 | 100.0 | 392 |
| 10-14 | 0.8 | 0.0 | 30.4 | 59.8 | 8.9 | 0.0 | 0.1 | 100.0 | 749 |
| 15-19 | 1.8 | 0.0 | 3.9 | 17.6 | 36.3 | 40.5 | 0.0 | 100.0 | 617 |
| 20-29 | 4.6 | 0.0 | 5.4 | 17.6 | 23.2 | 49.2 | 0.0 | 100.0 | 1,406 |
| 30-39 | 6.3 | 0.0 | 9.9 | 19.2 | 24.8 | 39.8 | 0.0 | 100.0 | 1,263 |
| 40-49 | 7.9 | 0.0 | 8.8 | 20.9 | 22.8 | 39.6 | 0.0 | 100.0 | 993 |
| 50+ | 15.2 | 0.0 | 17.9 | 12.8 | 18.2 | 35.8 | 0.0 | 100.0 | 1,293 |
| Total | 6.7 | 0.0 | 17.1 | 21.2 | 20.7 | 34.3 | 0.1 | 100.0 | 6,713 |
| Female |  |  |  |  |  |  |  |  |  |
| 7-9 | 2.4 | 0.0 | 94.7 | 1.1 | 0.0 | 0.0 | 1.7 | 100.0 | 368 |
| 10-14 | 1.2 | 0.0 | 33.8 | 51.2 | 13.0 | 0.0 | 0.8 | 100.0 | 684 |
| 15-19 | 3.0 | 0.0 | 1.2 | 12.2 | 38.5 | 45.2 | 0.0 | 100.0 | 585 |
| 20-29 | 7.8 | 0.0 | 6.4 | 14.2 | 22.3 | 49.3 | 0.0 | 100.0 | 1,703 |
| 30-39 | 17.8 | 0.0 | 11.4 | 21.1 | 22.2 | 27.5 | 0.0 | 100.0 | 1,313 |
| 40-49 | 22.9 | 0.0 | 15.8 | 17.7 | 22.5 | 21.1 | 0.0 | 100.0 | 929 |
| 50+ | 47.8 | 0.0 | 19.2 | 13.0 | 8.0 | 12.0 | 0.0 | 100.0 | 1,607 |
| Total | 19.2 | 0.0 | 18.1 | 18.3 | 18.4 | 25.8 | 0.2 | 100.0 | 7,189 |
| Total |  |  |  |  |  |  |  |  |  |
| 7-9 | 2.8 | 0.0 | 95.1 | 0.7 | 0.0 | 0.0 | 1.4 | 100.0 | 760 |
| 10-14 | 1.0 | 0.0 | 32.0 | 55.7 | 10.9 | 0.0 | 0.4 | 100.0 | 1,433 |
| 15-19 | 2.4 | 0.0 | 2.5 | 15.0 | 37.4 | 42.7 | 0.0 | 100.0 | 1,202 |
| 20-29 | 6.3 | 0.0 | 5.9 | 15.7 | 22.7 | 49.3 | 0.0 | 100.0 | 3,109 |
| 30-39 | 12.2 | 0.0 | 10.7 | 20.2 | 23.5 | 33.5 | 0.0 | 100.0 | 2,576 |
| 40-49 | 15.2 | 0.0 | 12.2 | 19.3 | 22.6 | 30.7 | 0.0 | 100.0 | 1,921 |
| 50+ | 33.3 | 0.0 | 18.6 | 12.9 | 12.5 | 22.6 | 0.0 | 100.0 | 2,900 |
| Total | 13.2 | 0.0 | 17.6 | 19.7 | 19.5 | 29.9 | 0.1 | 100.0 | 13,902 |

An examination of the educational attainment by place of residence revealed that the urban-rural differential was quite pronounced. In urban areas, only 13 percent of the total population is non-literate in comparison to 25 percent of the rural population. The numbers of non-literate females live in rural areas of Pondicherry accruing a share as high as 35 percent, while non-literate rural males is 15 percent. Prevalence of illiterate is much less in urban areas with figures of 19 percent and seven percent non-literate females and males respectively. A contrasting feature of rural-urban difference in educational level is that in rural areas 18 percent had 1-5 years of schooling and those who had 11 or more years of schooling was just 16 percent, whereas in urban areas a significant proportion of people ( 18 percent and 30 percent respectively) had these level of education.

### 2.4 Marital Status of the Household Population

The DLHS, collected information on the marital status of all household members aged 10 years and above. Table 2.4 shows the percent distribution of household population by marital status distribution of de facto household population by age and sex. Eight percent of females in the age group 15-19 years, followed by 48 percent in the age group 20-24 years, 79 percent in the age group 25-29 years, and 86 percent in the age group 30-44 years are currently married. The proportion of never married for both males and female is 35 percent in the state, and it is higher for males ( 42 percent) than for females ( 29 percent). The proportion of never married among males declines with increasing age and reaches the lowest by the time they are in the age group 45-59 years. A similar pattern has been observed in the case of females, with the lowest never married proportion for the age group 30-44 years. The proportion of divorced, separated or widowed are at 10 percent and limited to the older ages. Sixty-seven percent of women aged 60 years or above are widowed/divorced/separated. Among the de facto population aged 10 years and above, 56 percent of males and 54 percent of females are currently married.

| Table 2.4 MARITAL STATUS OF THE HOUSEHOLD POPULATION |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percent distribution of the household population aged 10 years and above by marital status, according to age and sex, Pondicherry, 2002-04 |  |  |  |  |  |  |
|  | Marital status |  |  |  | Total Percent | Number of persons |
| Age | Never married | Currently married | Married, gauna not performed | Widowed/ divorced/ Separated |  |  |
| Male |  |  |  |  |  |  |
| 10-14 | 99.8 | 0.2 | 0.0 | 0.0 | 100.0 | 932 |
| 15-19 | 99.9 | 0.1 | 0.0 | 0.0 | 100.0 | 802 |
| 20-24 | 89.8 | 9.8 | 0.3 | 0.0 | 100.0 | 949 |
| 25-29 | 50.3 | 49.0 | 0.0 | 0.8 | 100.0 | 894 |
| 30-44 | 11.7 | 87.3 | 0.0 | 1.0 | 100.0 | 2,278 |
| 45-59 | 1.8 | 94.4 | 0.0 | 3.7 | 100.0 | 1,271 |
| 60+ | 1.7 | 82.2 | 0.0 | 16.1 | 100.0 | 892 |
| Total | 41.6 | 55.6 | 0.0 | 2.7 | 100.0 | 8,018 |
| Female |  |  |  |  |  |  |
| 10-14 | 99.9 | 0.1 | 0.0 | 0.0 | 100.0 | 858 |
| 15-19 | 91.8 | 8.0 | 0.0 | 0.2 | 100.0 | 784 |
| 20-24 | 51.9 | 47.5 | 0.2 | 0.4 | 100.0 | 1,146 |
| 25-29 | 16.4 | 79.1 | 0.0 | 4.5 | 100.0 | 983 |
| 30-44 | 2.9 | 86.0 | 0.2 | 10.9 | 100.0 | 2,316 |
| 45-59 | 3.0 | 66.8 | 0.0 | 30.2 | 100.0 | 1,311 |
| 60+ | 1.5 | 31.2 | 0.1 | 67.2 | 100.0 | 1,153 |
| Total | 28.7 | 54.0 | 0.1 | 17.2 | 100.0 | 8,551 |
| Total |  |  |  |  |  |  |
| 10-14 | 99.8 | 0.2 | 0.0 | 0.0 | 100.0 | 1,790 |
| 15-19 | 95.9 | 4.0 | 0.0 | 0.1 | 100.0 | 1,586 |
| 20-24 | 69.1 | 30.5 | 0.2 | 0.2 | 100.0 | 2,095 |
| 25-29 | 32.5 | 64.7 | 0.0 | 2.7 | 100.0 | 1,878 |
| 30-44 | 7.3 | 86.6 | 0.1 | 6.0 | 100.0 | 4,594 |
| 45-59 | 2.4 | 80.4 | 0.0 | 17.2 | 100.0 | 2,582 |
| 60+ | 1.6 | 53.4 | 0.1 | 44.9 | 100.0 | 2,045 |
| Total | 35.0 | 54.7 | 0.1 | 10.2 | 100.0 | 16,569 |
| Note: Table is based on de facto population |  |  |  |  |  |  |

### 2.5 Marriage

Marriage in the household is an important event that reflects the socio-cultural practices of the communities surveyed in DLHS. This section outlines the marriage ceremonies during the three years period prior to the survey. Mean age at marriage by sex and percentage of total marriages which are below legal age at marriage, 21 years for boys and 18 years for girls by resident at the state and at district levels are shown in Table 2.5.

| Table 2.5 MARRIAGE |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Mean age at marriage and percentage of marriages below legal age at marriage by sex and by districts, Pondicherry, 2002-04 |  |  |  |  |
| ce of residence/ | Mean age at marriage |  | Percentage of marriage below legal age at marriage |  |
| District | Boy | Girl | Boy (<21) | Girl (<18) |
| UT - Total | 27.6 | 22.4 | 2.4 | 4.9 |
| UT - Rural | 26.9 | 22.2 | 6.0 | 6.0 |
| UT - Urban | 27.8 | 22.5 | 1.3 | 4.6 |
| District |  |  |  |  |
| Karaikal | 27.5 | 22.6 | 0.9 | 3.0 |
| Mahe | 29.2 | 22.3 | 0.5 | 2.4 |
| Pondicherry | 27.5 | 22.5 | 3.3 | 4.8 |
| Yanam | 25.1 | 18.8 | 11.9 | 30.7 |

Note: Table based on de jure population.
Reference period: - January $1^{\text {st }}, 1999$ to survey date for phase-1, and January $1^{\text {st }}, 2001$ to survey date for phase-2.

Mean age at marriage for boys and girls in urban areas of Pondicherry are 28 years and 23 years respectively. The corresponding figures in rural areas are 27 years and 22 years. On the whole, as far as Pondicherry is concerned, both boys and girls seem to oblige the legal age marriage, the mean age at marriage being 28 years for boys and 22 years for girls. However, only two percent of boys and five percent of girls got married below the corresponding specified legal age marriage.

When it comes to district level variation in mean age at marriage, it is highest in Mahe 29 years for boys and 23 years for girls in Karaikal. The lowest mean age at marriage for boys and girls is 25 years and 19 years respectively in Yanam.

It is also found that, the percentage of girls who were married below the legal age at marriage was the highest in Yanam ( 31 percent) and the lowest in Mahe ( 2 percent). In the case of boys, marriages below the legal age at marriage are the highest in Yanam district (12 percent) and lowest in Mahe ( 0.5 percent) and Karaikal ( 0.9 percent).

### 2.6 Morbidity Rates

The DLHS-RCH has collected information on the morbidity status relating to blindness, tuberculosis and malaria of the de jure members of the household. Table 2.6 provides prevalence rates.


## Partial, Complete and Night Blindness

The overall prevalence of partial blindness is 2,122 per 100,000 population in the state and is lower in urban areas ( 1,622 per 100,000 ) than in rural areas ( 3,846 per 100,000 ). It is more among females. The prevalence of complete blindness is 210 per 100,000 population with a rural-urban differential of 265 against 195 per 100,000. Sex differential in complete blindness is not significant. The prevalence of night blindness due to vitamin A deficiency is 40 per 100,000 population, and is much higher in urban areas (45) than in rural areas (21).

## Tuberculosis

The prevalence of tuberculosis is 138 per 100,000 population, with rural areas having a higher prevalence of 241 compared to 110 per 100,000 in urban areas. The prevalence of TB is higher among females ( 156 per 100,000) than among males (120 per 100,000).

## Malaria

In the DLHS-RCH, household respondents were asked to state whether any member of their household suffered from malaria (characterized by recurrent fever with shivering) any time during the two weeks prior the survey. In the state of Pondicherry, 67 persons per 100,000 population were reported to have suffered from malaria. Only urban residents are suffer from malaria ( 85 per 100,000 ). In rural prevalence was not reported. The reported prevalence of malaria is higher for females (79 per 100,000) than for males ( 54 per 100,000).

### 2.7 Morbidity Rates by Districts

Table 2.7 shows the prevalence of blindness, tuberculosis and malaria in the districts of Pondicherry. The prevalence of partial blindness varies considerably among the districts the lowest being 302 per 100,000 in Mahe and the highest, 2,611 per 100,000 in Pondicherry.


The prevalence rate of complete blindness ranges from 51 per 100,000 in Yanam to 453 per 100,000 in Karaikal.

Inter-district variations are substantial for tuberculosis and malaria. The prevalence rate of tuberculosis is the highest in Yanam district ( 430 per 100,000 population) and it is lowest in Mahe ( 74 per 100,000 ). In the case of malaria, the prevalence rate is highest in Yanam ( 97 per 100,000) and lowest in Karaikal ( 30 per 100,000).

### 2.8 Housing Characteristics

This section describes the availability of basic amenities in the state. Table 2.8 presents the percent distribution of households by selected housing characteristics. Ninety-five percent of the households in Pondicherry have electricity connection and it is 96 percent in urban areas and 89 percent in rural areas.

As regards household source of drinking water 94 percent of the households get drinking water through taps, while two percent drink water from hand pumps/bore-wells, and four percent drink water from wells. About 93 percent of households in urban areas and 95 percent in rural areas get piped water for drinking.

When it comes to sanitation facility, 64 percent of the households have flush toilets, while two percent have pit based toilets or latrines, three percent depend on shared toilets, three percent depends on public/community toilet and 29 percent of the households have no toilet facility at all. There is a large rural-urban difference; 72 percent of rural households have no toilet facility, compared to just 17 percent of urban households.

DLHS-RCH has also collected data on type of fuel used in the households for cooking. Nearly three-fifths (59 percent) of the households used liquid petroleum/gas or electricity for cooking in Pondicherry. About 30 percent of households rely on fire woods and 11 percent depend on kerosene for cooking. The use of liquid petroleum gas/electricity for cooking is reported more in urban areas ( 68 percent) and firewood is reported more in rural areas (69 percent).

There is considerable variation in the quality of housing. On the basis of building material, type of floor, walls and roof, households are categorised into kachcha, semi-pucca and pucca. Twenty-two percent of the households are living in kachcha houses, 24 percent in semi pucca houses and 54 percent in pucca houses. Sixty-two percent of urban households live in pucca houses compared to 25 percent of rural households.

The possession of consumer durable goods is an indication of a household's socio-economic status. Table 2.8 shows that majority of the households in the state own an electric fan (88 percent), television ( 75 percent), bicycles ( 60 percent) and radio/transistor (50 percent).

| Table 2.8 HOUSEING CHARACTERISTICS |  |  |  |
| :---: | :---: | :---: | :---: |
| Percent distribution of the household by housing characteristics and percentage of households owing selected durable goods according to residence, Pondicherry, 2002-04 |  |  |  |
| Housing characteristic | Total | Residence |  |
|  |  | Rural | Urban |
| Electricity |  |  |  |
| Yes | 94.9 | 89.1 | 96.4 |
| No | 5.1 | 10.9 | 3.6 |
| Source of drinking water |  |  |  |
| Tap inside | 59.7 | 39.2 | 65.2 |
| Tap shared public | 33.8 | 56.2 | 27.7 |
| Hand pump/ bore well | 2.2 | 3.7 | 1.8 |
| Well covered | 2.0 | 0.0 | 2.5 |
| Well uncovered | 2.2 | 0.4 | 2.7 |
| Other | 0.2 | 0.4 | 0.1 |
| Sanitation facility |  |  |  |
| Own flush toilet | 63.8 | 26.4 | 73.9 |
| Own pit toilet / latrine | 1.6 | 0.3 | 1.9 |
| Shared toilet of any type | 2.7 | 1.0 | 3.2 |
| Public / community toilet | 3.0 | 0.1 | 3.7 |
| No toilet facility | 28.9 | 72.2 | 17.2 |
| Main type of fuel used for cooking |  |  |  |
| Liquid petroleum gas/ electricity | 58.7 | 24.6 | 67.9 |
| Kerosene | 11.3 | 6.4 | 12.6 |
| Wood | 30.0 | 69.0 | 19.5 |
| Type of house |  |  |  |
| Kachcha | 21.9 | 54.2 | 13.2 |
| Semi - pucca | 23.8 | 20.4 | 24.8 |
| Pucca | 54.3 | 25.4 | 62.1 |
| Household assets |  |  |  |
| Fan | 88.3 | 74.6 | 92.0 |
| Radio/transistor | 50.4 | 31.9 | 55.4 |
| Sewing machine | 17.0 | 9.8 | 18.9 |
| Television | 74.5 | 57.4 | 79.2 |
| Telephone | 37.7 | 20.2 | 42.4 |
| Bicycle | 60.0 | 59.9 | 60.1 |
| Motor cycle/ scooter | 39.1 | 23.5 | 43.4 |
| Car / Jeep | 5.7 | 2.9 | 6.5 |
| Tractor | 0.4 | 1.2 | 0.2 |
| Standard of living index |  |  |  |
| Low | 15.0 | 34.1 | 9.9 |
| Medium | 27.3 | 39.4 | 24.0 |
| High | 57.7 | 26.5 | 66.1 |
| Number of households | 4,433 | 945 | 3,488 |

Other durable goods found in the surveyed households are motorcycle or scooter (39 percent), telephone (38 percent), sewing machine (17 percent) and Car/jeep (6 percent). Ownership of most of the consumer durable items is more among the urban households than among the rural households.

Considering household amenities, such as, source of drinking water, type of house, source of lighting, fuel for cooking, toilet facility and ownership of durable goods a composite measure, standard of living index (SLI) is made for classification of households. The standard of living index is calculated as by adding the following scores;

Source of drinking water: 3 for Tap (own), 2 for Tap (shared), 1 for hand pump and well, and 0 for other;
Type of house: 4 for pucca, 2 for semi-pucca, and 0 for kachcha;
Source of lighting: 2 for electricity, 1 for kerosene, and 0 for other;
Fuel for cooking: 2 for LPG gas/electricity, 1 for kerosene and 0 for other;
Toilet facility: 4 for own flush toilet, 2 for own pit toilet, 2 for shared toilet and 0 for no toilet;
Ownership for items: 4 each for car and tractor, 3 each for television, telephone and motorcycle/scooter, and 2 each for fan, radio/transistor, sewing machine and bicycle.

The total of the scores may vary from the lowest of a 0 to maximum of 40 . On the basis of total score, households are divided into three categories as;
a) Low - if total score is less than or equal to 9 ,
b) Medium - if total score is greater than 9 but less than or equal to 19 and
c) High - if total score is greater than 19.

As per the standard of living index, fifteen percent of the households come under the low standard of living category, 27 percent of households to medium standard of living, and 58 percent of the households to high standard of living.

The proportion of sample households with high standard of living is comparatively higher in urban areas (26 percent) than in rural areas (27 percent) and the proportion of households with a medium and low standard of living is much higher in rural households ( 39 percent and 34 percent respectively) than in urban households ( 24 percent and 10 percent respectively) in the state of Pondicherry.

### 2.9 Housing Characteristics by District

The four districts in Pondicherry are not uniform in terms of basic amenities and possession of consumer durables. Table 2.9 presents an inter-district comparison of housing characteristics. The percentage of households with electricity is 87 percent in the district of Karaikal. The household with electricity is highest in Mahe ( 97 percent) followed by Pondicherry (96 percent) and Yanam (92 percent). In Pondicherry and Yanam districts all the households used tap water for drinking (100 percent). This percentage is 99 in Karaikal and 54 in Mahe.

Largely the districts in Pondicherry have inadequate toilet facility, 71 percent of the households have toilet facilities and it is the least in Karaikal ( 50 percent) and highest in Mahe ( 95 percent). It is 58 percent in Yanam and 67 percent in Pondicherry.

In Pondicherry and Mahe districts, the percentage of households using liquid petroleum gas/electricity for cooking is 57 percent and in the rest of the districts, it is relatively low ranging between 40 percent in Karaikal and 47 percent in Yanam. The percentage of households living in pucca houses is 63 percent and 64 percent in Mahe and Yanam districts, and at the least of 28 percent in Karaikal district.

| Selected housing characteristics by district, Pondicherry, 2002-04 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | tage of hou | olds |  |
| Districts | With electricity | With drinking water ${ }^{1}$ | With toilet facility | Using Liquid petroleum gas/ electricity | Living in pucca house |
| Karaikal | 87.2 | 99.0 | 49.6 | 40.1 | 27.9 |
| Mahe | 97.4 | 54.4 | 95.2 | 57.4 | 63.3 |
| Pondicherry | 95.6 | 99.7 | 67.4 | 57.3 | 54.1 |
| Yanam | 91.6 | 100.0 | 58.4 | 47.1 | 64.3 |
| Pondicherry | 94.9 | 97.6 | 71.1 | 58.7 | 54.3 |
| Note: ${ }^{1}$ That is piped or from a hand pump/bore well/well covered |  |  |  |  |  |

### 2.10 Iodization of Salt

Consumption of salt fortified with iodine is recommended to avoid miscarriages, brain disorders, cretinism and retarded psychomotor development. As per the Prevention of Food Adulteration Act, 1988, the minimum iodine content of edible salt is 30 parts per million (PPM) at the manufacturing level.

In the DLHS-RCH survey, each interviewer was provided with a test kit to measure the level of iodine content of salt consumed by the surveyed households. The test results (Table 2.10) are classified by degree of iodization of salt and categorised by background characteristics. It is observed that nearly one half (49 percent) of households used salt that contained a minimum recommended 15 ppm or higher level of iodine content whereas nearly one-third ( 32 percent) of households used salt that is not iodized at all and 19 percent used salt, which was inadequately iodized.

In rural areas, 61 percent of households against 25 percent in urban areas used non-iodized salts. Number of households using non-iodized or inadequately iodized salt is closely associated with the educational level of the household head. Seventy-one percent of households headed by persons who had more than 10 years of schooling reported the use of adequately iodized salts and it decreased to 24 percent among households headed by non-literates. Consumption of adequately iodised salt among households of other caste is 62 percent followed by 53 percent in other backward class households and 29 percent in Scheduled caste households.

| Table 2.10 IODIZATION OF SALT |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percent distribution of household heads by degree of lodization of salt according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |
| Background characteristic | Not lodised | 7ppm | 15+ppm | Other ${ }^{1}$ | Total percent | Number of households |
| Place of Residence |  |  |  |  |  |  |
| Rural | 60.5 | 19.3 | 20.2 | 0.0 | 100.0 | 945 |
| Urban | 24.7 | 18.3 | 57.0 | 0.0 | 100.0 | 3,488 |
| Education of the household heads |  |  |  |  |  |  |
| Non-literate | 55.4 | 20.5 | 24.1 | 0.0 | 100.0 | 857 |
| 0-9@ years | 38.9 | 23.5 | 37.7 | 0.0 | 100.0 | 1,725 |
| 10 and above | 15.6 | 13.0 | 71.4 | 0.0 | 100.0 | 1,851 |
| Religion of household head |  |  |  |  |  |  |
| Hindu | 33.8 | 19.1 | 47.1 | 0.0 | 100.0 | 3,803 |
| Muslim | 24.4 | 17.2 | 58.4 | 0.0 | 100.0 | 300 |
| Christian | 22.1 | 15.0 | 62.9 | 0.0 | 100.0 | 291 |
| Other | (18.2) | (0.0) | (81.8) | (0.0) | (100.0) | 38 |
| Caste/tribe of the household head\# |  |  |  |  |  |  |
| Scheduled caste | 49.2 | 21.5 | 29.2 | 0.0 | 100.0 | 838 |
| Other backward class | 28.5 | 18.1 | 53.4 | 0.0 | 100.0 | 3,456 |
| Other | 28.0 | 9.9 | 62.1 | 0.0 | 100.0 | 115 |
| Standard of living index |  |  |  |  |  |  |
| Low | 64.4 | 22.3 | 13.3 | 0.0 | 100.0 | 667 |
| Medium | 48.9 | 22.2 | 28.9 | 0.0 | 100.0 | 1,209 |
| High | 16.1 | 15.8 | 68.0 | 0.0 | 100.0 | 2,557 |
| Total | 32.3 | 18.5 | 49.1 | 0.0 | 100.0 | 4,433 |
| Note: Ppm- Parts per million. @ Literate persons with no years of schooling are also included. \# Total number of cases may not add upto N due to do not know and missing cases. ${ }^{1}$ Includes salt not at home, salt not tested, refused and missing cases. Total include 11 case of scheduled tribe in caste category who were not shown separately. ( ) Based on less than 50 unweighted cases |  |  |  |  |  |  |

Differential in the consumption of properly iodized salt is more pronounced when analysed by religion of the household head and standard of living index. Percentage of households using adequately iodized salt is 63 percent among Christian households, whereas the corresponding figures for Muslim and Hindu households are 58 percent and 47 percent respectively. Again, households with low standard of living are more likely to use non-iodized or inadequately iodized salt compared to households with medium or high standard of living index. While 64 percent of households with low standard of living used non-iodized salt and 16 percent households with a high standard of living fall in this category. The number of households with a high standard of living using adequately iodized salt is five times of those with a low standard of living.

### 2.11 Iodization of Salt by District

Table 2.11 shows district level variation in the percent distribution of households by level of iodization of salt used in the households. Mahe district have the lowest proportion of households (13 percent) using non-iodized salt, whereas Yanam has the highest proportion of households (57 percent) using non-iodized salt. Percentage of households using inadequately iodized salt is highest in Karaikal (40 percent) and the lowest in Mahe (10 percent). Nearly one-half
(49 percent) of the households in the state used adequately iodized salt, the highest being in the district of Mahe (78 percent) followed by Pondicherry (49 percent) and Yanam (31 percent) and the lowest is Karaikal (23 percent).


### 2.12 Availability of Facility and Services to the Rural Population

The DLHS-RCH collected information about surveyed village from knowledgeable persons such as, the 'Sarpanch' or 'Pradhan'(village head) or other village officials or other persons including 'teacher' in the villages on health and educational facilities and other services available in the village. One important aspect was on the distance of the village, if not available within the village, from various types of education facilities, including primary school, middle school, secondary school, higher secondary school, college, Gurujee scheme and 'Madarsa'. Further information on the distance of the village, if not available within the village, from various types of health facility, including sub-centres, primary health centres (PHCs), community health centres/Rural Hospitals ( $\mathrm{CHCs} / \mathrm{RHs}$ ), Government dispensary, hospital, private clinic or hospitals and health facilities of Indian System of Medicine (ISM).

Table 2.12 gives the distance of surveyed villages from an education facility. The unit of analysis is usual residents of rural population. Majority of the rural residents ( 96 percent) (the de jure rural population) in the state live in villages that have a primary school, 54 percent live in villages with middle school and 44 percent of the rural population live in villages with secondary schools. Higher secondary schools are available for 30 percent of the rural population. Only one percent of the rural population live in villages, which have Madarassas. Availability of colleges were not reported in rural areas. As regards the distribution of educational institutions within 5 kilometres distance from the village, it can be seen that, three percent of the villages have primary school, 46 percent of the villages have middle school, 50 percent each have secondary and higher secondary school and 30 percent have a college, 22 percent have Gurujee schemes and 21 percent have a "Madarassa" within 5 kms of distance. For 58 percent of the villages, the college is more than 10 kilometres away and higher secondary school are available at this distance for seven percent of the villages.

| Education facility | Within village | Distance from the village |  |  | Don't know/ missing | Total percent |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | < 5 km | $5-9 \mathrm{~km}$ | 10+ km |  |  |
| Primary School | 96.1 | 3.9 | 0.0 | 0.0 | 0.0 | 100.0 |
| Middle School | 54.4 | 45.6 | 0.0 | 0.0 | 0.0 | 100.0 |
| Secondary School | 43.5 | 49.8 | 6.7 | 0.0 | 0.0 | 100.0 |
| Higher Secondary School | 29.8 | 50.3 | 12.6 | 7.4 | 0.0 | 100.0 |
| College | 0.0 | 30.4 | 11.6 | 58.0 | 0.0 | 100.0 |
| Gurujee Scheme | 0.0 | 22.3 | 5.0 | 1.4 | 71.4 | 100.0 |
| Madarsa | 0.9 | 21.4 | 5.0 | 1.4 | 71.4 | 100.0 |


| Table 2.13 DISTANCE FROM THE NEAREST HEALTH FACILITY |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percent distribution of rural household population by distance from the nearest health facility, Pondicherry, 2002-04 |  |  |  |  |  |  |
| Health facility | Within village | Distance from the village |  |  | $\begin{gathered} \text { Don't know/ } \\ \text { missing } \\ \hline \end{gathered}$ | Total percent |
|  |  | $<5 \mathrm{~km}$ | 5-9 km | 10+ km |  |  |
| Rural household population |  |  |  |  |  |  |
| Sub-centre | 45.1 | 48.9 | 6.0 | 0.0 | 0.0 | 100.0 |
| Primary health centre | 31.7 | 55.8 | 8.1 | 4.5 | 0.0 | 100.0 |
| Either sub-centre or PHC | 61.2 | 37.4 | 1.5 | 0.0 | 0.0 | 100.0 |
| Community health centre/ |  |  |  |  |  |  |
| Referral hospital | 2.8 | 12.8 | 45.3 | 39.0 | 0.0 | 100.0 |
| Government dispensary | 2.4 | 8.9 | 21.7 | 67.0 | 0.0 | 100.0 |
| Government hospital | 5.5 | 7.6 | 15.0 | 71.9 | 0.0 | 100.0 |
| Private clinic | 11.1 | 42.9 | 23.8 | 22.2 | 0.0 | 100.0 |
| Private hospital | 5.5 | 30.8 | 20.3 | 43.4 | 0.0 | 100.0 |
| ISM health facility | 0.0 | 15.9 | 44.5 | 39.6 | 0.0 | 100.0 |
| Note: Table based on rural de jure population |  |  |  |  |  |  |

Table 2.13 summarises the availability of health facilities within the surveyed villages and provides information on the distance between the villages and the nearest health facility. Forty-five percent of the rural population live in villages with Sub-centres. Nearly one-third (32 percent) of the rural household population live in a village with a primary health centre, though the proportion of villages having facilities of either sub-centre or primary health centre is 61 percent. The proportion of rural population with other health facilities are three percent for community health centres/referral hospitals (CHCs/RHs), two percent for Government dispensary, six percent for Government hospitals, 11 percent for private clinics, and six percent for private hospitals. Location of Indian System of Medicine within village is not reported.

| Table 2.14 AVAILABILITY OF SERVICES |
| :--- | ---: |
| Percentage of rural residents living in villages that have sleeted |
| services, Pondicherry, 2002-04 |$|$| Percentage of rural |
| :--- |
| residents |
| Services |
|  |
| Anganwadi centre |
| Anganwadi worker |
| Private doctor |
| Visiting doctor |
| Homeopathic doctor |
| Village health guide |
| Trained birth attendant |
| Traditional healer |
| Dai |
| Note: Table based on rural de jure population |

The proportion of rural population located within a distance of 5 kilometres from health facilities are 49 percent for sub-centres, 56 percent for primary health centres, 37 percent for either sub-centre or PHC, 13 percent for CHCs/RHs, nine percent for Government dispensary, eight percent for Government hospitals, 43 percent for private clinic, 31 percent for private hospitals and 16 percent for ISM health facilities. Distance of particular health facilities is beyond 10 kilometres from surveyed villages in the case of Government hospitals is 72 percent and for private hospitals it is 43 percent.

Table 2.14 shows the proportion of rural residents in the state that live in the villages with various health services. Ninety-eight percent of rural residents live in villages that have an anganwadi, (a nursery school for children age 3-6 years) and at the same time 77 percent of rural households live in villages with anganwadi workers (Anganwadi workers provide integrated child development services).

Twenty-nine percent of the rural residents live in villages that have a private doctor, 20 percent live in villages with a visiting doctor, eight percent with a homeopathy doctor, two percent with a village health guide, 27 percent with a trained birth attendant and 13 percent with a traditional healer. Fifty-three percent of the rural residents live in villages that have a Dai (Dai provides the services for the delivery).

### 2.13 Availability of Education Facility and Health Services by District

Table 2.15 shows the availability of education and health facilities for the rural population within the surveyed villages by districts in Pondicherry. In the districts of Pondicherry (100 percent) and Karaikal ( 90 percent), almost all the rural population have access to primary schools. In the state of Pondicherry, 97 percent of the rural population live in villages having primary schools. Forty-five percent of the rural population in the state have sub-centres within the village, with the coverage of 50 percent in Pondicherry and 33 percent in Karaikal.

| Selected facility and services of rural household population within village by district, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Percentage of rural household population with: |  |  |  |  |  |  |
| Districts | Primary or middle school | Subcentre | PHCs | Any government health facility ${ }^{1}$ | Doctor ${ }^{2}$ | TBA ${ }^{3}$ | Anganwadi worker |
| Karaikal | 90.4 | 33.1 | 38.6 | 60.8 | 19.1 | 17.1 | 86.4 |
| Pondicherry | 100.0 | 49.9 | 28.9 | 63.5 | 51.2 | 30.9 | 73.6 |
| Pondicherry | 97.2 | 45.1 | 31.7 | 62.7 | 42.0 | 26.9 | 77.3 |

Note: ${ }^{1}$ Includes sub-center, primary health center, community health center or referral hospital, government hospital, and government dispensary within the village ${ }^{2}$ Either private or visiting doctor ${ }^{3}$ Trained birth attendant

In Pondicherry state, 32 percent of the households in rural areas have PHCs within the villages. It was 39 percent in Karaikal and 29 percent in Pondicherry.

Fifty-one percent of the rural population are visited either by private or by visiting doctors in the surveyed villages of Pondicherry district, whereas only 19 percent of households can be classified in this category in Karaikal district. Thirty-one percent of rural population are attended by trained birth assistants in Pondicherry, while only 17 percent of rural population, availed themselves of such a provision in Karaikal. A visit by anganwadi workers to rural households is 86 percent in Karaikal and 74 percent in Pondicherry.

## CHAPTER III

## CHARACTERISTICS OF WOMEN, HUSBANDS AND FERTILITY

The Reproductive and Child Health (RCH) programme is targeted towards the underprivileged section of the population, particularly, women and children. The utilization of RCH services provided across the country depends to a large extent on the characteristics of women, their husbands and episodes of pregnancies, miscarriages, abortions, number of children born to them and survival status of children. Age of women, marital duration, educational attainment, social background and living standard are important factors, which influence reproductive and child health. With this in view, the DLHS-RCH data were collected on demographic characteristics, such as current age, age at consummation of marriage and number of pregnancies, live births and surviving children from eligible women respondents of selected representative households. Information regarding household background characteristics was collected using a separate household questionnaire that covered religion and caste of head of household, type of house, source of drinking water and possession of consumer durables. Fertility preference of women in terms of timing and desire for additional children in comparison to the number of living children provides information on the need for reproductive and child health services.

This chapter provides a comprehensive outline of distribution of currently married women by present age, age at consummation of marriage, duration of marriage, complete years of schooling, pregnancy episodes, children ever born and children surviving, along with social and economic characteristics of households the women represent.

### 3.1 Background Characteristics of Women

The percent distribution of currently married women in the reproductive age group 15-44 years by residence, religion and caste of head of household, economic standard of household and other demographic characteristics are shown in Table 3.1. A sample of 3,647 eligible women represents the state of Pondicherry in DLHS-RCH and one-fifth ( 20 percent) of these women are drawn from rural areas. About 61 percent of the currently married women are in the age range of 20-34 years and more or less similar age distribution is observed both for urban and rural areas. Age at consummation of marriage, particularly in rural areas is found to be low with as many as 31 percent of the women having cohabited before 18 years of age, while it is 21 percent in urban areas. Looking at the distribution of marital duration it is noted that about 35 percent of the women across the state are married for more than 15 years.

Among the sample 3,647 representative women in Pondicherry, Hindus constitute 86 percent and Muslims and Christians constitute eight percent and six percent respectively. The presence of women belonging to other religious groups is insignificant in proportional and absolute terms. One-fifth ( 20 percent) of the women belong to scheduled castes, and a majority (77 percent) to other backward classes. Only two percent of the sample women belong to a higher caste other than scheduled caste/tribe and other backward class. In rural areas, there are more women belonging to scheduled caste than in urban areas, while more women from other backward classes are found in urban areas. There is a clear rural-urban differential in the educational attainment of women. For the state of Pondicherry, 18 percent of women are non-literate and women of this literacy category constitute 33 percent in rural areas, while it is just 14 percent in urban areas.

| Table 3.1 BACKGROUND CHARACTERISTICS OF ELIGIBLE WOMEN |  |  |  |
| :---: | :---: | :---: | :---: |
| Percent distribution of currently married women aged $15-44$ years by selected background characteristics according to residence, Pondicherry, 2002-04 |  |  |  |
| Background characteristic | Total | Residence |  |
|  |  | Rural | Urban |
| Age group (in years) |  |  |  |
| 15-19 | 1.8 | 3.5 | 1.3 |
| 20-24 | 16.1 | 17.0 | 15.9 |
| 25-29 | 22.9 | 22.5 | 22.9 |
| 30-34 | 21.7 | 19.2 | 22.3 |
| 35-39 | 19.9 | 18.6 | 20.2 |
| 40-44 | 17.6 | 19.2 | 17.3 |
| Age at consummation of marriage |  |  |  |
| Below 18 years | 23.2 | 30.8 | 21.2 |
| 18 years \& above | 76.8 | 69.2 | 78.8 |
| Marital duration (in years) |  |  |  |
| 0-4 | 21.3 | 19.8 | 21.7 |
| 5-9 | 22.6 | 22.0 | 22.8 |
| 10-14 | 21.2 | 18.5 | 21.9 |
| 15+ | 34.8 | 39.8 | 33.5 |
| Religion |  |  |  |
| Hindu | 85.7 | 94.9 | 83.3 |
| Muslim | 8.2 | 2.0 | 9.8 |
| Christian | 5.5 | 2.6 | 6.2 |
| Sikh | 0.1 | 0.5 | 0.0 |
| Jain | 0.1 | 0.0 | 0.1 |
| Zoroastrian | 0.4 | 0.0 | 0.5 |
| Caste/tribe |  |  |  |
| Scheduled caste | 20.2 | 43.5 | 14.3 |
| Scheduled tribe | 0.3 | 0.5 | 0.3 |
| Other backward class | 77.0 | 55.9 | 82.3 |
| Other \# | 2.1 | 0.0 | 2.6 |
| Don't know | 0.4 | 0.0 | 0.5 |
| Education (Years of schooling) |  |  |  |
| Non-literate | 17.9 | 32.8 | 14.2 |
| 0-9@ years | 38.0 | 43.7 | 36.5 |
| 10 years \& above | 44.1 | 23.6 | 49.3 |
| Husband's education (Years of schooling) |  |  |  |
| Non-literate | 9.8 | 19.4 | 7.4 |
| 0-9@ years | 37.8 | 47.6 | 35.4 |
| 10 years \& above | 52.3 | 33.0 | 57.2 |
| Don't know | 0.1 | 0.0 | 0.1 |
| Standard of living index ${ }^{\text {d }}$ |  |  |  |
| Low | 12.7 | 33.7 | 7.4 |
| Medium | 26.3 | 40.0 | 22.9 |
| High | 60.9 | 26.3 | 69.7 |
| Number of women | 3,647 | 738 | 2,909 |
| Note: \# Higher caste (Not belonging to a scheduled caste, scheduled tribe and an other backward class). <br> @ Literate persons with no year of schooling are included. |  |  |  |

Thirty-eight percent of women across the state have completed 0-9 years of schooling and 24 percent of rural women have completed 10 or more years of schooling compared to 49 percent for urban women. Men are more literate than their spouses. In Pondicherry, only 10 percent of the husbands of eligible women are non-literate and the corresponding figures are 19 percent in rural areas and seven percent in urban areas. The DLHS-RCH, includes data on materials used for floor, walls and roofs of the housing structure along with status of possession of a list of durables and these are utilized to construct a composite index of household standard of living. Households are further classified as those with low, medium and high standard of living. Thirteen percent of women in the state live in low standard of living households and this is 34 percent in rural areas and seven percent in urban areas. A higher proportion ( 61 percent) of women across the state live in households categorised as high standard of living. In urban areas, 70 percent of women belong to high standard of living households and the corresponding figure is 26 percent in rural areas. Twenty-six percent of the women in the state live in medium standard of living and they were more in rural ( 40 percent) compared to urban ( 23 percent).

### 3.2 Educational Level of Women

Table 3.2 provides details of educational level of eligible women in terms of classification by years of schooling, and selected background characteristics, such as, place of residence, religion, caste and husbands' education. As regards distribution of non-literate women, it is observed that a lesser proportion of younger women below 30 years of age are non-literate compared to older women above 30 years. This age divide remains true even among literate women. A distinct pattern of educational attainment of women is that maximum a higher proportion of younger women attended schooling either for 9-10 years or for 11 or more years of schooling compared to older women. For the women in the age group 15-19 years, 39 percent and 34 percent of them had 6-8 years and 9-10 years of schooling, while only five percent had 11 or more years of schooling. Among the senior women in the age group 40-44 years, distribution by year of schooling is more with 16 percent and 17 percent of them having attended school for 1-5, 6-8 respectively and, 20 percent and 21 percent of them having attended school for 9-10 and 11 or more years of schooling respectively.

There is a significant rural-urban differential in the level of education of women in Pondicherry. One-third ( 33 percent) of rural eligible women are non-literate and 13 percent, 24 percent, 19 percent and 11 percent of the women have 1-5, 6-8, 9-10 and 11 or more years of schooling respectively. The corresponding figures in urban areas are 14 percent non-literate and 10 percent, 20 percent, 25 percent and 31 percent respectively. More Hindu women ( 20 percent) are non-literate compared to Muslim (6 percent) and Christian (5 percent) women. For literate eligible women from all religious communities, a higher proportion of them have either 9-10 or 11 or more years of schooling except Muslim where a higher proportion of them have 6-8 years of schooling. The proportion of Hindu women with 1-5 years of schooling is 11 percent and the same is 18 percent for Muslim women and six percent for Christian women. Among the literate Muslim women 17 percent of them have 11 or more years of schooling, while 27 percent of literate Hindu women, and 41 percent of Christian women have attained this level of education.

The uneven level of educational attainment by caste can be noted from the recorded proportion of non-literate women among scheduled caste ( 30 percent), other backward class (15 percent) and other caste ( 14 percent). The literate women belonging to different castes are concentrated more in the range of 6-8 to 11 or more years of schooling. Scheduled caste women attained at the highest of 6-8 years of schooling ( 23 percent), other backward class women attained at the highest of the 11 or more years of schooling ( 30 percent) and other caste women attained the highest of 9-10 years of schooling ( 31 percent). The husband's education is an important characteristic, which has strong association with the education of eligible women. As many as 61 percent of women whose husbands are non-literate are also non-literate, while only four percent of women whose husbands have 11 or more or years of schooling are non-literate. Fifty-five percent of literate women educated for 11 or more years of schooling have husbands who have the same level of education.

| Table 3.2 LEVEL OF EDUCATION OF ELIGIBLE WOMEN |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percent distribution of currently married women aged 15-44 years by years of schooling according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
|  |  | Years of schooling |  |  |  | Total percent | Number of women |
| Background characteristic | Nonliterate | $\begin{gathered} 1-5 \\ \text { years } \end{gathered}$ | 6-8 years | $\begin{gathered} 9-10 \\ \text { years } \end{gathered}$ | 11 or more years |  |  |
| Age group (in years) |  |  |  |  |  |  |  |
| 15-19 | 8.6 | 12.9 | 39.4 | 34.0 | 5.1 | 100.0 | 64 |
| 20-24 | 13.0 | 8.2 | 21.4 | 32.3 | 25.0 | 100.0 | 589 |
| 25-29 | 10.5 | 5.9 | 20.5 | 27.2 | 35.9 | 100.0 | 834 |
| 30-34 | 19.2 | 12.1 | 21.1 | 19.4 | 28.1 | 100.0 | 790 |
| 35-39 | 22.5 | 12.6 | 22.4 | 18.8 | 23.6 | 100.0 | 726 |
| 40-44 | 26.3 | 16.3 | 16.8 | 19.5 | 21.2 | 100.0 | 643 |
| Place of residence |  |  |  |  |  |  |  |
| Rural | 32.8 | 13.2 | 24.0 | 18.9 | 11.1 | 100.0 | 738 |
| Urban | 14.2 | 10.4 | 20.0 | 24.6 | 30.9 | 100.0 | 2,909 |
| Religion |  |  |  |  |  |  |  |
| Hindu | 20.0 | 10.6 | 19.2 | 23.3 | 26.8 | 100.0 | 3,125 |
| Muslim | 6.3 | 18.3 | 35.1 | 23.2 | 17.1 | 100.0 | 300 |
| Christian | 4.8 | 6.3 | 24.1 | 24.2 | 40.5 | 100.0 | 201 |
| Caste/tribe \# |  |  |  |  |  |  |  |
| Scheduled caste | 29.6 | 13.8 | 22.9 | 17.9 | 15.9 | 100.0 | 738 |
| Other backward class | 15.1 | 10.1 | 20.5 | 24.5 | 29.8 | 100.0 | 2,807 |
| Other | 14.0 | 14.4 | 14.3 | 31.1 | 26.2 | 100.0 | 75 |
| Husband's education |  |  |  |  |  |  |  |
| Non-literate | 60.9 | 14.6 | 15.3 | 5.7 | 3.6 | 100.0 | 357 |
| 1-5 years | 38.0 | 23.8 | 24.7 | 9.2 | 4.2 | 100.0 | 352 |
| $6-8$ years | 19.5 | 19.7 | 30.1 | 22.3 | 8.4 | 100.0 | 789 |
| 9-10 years | 11.8 | 7.4 | 24.2 | 34.9 | 21.7 | 100.0 | 875 |
| 11 or more years | 3.7 | 3.2 | 13.2 | 25.2 | 54.7 | 100.0 | 1,272 |
| Total | 17.9 | 10.9 | 20.8 | 23.4 | 26.9 | 100.0 | 3,647 |

### 3.3 Background Characteristics of Husbands of Eligible Women

In DLHS-RCH husbands of eligible women were also interviewed. The response rate for husbands ( 86 percent) is relatively low compared to that of eligible women ( 97 percent). Selected background characteristics of husbands are shown in Table 3.3. Across the state of Pondicherry, husbands are in higher proportion in the age group 35-44 years (44 percent). Fewer husbands are less than 25 years ( 2 percent). In Pondicherry, 87 percent of the husbands are Hindus, and Muslims and Christians constitute six percent each. Presence of other religious groups is insignificant. Twenty-two percent of husbands in the state belong to the scheduled caste and it is more in rural areas (44 percent) than in urban areas (15 percent). Little more than three-fourths ( 76 percent) of the husbands belong to other backward classes. In urban areas husbands from other backward classes constitute 82 percent, while it is 56 percent rural areas. As regards educational characteristics of the husbands of surveyed eligible women, two-fifths (40 percent) of them have completed 0-9 years of schooling and the proportion of non-literate husband ranges from seven percent in urban areas to 19 percent in rural areas, while the overall state figure is 10 percent.


Note: \# Higher caste (Not belonging to a scheduled caste, scheduled tribe and an other backward class). @ Literate persons with no year of schooling are included.

The proportion of husbands living in households classified as low, medium and high standard of living index are 14 percent, 28 percent and 58 percent respectively. In rural areas, one-third ( 33 percent) of the husbands live in low standard of living households compared to eight percent in urban areas. This is complementary in the case of husbands living in high standard of living households, 69 percent in urban and 27 percent in rural. In terms of household standard of living composition, those living in medium standard of living dominate in rural ( 40 percent) than in urban ( 23 percent). Around 44 percent of husbands across the state reported to have two living children. More husbands in urban areas reported to have one or two living children ( 22 percent and 46 percent respectively), while more husbands in rural areas have two or three living children (37 percent and 29 percent respectively). Nine percent of the husbands of rural eligible women have more than four living children and it is four percent for husbands of urban eligible women. More husbands in urban areas reported to have one living child (22 percent) than in rural (16 percent).

### 3.4 Educational Level of Husbands of Eligible Women

Educational levels in categories of years of schooling classified by age, place of residence, religion and caste/tribe of husbands of eligible women are shown in Table 3.4. The distribution of non-literate husbands across age is more for husbands above 45 years ( 12 percent) compared to less than 25 years ( 5 percent) and 25-34 years and $35-44$ years ( 10 percent each). Among the literate husbands, irrespective of their age at the time of survey one-third of them have 1-8 years of schooling. Forty-two percent of those below 25 years and 29 percent of those above 45 years have 1-8 years of schooling. Nearly one-fourth ( 24 percent) of the younger husbands below 25 years have 11 or more years of schooling compared to 38 percent of those above 45 years. As in the case of eligible women, 11 percent of Hindu husbands are non-literate while the corresponding non-literate husbands of Muslim and Christian are three percent and one percent respectively. The proportion of husbands of Hindu, Muslim and Christian who have 11 or more years of schooling constitute 32 percent, 34 percent and 44 percent respectively. One-tenth of the literate Hindu husbands have completed 1-5 years of schooling and the corresponding numbers are nine percent and 11 percent respectively for Muslim and Christian husbands. Educational attainment of husbands of eligible women varies according to the caste/tribe they belong. There are more non-literate husbands belonging to scheduled caste (18 percent) followed by other caste (13 percent) and other backward class (8 percent). Among the scheduled caste husbands, 42 percent of husbands have 9 or more years of schooling. The literacy level of other backward classes is comparable with that of husbands from castes other than scheduled caste and other backward classes. Among the husbands belonging to other backward classes, eight percent of them are non-literate and 61 percent of them have 9 or more years of schooling.

| Percent distribution of husbands of eligible women by years of schooling, according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Years of schooling |  |  |  |  |  |
| Background characteristic | Nonliterate | $\begin{gathered} 1-5 \\ \text { years } \end{gathered}$ | $\begin{gathered} 6-8 \\ \text { years } \end{gathered}$ | $\begin{gathered} 9-10 \\ \text { years } \end{gathered}$ | 11 or more years | Total percent | Number of men |
| Age group (in years) |  |  |  |  |  |  |  |
| <25 | 4.7 | 26.6 | 15.0 | 29.8 | 23.9 | 100.0 | 56 |
| 25-34 | 9.6 | 9.4 | 24.7 | 22.9 | 33.5 | 100.0 | 874 |
| 35-44 | 9.8 | 10.6 | 22.9 | 25.0 | 31.7 | 100.0 | 1,221 |
| 45 + | 12.3 | 8.4 | 20.5 | 20.7 | 38.2 | 100.0 | 621 |
| Place of residence |  |  |  |  |  |  |  |
| Rural | 18.7 | 11.6 | 26.7 | 24.4 | 18.6 | 100.0 | 688 |
| Urban | 7.4 | 9.5 | 21.5 | 23.2 | 38.5 | 100.0 | 2,085 |
| Religion |  |  |  |  |  |  |  |
| Hindu | 11.4 | 10.1 | 23.3 | 22.9 | 32.2 | 100.0 | 2,422 |
| Muslim | 2.9 | 8.9 | 24.0 | 30.3 | 34.0 | 100.0 | 176 |
| Christian | 0.6 | 11.3 | 16.8 | 26.9 | 44.4 | 100.0 | 154 |
| Casteltribe \# |  |  |  |  |  |  |  |
| Scheduled caste | 18.2 | 13.0 | 27.1 | 19.6 | 22.1 | 100.0 | 603 |
| Other backward class | 7.8 | 9.2 | 22.0 | 24.5 | 36.5 | 100.0 | 2,098 |
| Other | 13.0 | 7.9 | 10.4 | 17.6 | 51.1 | 100.0 | 58 |
| Total | 10.2 | 10.1 | 22.8 | 23.5 | 33.5 | 100.0 | 2,773 |
| Note: \# Total number may not add upto N due to don't know and missing cases. Total includes 21 cases on other religion and 6 cases on scheduled tribe were not shown separately. |  |  |  |  |  |  |  |

### 3.5 Children Ever Born and Surviving

In DLHS-RCH, currently married women in the age group of 15-44 years were asked about the children ever born alive and the number of children surviving. Table 3.5 shows mean children ever born and mean surviving children by selected background characteristics and sex of children. A look at the mean children ever born by age of the women reveals that older women had experience more average live births than younger women. On the average, women in the reproductive age group have given birth to more or less equal male and female children and similar pattern is also noted when it comes to mean surviving children. Completed fertility, that is, mean children ever born to women in the age group 40-44 years is 2.6 for the state of Pondicherry and it comprises an average of 1.3 male children and 1.4 female children. Out of the 2.6 mean children ever born to women in the 40-44 year age group an average of 2.4 children survived. By sex of children, out of 1.3 mean numbers of males, 1.2 survived on the average and the corresponding mean number of females surviving was 1.3 out of 1.4.

Women with longer marital duration have higher mean children ever born. On the average, women who are married for 15 or more years have 2.6 children ever born and on the average 2.5 of them are surviving. There is a clear rural-urban divide in terms of mean children ever born with 2.3 children in rural areas and 1.8 children in urban areas. The mean children ever born to women who are Hindu, Muslim and Christian are 1.9, 2.1 and 1.6 respectively. The corresponding mean surviving children are respectively $1.8,2.0$ and 1.6 respectively. The average children ever born also vary by caste/tribe of the eligible women. For women
belonging to scheduled caste, the mean children ever born are 2.3, for other backward classes are 1.8 and other castes are 1.9. For all religious groups, the mean number of surviving children is 2 shared almost by one surviving male and one surviving female children on the average.

| Table 3.5 CHILDREN EVER BORN AND LIVING |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Mean children ever born (CEB) and children surviving (CS) by selected background characteristics of currently married women aged 15-44 years, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| Background characteristic | Mean children ever born |  |  | Mean children surviving |  |  | Number of women |
|  | Total | Male | Female | Total | Male | Female |  |
| Age group (in years) |  |  |  |  |  |  |  |
| 15-19 | 0.4 | 0.2 | 0.3 | 0.4 | 0.1 | 0.3 | 64 |
| 20-24 | 1.0 | 0.5 | 0.5 | 1.0 | 0.5 | 0.5 | 589 |
| 25-29 | 1.6 | 0.9 | 0.8 | 1.6 | 0.8 | 0.7 | 834 |
| 30-34 | 2.1 | 1.1 | 1.0 | 2.0 | 1.1 | 0.9 | 790 |
| 35-39 | 2.4 | 1.2 | 1.2 | 2.3 | 1.1 | 1.2 | 726 |
| 40-44 | 2.6 | 1.3 | 1.4 | 2.4 | 1.2 | 1.3 | 643 |
| Marital duration (in years) |  |  |  |  |  |  |  |
| 0-4 | 0.7 | 0.4 | 0.4 | 0.7 | 0.4 | 0.4 | 778 |
| 5-9 | 1.8 | 1.0 | 0.8 | 1.7 | 0.9 | 0.8 | 825 |
| 10-14 | 2.2 | 1.1 | 1.1 | 2.1 | 1.0 | 1.1 | 774 |
| 15+ | 2.6 | 1.4 | 1.3 | 2.5 | 1.3 | 1.2 | 1,269 |
| Residence |  |  |  |  |  |  |  |
| Rural | 2.3 | 1.1 | 1.2 | 2.1 | 1.0 | 1.1 | 738 |
| Urban | 1.8 | 1.0 | 0.9 | 1.8 | 0.9 | 0.9 | 2,909 |
| Religion |  |  |  |  |  |  |  |
| Hindu | 1.9 | 1.0 | 1.0 | 1.8 | 0.9 | 0.9 | 3,125 |
| Muslim | 2.1 | 1.1 | 1.0 | 2.0 | 1.1 | 0.9 | 300 |
| Christian | 1.6 | 0.9 | 0.7 | 1.6 | 0.9 | 0.7 | 201 |
| Caste/tribe \# |  |  |  |  |  |  |  |
| Scheduled caste | 2.3 | 1.1 | 1.1 | 2.1 | 1.1 | 1.1 | 738 |
| Other backward class | 1.8 | 1.0 | 0.9 | 1.8 | 0.9 | 0.9 | 2,807 |
| Other | 1.9 | 0.9 | 1.0 | 1.9 | 0.9 | 1.0 | 75 |
| Education |  |  |  |  |  |  |  |
| Non-literate | 2.6 | 1.4 | 1.2 | 2.4 | 1.2 | 1.2 | 654 |
| 0-9@ years | 2.1 | 1.1 | 1.0 | 2.0 | 1.0 | 1.0 | 1,385 |
| 10 years \& above | 1.5 | 0.8 | 0.8 | 1.5 | 0.7 | 0.7 | 1,607 |
| Standard of living index |  |  |  |  |  |  |  |
| Low | 2.4 | 1.2 | 1.2 | 2.3 | 1.1 | 1.2 | 464 |
| Medium | 2.1 | 1.1 | 1.0 | 2.0 | 1.0 | 0.9 | 961 |
| High | 1.8 | 0.9 | 0.9 | 1.7 | 0.9 | 0.8 | 2,223 |
| All women | 1.9 | 1.0 | 0.9 | 1.8 | 0.9 | 0.9 | 3,647 |
| Note: \# Total number may not add upto N due to don't know and missing cases. Table includes 22 cases on other religion and 12 cases on scheduled tribe category on caste were not shown separately. @ Literate women with no year of schooling are included. |  |  |  |  |  |  |  |

The mean children ever born is higher for non-literate women (2.6) than women who have completed $0-9$ years of schooling (2.1) and 10 or more years of schooling (1.5). The mean number of surviving children for women corresponding to these educational levels is 2.4, 2.0 and 1.5 respectively. Further the mean children ever born for women classified into low, medium and high standard of living by SLI are 2.4, 2.1 and 1.8 respectively. For the state of Pondicherry, the DLHS-RCH shows inverse association between mean children ever born and educational attainment of women and also the level of household economic comfort.

### 3.6 Completed Fertility by District

The level of completed fertility as measured by mean children ever born to women of 40-44 years by districts in Pondicherry together with mean number of surviving children are shown in Table 3.6. On the average, women on the verge of completing reproductive period have given birth to 2.6 children in their reproductive life of which 2.4 children are surviving on the average. Completed fertility in Pondicherry varies from the low of 2.6 mean children ever born in Mahe to the highest of 3.3 children in Yanam district followed by Karaikal (2.9). Almost all the districts mean number of male and female children born to women in the 40-44 year age group is more or less equal. Yanam (3.1) recorded highest mean number of surviving children followed by Karaikal (2.7) and, Pondicherry and Mahe (2.5 each). Looking at the absolute difference between mean children ever born and mean number of surviving children, it seems that infant and child mortality is at mean of 0.2 in all of the districts and not varies much among districts in Pondicherry.

| Mean children ever born (CEB) and children surviving (CS) to currently married women aged 40-44 years by district, Pondicherry, 2002-04 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Mean children ever born |  |  | Mean children surviving |  |  |
| District | Total | Male | Female | Total | Male | Female |
| Mahe | 2.6 | 1.3 | 1.3 | 2.5 | 1.3 | 1.3 |
| Pondicherry | 2.7 | 1.3 | 1.4 | 2.5 | 1.2 | 1.3 |
| Karaikal | 2.9 | 1.5 | 1.4 | 2.7 | 1.3 | 1.4 |
| Yanam | 3.3 | 1.7 | 1.6 | 3.1 | 1.6 | 1.5 |
| Pondicherry | 2.6 | 1.3 | 1.4 | 2.4 | 1.2 | 1.3 |

### 3.7 Birth Order

Birth order distribution by selected background characteristics of women are provided in Table 3.7 and Figure 3.1. This distribution can be used as a measure of fertility in the absence of formal measures of fertility, such as, crude birth rate and total fertility rate.

| Table 3.7 BIRTH ORDER |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percent distribution of births during three years preceding the survey by birth order by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |
|  | Birth order |  |  |  | Total percent | Number of births |
| Background characteristic | 1 | 2 | 3 | 4+ |  |  |
| Age of women |  |  |  |  |  |  |
| Less than 25 years | 65.6 | 29.2 | 4.0 | 1.1 | 100.0 | 414 |
| 25-29 years | 44.1 | 43.6 | 10.6 | 1.7 | 100.0 | 418 |
| 30 years \& above | 17.7 | 48.9 | 21.0 | 12.3 | 100.0 | 206 |
| Place of residence |  |  |  |  |  |  |
| Rural | 46.9 | 32.6 | 16.4 | 4.1 | 100.0 | 219 |
| Urban | 47.6 | 40.7 | 8.3 | 3.4 | 100.0 | 818 |
| Education (Years of schooling) |  |  |  |  |  |  |
| Non-literate | 45.6 | 35.5 | 11.2 | 7.6 | 100.0 | 145 |
| 0-9@ years | 38.2 | 39.1 | 16.7 | 6.0 | 100.0 | 420 |
| 10 years \& above | 56.3 | 39.8 | 3.7 | 0.2 | 100.0 | 471 |
| Religion |  |  |  |  |  |  |
| Hindu | 48.2 | 39.3 | 9.3 | 3.2 | 100.0 | 891 |
| Muslim | 38.5 | 35.7 | 17.6 | 8.1 | 100.0 | 103 |
| Christian | 49.7 | 43.6 | 6.0 | 0.7 | 100.0 | 39 |
| Caste/tribe \# |  |  |  |  |  |  |
| Scheduled caste | 43.9 | 36.0 | 11.9 | 8.2 | 100.0 | 207 |
| Other backward class | 48.4 | 39.7 | 9.4 | 2.4 | 100.0 | 813 |
| Standard of living index |  |  |  |  |  |  |
| Low | 42.3 | 35.2 | 15.8 | 6.7 | 100.0 | 196 |
| Medium | 40.5 | 40.4 | 12.9 | 6.2 | 100.0 | 256 |
| High | 52.3 | 39.6 | 6.8 | 1.4 | 100.0 | 586 |
| Total | 47.5 | 38.9 | 10.0 | 3.6 | 100.0 | 1,037 |
| Note: Total includes 4 cases on other religion 1case on scheduled tribe and 14 cases in caste category were not shown separately. \# Total number of births may not add upto N due to don't know and missing cases. |  |  |  |  |  |  |

For the state of Pondicherry, 48 percent of the births born in the three years period preceding the survey were of first order, 39 percent of second order and the remaining 14 percent were of order 3 and higher order births. By current age of eligible women, 33 percent of births to women in the age group 30 years and above are 3 and higher order births. For women of less than 25 years, 66 percent births are of first order and 29 percent births are of second order. In the case of eligible women in urban areas 12 percent of the births are of 3 and higher whereas this order births constitute 21 percent for rural women indicating that higher order births are more concentrated in rural areas. Of the total births born to non-literate women, 19 percent and 23 percent of births born to women with 0-9 years of schooling are 3 and higher order births followed by four percent for women who had 10 or more years of schooling. In short, births born to 0-9 years of educated women are of higher order whereas much lower order births occurred to women who completed 10 or more years of schooling. Looking at the religious differential in
birth order distribution, it is observed Muslim women had 26 percent of higher order births followed by Hindu (13 percent) and Christian women (7 percent). The occurrence of births of order 3 and above is more among scheduled caste ( 20 percent) than among other backward classes (12 percent). Incidence of births of order 3 and above for women classified by household standard of living index are eight percent for high, 19 percent for medium and 23 percent for low living standard households women.


### 3.8 Birth Order by District

Table 3.8 and Figure 3.2 shows the births order distribution by districts in Pondicherry. The proportion of births of order 3 and above ranges from the lowest of 12 percent in Pondicherry to the highest of 25 percent in Karaikal. The remaining districts, Mahe (16 percent) and Yanam (22 percent) fall midway between these districts in terms of incidence of births of order 3 and above.


Table 3.8 BIRTH ORDER BY DISTRICT
Percent distribution of births during three years preceding the survey by birth order, according to district, Pondicherry, 2002-04

|  | Birth order |  |  |  |
| :--- | :---: | :---: | ---: | :---: |
| District | 1 | 2 | 3 | $4+$ |
|  | 46.9 | 37.5 | 12.0 | 3.7 |
| Mahe | 49.2 | 39.2 | 8.7 | 2.9 |
| Pondicherry | 42.6 | 32.9 | 18.5 | 6.1 |
| Karaikal | 35.4 | 42.4 | 15.7 | 6.5 |
| Yanam | 47.5 | 38.9 | 10.0 | 3.6 |
| Pondicherry |  |  |  |  |

### 3.9 Fertility Preference

The distribution of currently married women desiring additional children and preferred sex of additional children by number of living children of the women is shown vividly in Table 3.9 and Figure 3.3. Out of the 425 women with no living child, 65 percent want to have children within two years, while 27 percent are currently pregnant, two percent desired not to have any children, only one percent are declared as infecund and women who are using spacing methods, and undecided about the timing of birth are two percent. Among the currently married women, the
desire for additional children dwindles down with increasing number of living children. Among women with one living child 19 percent want additional children within two years, 18 percent want no more additional children, four percent after two years, 28 percent are using spacing methods, five percent are sterilized and six percent are undecided about the timing of the next child. Use of permanent as well as temporary means of contraception tends to be accelerated with number of living children. In the state of Pondicherry, out of the 3,647 surveyed representative women, 63 percent are using either terminal or temporary contraceptive methods, 13 percent desired to have additional children within two years, 12 percent want no more children, six percent are currently pregnant and one percent wants after two years. A total of 641 women want additional children irrespective of the number of living children. Out of 286 women who have no living children and desire for additional children, five percent want a boy as the first child and five percent desired for girl, for 64 percent, the sex of the child is immaterial and 26 percent leave it to God. With increasing number of living children male is the dominating preferred sex of the next child among one-third of women with two living children though about 48 percent women desiring additional children expressed that the sex of the child was immaterial.


| Table 3.9 FERTILITY PREFERENCE <br> Percent distribution of currently married women by desire for children according to number of living children, Pondicherry, 2002-04 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Desire for children | Number of living children |  |  |  |  | Total |
|  | 0 | 1 | 2 | 3 | 4+ |  |
| Desire for additional child |  |  |  |  |  |  |
| Wants another soon ${ }^{1}$ | 64.5 | 19.1 | 3.8 | 0.1 | 0.2 | 13.1 |
| Wants another later ${ }^{2}$ | 0.1 | 4.2 | 0.8 | 0.3 | 0.2 | 1.3 |
| Want another, undecided when | 2.6 | 6.3 | 0.5 | 0.2 | 0.1 | 1.8 |
| Undecided | 0.0 | 3.4 | 0.9 | 0.1 | 0.1 | 1.1 |
| Up to God | 0.1 | 0.7 | 0.1 | 0.1 | 0.1 | 0.2 |
| Want no more | 1.7 | 18.3 | 14.2 | 7.3 | 12.6 | 12.1 |
| Sterilized | 0.8 | 5.2 | 62.0 | 84.8 | 82.9 | 49.0 |
| Currently users ${ }^{3}$ | 2.3 | 28.4 | 15.9 | 6.9 | 3.7 | 14.3 |
| Currently pregnant | 26.6 | 13.1 | 0.8 | 0.1 | 0.1 | 6.2 |
| Declared infecund | 1.3 | 1.4 | 1.0 | 0.1 | 0.0 | 0.8 |
| Total percent | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Number of women | 425 | 764 | 1,465 | 717 | 276 | 3,647 |
| Preferred sex of additional children |  |  |  |  |  |  |
| Boy | 5.3 | 31.0 | 33.5 | * | * | 20.0 |
| Girl | 5.3 | 20.8 | 26.9 | * | * | 14.7 |
| Doesn't matter | 63.6 | 37.4 | 29.0 | * | * | 47.8 |
| Upto God | 25.8 | 10.8 | 10.6 | * | * | 17.6 |
| Total percent | 100.0 | 100.0 | 100.0 | * | * | 100.0 |
| Number of women | 286 | 257 | 90 | 6 | 2 | 641 |

### 3.10 Pregnancy Outcomes

Table 3.10 shows distribution of pregnancy outcomes including live birth, stillbirth, induced abortion and spontaneous abortion by districts in Pondicherry. For the state as a whole, 88 percent of pregnancy ends in live births, five percent in induced abortions, six percent in spontaneous abortions and less than one percent ( 0.4 percent) in stillbirths. Eighty-seven percent of pregnancies in rural areas and 89 percent in urban areas ended as live births. While the incidence of induced abortion is more in rural areas ( 9 percent) than in urban areas ( 5 percent). The proportion of pregnancies ending in live births ranges from 86 percent in Karaikal to 98 percent in Yanam. It was 88 percent in Pondicherry and 95 percent in Mahe. The incidence of induced abortion was highest of 10 percent in Karaikal and lowest of two percent in Mahe. The incidence of induced abortion was not reported in Yanam. Spontaneous abortion was more reported in Pondicherry ( 7 percent) followed by Karaikal (4 percent) and Mahe and Yanam (2 percent each).

## Table 3.10 OUTCOMES OF PREGNANCY

Percent distribution of all pregnancies of currently married women aged 15-44 years by their outcomes three year preceding the survey according to districts, Pondicherry, 2002-04

| Districts | Live birth | Stillbirth | Induced <br> abortion | Spontaneous <br> abortion | Total <br> percent |
| :--- | :---: | :---: | :---: | :---: | :---: |
| UT-Rural | 86.5 | 0.1 | 8.6 | 4.8 | 100.0 |
| UT-Urban | 88.6 | 0.5 | 4.5 | 6.4 | 100.0 |
| UT-Total | 88.1 | 0.4 | 5.4 | 6.0 | 100.0 |
|  |  |  |  |  |  |
| Mahe | 94.7 | 0.8 | 2.2 | 2.2 | 100.0 |
| Pondicherry | 87.7 | 0.3 | 5.3 | 6.6 | 100.0 |
| Karaikal | 85.7 | 0.6 | 9.6 | 4.2 | 100.0 |
| Yanam | 98.3 | 0.0 | 0.0 | 1.7 | 100.0 |

## CHAPTER IV

## MATERNAL HEALTH CARE

Provisions of maternal health care services to ensure safe motherhood is one of the major components of the Reproductive and Child Health (RCH) programme. The RCH programme services for antenatal care, includes at least three antenatal care visits, iron prophylaxis for pregnant and lactating women, at least one dose of tetanus toxoid vaccine, detection and treatment of anaemia in mothers, management and referral of high-risk pregnancies, natal care, that is encouragement of safe delivery, post-natal care and management of unwanted pregnancies. In rural areas, the government delivers reproductive health and other health services through its network of Sub-Centres (SCs), Primary Health Centres (PHCs) and other health facilities. In addition, pregnant women and children can get services from private maternity homes, hospitals, private practitioners, and in some case non-governmental organisations (NGOs) and trust hospitals. In urban areas, reproductive health services are available mainly through Government or Municipal hospitals, Urban Health Posts (UHPs), Urban Family Welfare Centres (UFWCs), hospitals and nursing homes operated by NGOs and Private nursing and maternity homes.

The National Population Policy (NPP), 2000 adopted by the Government of India (Ministry of Health and Family Welfare, 2000) reiterates the Government's commitments to the safe motherhood programme within the wider context of reproductive health. Among the national socio-demographic goals for 2010 specified by the policy, several goals pertain to safe motherhood, that 80 percent of all deliveries should take place in institutions by 2010, hundred percent deliveries should be attended by trained personnel, and the maternal mortality ratio should be reduced to a level below 100 per 100,000 live births. Empowering women for improved health and nutrition is one of the 12 strategic themes identified in the policy to be pursued either as stand-alone programmes or as intersectoral programmes.

In DLHS-RCH Phase-I, to all the eligible women who had their last pregnancy after January 1, 1999 a separate section on the status of maternal health and utilisation of maternal health care services was canvassed. In Phase-II, the same section was canvassed to all the eligible women who had their last pregnancy after January 1, 2001. The women whose last pregnancy terminated into live/still birth were asked about the details of antenatal, natal and post-natal care they received; pregnancy, delivery and post-delivery complications they suffered from and the treatment seeking behaviour in case of complications. Women whose last pregnancy terminated into abortion, either spontaneous or induced were asked about the utilisation of safe abortion services and the post-abortion complications they experienced. This chapter presents information on antenatal, natal and postnatal care received by women whose last pregnancy had terminated during the three years preceding the survey as live birth or as stillbirth.

### 4.1 Antenatal Check-Ups

Women who had given a birth during the three years preceding the survey were asked whether they had gone for antenatal check-ups outside the home, and if they had, what type of service provider had given them the check-ups. They were also asked whether any health worker had visited them at home to provide antenatal check-ups. Table 4.1 and Figure 4.1 present the percentage of women who had given birth during the three years preceding the survey and information regarding the antenatal check-ups they had by source of antenatal check-ups according to some selected background characteristics. Results shows that almost all the sampled women ( 100 percent) received antenatal check-ups during the three years preceding the survey, 0.2 point more than RCH Round I ( 99.8 percent). Ninety-two percent of women received antenatal check-ups from doctors and 19 percent from ANM/Nurse/LHV. Antenatal check-ups received at the doorstep from the ANM or health worker is not reported.


Background characteristics of women have not differentiated much in antenatal checkups. The proportion of women who received antenatal check-ups from doctors is 92 percent for women aged less than 30 years and 93 percent for 30 years and above. Antenatal checkups received from ANM/Nurse/LHV is 17 percent among women age 30 or less and 16 percent for women age 35 or more years. The proportion of women who received antenatal check-ups from doctors decreased as the number of children ever born increased. On the other hand women received antenatal check-ups from ANM, Nurse or LHV increased steadily as the children ever born increased. The percentage of women who received antenatal check-ups from doctors is 92 percent in urban areas and 91 percent in rural areas, and on the other hand, 26 percent of rural women received antenatal check-ups from auxiliary nurse midwife, nurse or LHVs, the same for women in urban areas is 14 percent.

## Table 4.1 ANTENATAL CHECK-UP

Percentage of women* who received any antenatal check-up (ANC) during pregnancy by source of antenatal provider according to selected background characteristics, Pondicherry, 2002-04

| Background characteristic | Any ${ }^{1}$ antenatal check-up | Antenatal check-up only at home by ANM | Health personnel providing ANC ${ }^{2}$ |  |  |  | Number of women |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Doctor | ANM/ Nurse/ LHV | Other health professional | Other ${ }^{3}$ |  |
| Age group |  |  |  |  |  |  |  |
| Less than 30 years | 100.0 | 0.0 | 91.7 | 16.9 | 1.1 | 0.8 | 788 |
| 30 years \& above | 100.0 | 0.0 | 92.7 | 16.0 | 0.9 | 1.2 | 253 |
| Children ever born |  |  |  |  |  |  |  |
| 1 | 100.0 | 0.0 | 92.8 | 12.3 | 0.8 | 0.9 | 405 |
| 2 | 100.0 | 0.0 | 92.0 | 16.8 | 1.3 | 0.9 | 480 |
| $3+$ | 100.0 | 0.0 | 89.5 | 27.7 | 0.7 | 1.0 | 156 |
| Residence |  |  |  |  |  |  |  |
| Rural | 100.0 | 0.0 | 91.0 | 26.2 | 2.3 | 2.9 | 221 |
| Urban | 100.0 | 0.0 | 92.2 | 14.1 | 0.7 | 0.4 | 820 |
| Education |  |  |  |  |  |  |  |
| Non-literate | 100.0 | 0.0 | 81.1 | 34.7 | 0.5 | 0.5 | 133 |
| 0-9 @ years | 100.0 | 0.0 | 88.8 | 19.8 | 1.0 | 1.1 | 412 |
| 10 years \& above | 100.0 | 0.0 | 97.5 | 9.2 | 1.2 | 1.0 | 496 |
| Religion |  |  |  |  |  |  |  |
| Hindu | 100.0 | 0.0 | 91.4 | 17.8 | 1.0 | 0.8 | 885 |
| Muslim | 100.0 | 0.0 | 97.1 | 9.8 | 1.4 | 2.1 | 102 |
| Christian | 100.0 | 0.0 | 89.9 | 12.5 | 1.3 | 1.3 | 50 |
| Caste/tribe\# |  |  |  |  |  |  |  |
| Scheduled caste | 100.0 | 0.0 | 89.2 | 27.2 | 1.9 | 0.5 | 211 |
| Other backward class | 100.0 | 0.0 | 92.5 | 14.2 | 0.8 | 1.0 | 811 |
| Standard of living index |  |  |  |  |  |  |  |
| Low | 100.0 | 0.0 | 84.3 | 28.4 | 1.8 | 0.8 | 176 |
| Medium | 100.0 | 0.0 | 85.3 | 26.8 | 1.0 | 1.1 | 251 |
| High | 100.0 | 0.0 | 96.9 | 9.1 | 0.8 | 0.9 | 614 |
| Availability of health facility ${ }^{4}$ in the village |  |  |  |  |  |  |  |
| No | 100.0 | 0.0 | 88.5 | 41.3 | 3.1 | 2.8 | 90 |
| Yes | 100.0 | 0.0 | 92.7 | 15.9 | 1.7 | 2.9 | 132 |
| Total | 100.0 | 0.0 | 91.9 | 16.7 | 1.0 | 0.9 | 1,041 |
| Note: * Women who had their last live/still birth since 1-1-1999/1-1-2001. Total includes 4 women with Jain religion, one woman with scheduled tribe and 15 women with other caste who were not shown separately. ${ }^{1}$ Antenatal check-ups either at home or outside from home at health facility. ${ }^{2}$ Antenatal check-ups outside home and percentage add more than 100.0 due to multiple responses. ${ }^{3}$ Other also includes trained and untrained dai . @ Literate women with no years of schooling are also included. \# Total figure may not add to N due to do not know and missing cases. ${ }^{4}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village. |  |  |  |  |  |  |  |

The proportion of women who received antenatal check-ups from a doctor, increased steadily with the level of education and the standard of living index. Eighty-one percent of non-literate women as compared to 98 percent having education of more than 10 years received ANC from doctors. Similarly, 84 percent women belonging to households with a low standard of living against 97 percent of that from a high standard of living fall in this category. The proportion of Muslim women ( 97 percent) who received antenatal check-ups from doctors was much higher than that of Hindu ( 91 percent) and Christian ( 90 percent) women. Ninety-three percent of women from the 'other backward castes' category received
antenatal check-ups from doctors, while it was 89 percent for scheduled caste women. On the other hand, 27 percent for scheduled caste women received ANC from ANM/Nurse/LHV and this percentage from other backward classes was 14. More women from villages with health facility ( 93 percent) received antenatal check-ups from Doctor compared to women from villages with no health facility ( 89 percent). More women in villages with no health facility (41 percent) received ANC from ANM/Nurse/LHV in villages with health facility (16 percent). Though 17 percent of women received antenatal check-ups from ANM, Nurse of LHV, women with 3 or more children ever born, rural women, non-literates, Hindu women, schedules caste women and women belonging to households with low and medium standard of living are more likely to receive antenatal check-ups from ANM, Nurse or LHV than others.

### 4.2 Antenatal Check-Ups at Health Facility

DLHS-RCH asked women who had a birth during the three years preceding the survey whether women had received antenatal check-ups, and if they had, from where they had availed such services. Table 4.2 shows the percentage of women who had received antenatal check-ups during pregnancy by place. During pregnancy, women received antenatal check-ups from multiple sources such as, health workers providing ANC at home, Government health facility, private health facility and at Indian System of Medicine etc., Women who received antenatal check-ups both at home and outside the home are categorised as having received care outside the home. Seventy percent of women received antenatal check-ups at Government health facility, including 28 percent through primary health centre and two percent through sub-centre and 46 percent at a private health facility. Other than this, three percent of women reported that they had received antenatal check-ups at the Private Indian system of medicine and Government Indian System of Medicine is only one percent. Government health facility was more preferred to avail antenatal check-ups than Private health facility. Two percent received through other sources.

| Table 4.2 PLACE OF ANTENATAL CHECK-UP |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of women* who received any antenatal check-ups (ANC) during pregnancy by source and place of antenatal check-ups according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
| Background characteristic | Place of antenatal check-ups ${ }^{1}$ |  |  |  |  |  |  |  |
|  | Govern- <br> ment ${ }^{2}$ <br> health <br> facility | Private ${ }^{3}$ <br> health <br> facility | PHC | SC | ISM ${ }^{4}$ facility |  | Other Number <br> of <br> women |  |
|  |  |  |  |  | Govt. | Private |  |  |
| Age group |  |  |  |  |  |  |  |  |
| Less than 30 years | 73.0 | 46.0 | 29.6 | 2.0 | 0.8 | 2.4 | 3.0 | 788 |
| 30 years \& above | 60.8 | 45.0 | 24.1 | 3.0 | 2.3 | 4.4 | 0.5 | 253 |
| Children ever born |  |  |  |  |  |  |  |  |
| 1 | 65.7 | 48.7 | 30.0 | 1.8 | 1.1 | 3.8 | 3.9 | 405 |
| 2 | 69.8 | 50.4 | 23.9 | 1.1 | 1.0 | 1.1 | 1.6 | 480 |
| $3+$ | 82.0 | 24.0 | 37.2 | 7.3 | 1.7 | 5.6 | 0.4 | 156 |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 85.2 | 36.8 | 50.4 | 6.9 | 2.7 | 1.9 | 1.8 | 221 |
| Urban | 65.9 | 48.2 | 22.3 | 1.0 | 0.7 | 3.1 | 2.5 | 820 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 98.6 | 22.1 | 59.1 | 5.5 | 1.4 | 1.1 | 0.5 | 133 |
| 0-9 @ years | 77.7 | 37.7 | 38.2 | 2.8 | 0.4 | 1.8 | 3.5 | 412 |
| 10 years \& above | 56.1 | 58.8 | 11.7 | 1.0 | 1.6 | 4.2 | 1.9 | 496 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 74.8 | 41.9 | 31.4 | 2.5 | 1.3 | 2.6 | 2.3 | 885 |
| Muslim | 34.1 | 73.2 | 5.2 | 0.7 | 0.2 | 5.6 | 3.2 | 102 |
| Christian | 56.2 | 62.7 | 21.2 | 1.2 | 0.0 | 2.1 | 1.3 | 50 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 84.6 | 31.1 | 40.4 | 3.1 | 2.5 | 1.6 | 0.9 | 211 |
| Other backward class | 67.0 | 49.3 | 25.8 | 2.1 | 0.8 | 3.1 | 2.8 | 811 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 95.0 | 19.9 | 59.5 | 2.5 | 1.0 | 1.9 | 1.2 | 176 |
| Medium | 88.2 | 23.3 | 43.4 | 2.5 | 0.3 | 1.4 | 0.3 | 251 |
| High | 55.5 | 62.4 | 13.1 | 2.1 | 1.5 | 3.7 | 3.5 | 614 |
| Availability of health facility ${ }^{4}$ in the village |  |  |  |  |  |  |  |  |
| No | 85.6 | 34.9 | 55.8 | 5.0 | 1.3 | 1.5 | 2.0 | 90 |
| Yes | 85.0 | 38.1 | 46.7 | 8.2 | 3.5 | 2.2 | 1.7 | 132 |
| Total | 70.0 | 45.8 | 28.2 | 2.3 | 1.1 | 2.8 | 2.4 | 1,041 |
| Note: * Women who had their last live/still birth since 1-1-1999/1-1-2001. Table includes 8 cases with missing information on place of antenatal check-up. Total includes 4 women with Jain religion, one woman with scheduled tribe and 15 women with other caste who were not shown separately. @ Literate women with no years of schooling are also included.\# Total figure may not add to N due to do not know and missing cases. ${ }^{1}$ Antenatal check-ups outside home and percentage add more than 100.0 due to multiple responses. ${ }^{2}$ Includes sub-centre, primary health centre, community health centre or rural hospital, urban health centre/ urban health post/ urban family welfare centre, government hospital or dispensary. ${ }^{3}$ Includes Private hospital/clinic or non-governmental hospital/ trust hospital or clinic. ${ }^{4}$ Indian system of medicine. ${ }^{5}$ Includes subcentre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village. |  |  |  |  |  |  |  |  |

Younger women of less than 30 years were more likely to receive antenatal-check-ups at government health facilities ( 73 percent) than older women for age 30 and above (61 percent). Eighty-five percent of women from rural areas availed government health facilities for antenatal check-ups that was much higher than women in urban areas (66 percent), and a high proportion of women from urban areas (48 percent) availed private health facilities for antenatal check-ups than women from rural areas ( 37 percent). It may be
mentioned that one-half ( 50 percent) of the women from rural areas, younger women aged below 30 years ( 30 percent) women with 3 or more parity ( 37 percent), non-literates (59 percent), Hindu women (31 percent), SC women (40 percent) and women in low standard of living ( 60 percent) received antenatal check-ups at Primary Health Centre. This indicates that the services are reaching the target population, particularly through the public sector. A comparatively high proportion of women who received antenatal check-ups at Government health facilities is found among women less than 30 years, non-literate, Hindu, scheduled caste, women with 3 or more number of children ever born and women living in households with a low standard of living.

### 4.3 Antenatal Check-Ups by District

Table 4.3 indicates the antenatal coverage in Pondicherry is at the highest of 100 percent. Almost all the women (100 percent) in all the districts got some kind of antenatal check-ups for their last births during the three years preceding the survey. Antenatal check-ups received from doctor was low in Karaikal (85 percent) and in all the remaining districts more than 90 percent of the women received antenatal check-ups from doctor and it is highest in Mahe (100 percent) followed by Yanam (99 percent). Nearly one-third of the women in Karaikal (31 percent), 17 percent in Pondicherry, less than one percent in Yanam ( 0.8 percent) and Mahe ( 0.3 percent) received antenatal check-ups from ANM, Nurse or LHV.

The extent of utilisation of government health facilities (70 percent) for antenatal check-ups is more than that of the utilization of private health facilities ( 46 percent). Antenatal check-ups coverage through government facilities was highest in Karaikal (78 percent) and lowest in Mahe (36 percent). Antenatal check-ups coverage through private facilities was highest in Mahe (63 percent) followed by Pondicherry (46 percent) and lowest in Karaikal ( 37 percent) and Yanam ( 32 percent). In Pondicherry, four percent of pregnant women availed the Indian System of Medicine (either government or private) for antenatal check-up. The percentage of women availed such services through the Indian System of Medicine is very low, it ranges from 0.2 in Yanam to 13 percent in Mahe district.

| Table 4.3 ANTENATAL CHECK-UPS BY DISTRICT |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of women* who received any antenatal care (ANC) by source and place of antenatal check-ups by district, Pondicherry, 2002-04 |  |  |  |  |  |  |
|  |  |  | sonnel ANC | Place of | ntenatal c | k-ups |
| District | Any ${ }^{1}$ antenatal check-up | Doctor | ANM/ <br> Nurse | Government ${ }^{2}$ health facility | Private ${ }^{3}$ health facility | $\begin{aligned} & \text { ISM }^{4} \\ & \text { facility } \end{aligned}$ |
| Karaikal | 100.0 | 84.9 | 30.6 | 78.1 | 37.4 | 6.5 |
| Mahe | 100.0 | 99.7 | 0.3 | 36.0 | 62.5 | 13.3 |
| Pondicherry | 100.0 | 92.9 | 16.6 | 73.2 | 45.7 | 2.7 |
| Yanam | 100.0 | 99.2 | 0.8 | 69.0 | 32.4 | 0.2 |
| Pondicherry | 100.0 | 91.9 | 16.7 | 70.0 | 45.8 | 3.8 |

Note: * Women who had last live/still birth during three years preceding the survey. ${ }^{1}$ Antenatal check-ups either at home or health facility. ${ }^{2}$ Includes sub-centre, primary health centre, community health centre or rural hospital, urban health centre/ urban health post/ urban family welfare centre, government hospital or dispensary. ${ }^{3}$ Includes Private hospital/clinic or nongovernmental hospital/ trust hospital or clinic. ${ }^{4}$ Either government or private Indian system of medicine.

### 4.4 Components of Antenatal Check-ups

Women who received any kind of antenatal check-ups were asked whether they received each of the several components of antenatal check-ups at least once during their pregnancy. Table 4.4 presents the percentage of women who received specific components of check-ups by residence. Except for X-rays (which are not recommended as a standard component of antenatal care), all of the measurements and tests are part of essential obstetric care or are required for monitoring high-risk pregnancies.

Ninety-seven percent of women were weighted and checked their blood pressure, and 95 percent had an abdominal examination as the part of the antenatal check-ups. Other common components of antenatal check-ups were blood test and urine test ( 98 percent each), the measurement of height ( 72 percent), internal examination ( 81 percent) and breast examination ( 64 percent). One-half ( 50 percent) of women had a sonogram or ultrasound, 10 percent had an X-ray and only seven percent of women reported that they had amniocentesis test. All of these measurements or procedures were performed more often during antenatal check-ups in urban areas than in rural areas except X-ray and checking blood pressure.

| Table 4.4 COMPONENTS OF ANTENATAL CHECK-UPS |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of women* who received an antenatal check-up by specific components of antenatal checkup according to residence, Pondicherry, 2002-04 |  |  |  |
| Components of antenatal check-ups | Total | Rural | Urban |
| Antenatal measurements/tests |  |  |  |
| Weight measured | 97.4 | 98.5 | 97.1 |
| Height measured | 72.4 | 70.9 | 72.8 |
| Blood pressure checked | 97.4 | 97.5 | 97.4 |
| Blood tested | 97.9 | 95.8 | 98.5 |
| Urine tested | 98.2 | 94.0 | 99.3 |
| Abdomen examined | 95.4 | 87.8 | 97.4 |
| Internal examined | 81.3 | 70.9 | 84.1 |
| Breast examined | 63.7 | 58.6 | 65.1 |
| X-ray | 10.1 | 15.4 | 8.7 |
| Sonography /ultrasound | 50.3 | 42.2 | 52.5 |
| Amniocentesis | 7.2 | 2.2 | 8.5 |
| Antenatal advice |  |  |  |
| Diet | 94.6 | 95.9 | 94.3 |
| Danger signs of pregnancy | 72.2 | 65.2 | 74.0 |
| Delivery care | 77.5 | 81.3 | 76.4 |
| Breast feeding | 64.4 | 60.7 | 65.4 |
| New born care | 62.4 | 56.6 | 64.0 |
| Family planning | 57.1 | 50.4 | 58.9 |
| Number of women who received any antenatal check-up | 1,041 | 221 | 820 |

The type of advice received by women who had antenatal check-ups for last live/still births during three years preceding the survey is also presented in Table 4.4. Advice on diet was given to 94 percent of urban women as compared to 96 percent of rural women and 95 percent in general. Seventy-two percent of the women received advice on danger signs of pregnancy. Women received advice on delivery care, breastfeeding and newborn care were 78 percent, 64 percent, and 62 percent respectively. Advice on family planning was given to 50 percent of rural women, 59 percent of urban women and 57 percent in general.

### 4.5 Antenatal Care Services

In India, the Reproductive and Child Health Programme includes all pregnant women should be registered in the first 12-16 weeks (Ministry of Health and Family Welfare, 1997). Accordingly the first antenatal check-ups should take place at latest during the first trimester of the pregnancy. It also includes the provision of atleast three antenatal care visits, of atleast one tetanus toxoid injection, and supplementary iron in the form of IFA tablets daily for 100 days. To assess whether the women had received all the care during pregnancy, information was collected regarding number of antenatal visits, timing of the first visit, received tetanus toxoid injection and supplement iron folic acid tablets. The results are presented in Table 4.5. In Pondicherry, 95 percent of the women received atleast four antenatal check-ups. Atleast four antenatal check-ups were received by 95 percent of women in urban areas and 97 percent of women in rural areas. Number of visits for antenatal care varies by education, religion, caste and standard of living index. Education of women is positively associated with number of antenatal check-ups. Ninety percent of non-literate, 95 percent literate women who had 0-9 years of education and 97 percent of women who had 10 or more years of schooling visited for minimum four antenatal check-ups. Ninety-five percent of women with parity one received at least four antenatal check-ups compared to 96 percent of the women with parity two or parity three.

Women who had atleast four visits of antenatal check-ups varies between different religious and caste groups. Ninety-four percent of the Muslim women, 95 percent of the Hindu women and 100 percent of the Christian women have atleast four visits of antenatal check-ups. Coverage is 94 percent for women from scheduled-caste and 96 percent for women from other backward castes. Having four or more antenatal visits was positively associated with the standard of living, 89 percent for women with a low standard of living, 96 percent for women with a medium standard of living and 97 percent for women with a high standard of living makes at least four antenatal visits. Availability of health facility in the village makes difference to the minimum four visits for antenatal check-ups. Ninety-five percent of women in villages with no health facility received atleast four antenatal check-ups, it increased to 99 percent among women living in villages with health facilities.

## Table 4.5 ANTENATAL CARE

Percent distribution of women who had live/still births during three years preceding the survey by number of antenatal check-ups, the stage of pregnancy at the time of first checkup, the number of tetanus toxoid injections received and were given iron folic acid (IFA) tablets/syrup during pregnancy, and percentage who received full antenatal check-ups by some selected background characteristics, Pondicherry, 2002-04

| Antenatal care indicators | Total | Residence |  | Education |  |  | Children ever born |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Rural | Urban | Nonliterate | $\begin{aligned} & \text { 0-9@ } \\ & \text { years } \end{aligned}$ | 10 years \& above | 1 | 2 | 3+ |
| Number of ANC visits |  |  |  |  |  |  |  |  |  |
| 1-3 visit | 4.7 | 2.7 | 5.2 | 10.1 | 5.2 | 2.8 | 5.4 | 4.2 | 4.3 |
| 4+ visit | 95.3 | 97.3 | 94.8 | 89.9 | 94.8 | 97.2 | 94.6 | 95.8 | 95.7 |
| Stage of pregnancy at the time of the first antenatal check-up |  |  |  |  |  |  |  |  |  |
| First trimester | 75.5 | 63.9 | 78.6 | 52.7 | 72.3 | 84.3 | 74.4 | 79.1 | 67.6 |
| Second trimester | 22.5 | 36.1 | 18.8 | 45.1 | 25.4 | 14.0 | 23.8 | 18.1 | 32.3 |
| Third trimester | 2.0 | 0.0 | 2.6 | 2.2 | 2.2 | 1.8 | 1.8 | 2.8 | 0.1 |
| Women who received TT |  |  |  |  |  |  |  | ] |  |
| No TT | 2.6 | 1.9 | 2.7 | 1.1 | 2.7 | 2.8 | 2.6 | 2.7 | 2.0 |
| 1 | 0.3 | 0.4 | 0.3 | 0.0 | 0.3 | 0.3 | 0.2 | 0.3 | 0.4 |
| 2+ | 97.2 | 97.7 | 97.0 | 98.9 | 96.9 | 96.9 | 97.2 | 97.0 | 97.6 |
| Women who received IFA tablets/syrup |  |  |  |  |  |  |  |  |  |
| No IFA/syrup | 3.9 | 5.2 | 3.5 | 4.4 | 6.8 | 1.4 | 1.2 | 5.0 | 7.5 |
| Received but not consumed | 1.7 | 0.3 | 2.1 | 5.1 | 0.5 | 1.8 | 2.8 | 0.9 | 1.3 |
| Consumed one IFA per day | 84.8 | 83.8 | 85.0 | 76.7 | 79.3 | 91.4 | 85.0 | 85.1 | 82.9 |
| Received 100+ IFA tablets/syrup | 30.2 | 28.0 | 30.7 | 16.5 | 28.5 | 35.2 | 34.4 | 28.7 | 23.7 |
| Percentage of women who received full ${ }^{1}$ antenatal check-ups | 28.8 | 27.9 | 29.0 | 16.3 | 27.3 | 33.3 | 33.1 | 26.8 | 23.6 |
| Number of women | 1,041 | 221 | 820 | 133 | 412 | 496 | 405 | 480 | 156 |
| Note: @ Literate women with no years of schooling are also included. ${ }^{1}$ At least three visits for antenatal check-ups, at least one TT injection received and were given adequate amount of IFA tablets/syrup. |  |  |  |  |  |  |  |  |  |

Table 4.5 ANTENATAL CARE (contd)
Percent distribution of women who had live/still births during three years preceding the survey by number of antenatal check-ups, the stage of pregnancy at the time of first check-up, the number of tetanus toxoid injections received and were given iron folic acid (IFA) tablets/syrup during pregnancy, and percentage who received full antenatal check-ups by some selected background characteristics, Pondicherry, 2002-04

| Antenatal care indicators | Religion |  |  | Caste\# |  | Standard of living index |  |  | Availability of health facility ${ }^{2}$ in the village |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Hindu | Muslim | Chris tian | $\begin{aligned} & \text { Sched } \\ & \text { uled } \\ & \text { caste } \end{aligned}$ | Other backw ard class | Low | Medium | High | No | Yes |
| Number of ANC visits |  |  |  |  |  |  |  |  |  |  |
| 1-3 visit | 4.9 | 5.7 | 0.0 | 5.7 | 4.3 | 10.8 | 4.4 | 3.1 | 4.9 | 1.2 |
| 4+ visit | 95.1 | 94.3 | 100.0 | 94.3 | 95.7 | 89.2 | 95.6 | 96.9 | 95.1 | 98.8 |
| Stage of pregnancy at the time of the first antenatal check-up |  |  |  |  |  |  |  |  |  |  |
| First trimester | 74.5 | 81.7 | 78.3 | 62.9 | 78.5 | 56.4 | 72.9 | 82.1 | 60.8 | 66.1 |
| Second trimester | 23.1 | 17.9 | 21.7 | 33.8 | 19.8 | 36.8 | 26.9 | 16.5 | 39.2 | 33.9 |
| Third trimester | 2.3 | 0.4 | 0.0 | 3.3 | 1.7 | 6.8 | 0.2 | 1.4 | 0.0 | 0.0 |
| Women who received TT |  |  |  |  |  |  |  |  |  |  |
| No TT | 2.1 | 6.9 | 2.6 | 2.5 | 2.6 | 4.0 | 0.8 | 2.9 | 1.9 | 1.9 |
| 1 | 0.3 | 0.0 | 0.0 | 0.7 | 0.2 | 0.6 | 0.0 | 0.3 | 0.3 | 0.4 |
| 2+ | 97.6 | 93.1 | 97.4 | 96.7 | 97.2 | 95.4 | 99.2 | 96.8 | 97.8 | 97.7 |
| Women who received IFA tablets/syrup |  |  |  |  |  |  |  |  |  |  |
| No IFA/syrup | 3.6 | 0.6 | 16.0 | 6.0 | 3.5 | 5.0 | 8.7 | 1.6 | 8.7 | 2.9 |
| Received but not consumed | 1.9 | 0.6 | 0.0 | 2.1 | 1.7 | 1.8 | 2.1 | 1.5 | 0.3 | 0.2 |
| Consumed one IFA per day | 84.5 | 91.3 | 75.4 | 80.5 | 85.5 | 78.1 | 77.2 | 89.7 | 83.3 | 84.1 |
| Received 100+ IFA tablets/syrup | 30.8 | 32.6 | 16.3 | 33.6 | 29.2 | 13.5 | 29.2 | 35.4 | 27.9 | 28.1 |
| Percentage of women who received full ${ }^{1}$ antenatal check-ups | 29.3 | 31.7 | 15.0 | 31.7 | 27.9 | 13.3 | 28.7 | 33.2 | 27.9 | 27.9 |
| Number of women | 885 | 102 | 50 | 211 | 811 | 176 | 251 | 614 | 90 | 132 |

Note: Total includes 4 women with Jain religion, one woman with scheduled tribe and 15 women with other caste who were not shown separately. \# Total figure
may not add to N due to don't know and missing cases. ${ }^{1}$ At least three visits for antenatal check-ups, at least one TT injection received and was given adequate amount of IFA tablets/syrup. ${ }^{2}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village.

Data on timing of first antenatal check-ups shows that little more than three-fourths of the women received their first antenatal check-up in the first trimester of pregnancy ( 76 percent) and another 22 percent received their first check-up in the second trimester and only two percent of women received their first check-up in the third trimester. A relatively higher proportion of women in the urban areas ( 79 percent) as compared to those in rural areas (64 percent) had a check-up in the first trimester of pregnancy. The first antenatal check-up in the first trimester has steadily increased with education. Fifty-three percent of non-literate women had undergone their first antenatal check-up in the first trimester compared to 84 percent of women who had completed at least 10 years of schooling received their first antenatal check-up in the first trimester. Little less than three-fourths of the women (74 percent) with first parity were visited in first trimester, it increased to 79 percent in the second parity and then decreased to 68 percent in three or more parity. Eighty-two percent of the Muslim women, 78 percent of the Christian women and 75 percent of the Hindu women go for first antenatal check-up in first trimester of their pregnancy. Scheduled caste women (63 percent) were less likely to go for first antenatal check-up in first trimester of their pregnancy than the other backward class of women (79 percent). Similarly, the timing of first antenatal visit in the first trimester increases with the standard of living index. Coverage of antenatal check-up in the first trimester increased from 56 percent in women with low standard of living to 73 percent in women with medium standard of living and 82 percent in women with high standard of living. It is higher for women in villages with health facility (66 percent) than women in villages without health facility (61 percent).

Nutritional deficiencies in women are often exacerbated during pregnancy because of the additional nutrient requirements of foetal growth; therefore a pregnant woman needs six times more iron than a non-pregnant woman. The information on receiving iron folic acid tablets/syrup during pregnancy is also collected. Table 4.5 shows that 96 percent of women in Pondicherry received IFA supplements for the last birth during three years preceding the survey. The coverage of IFA tablets not varies much by residence. IFA coverage is low for schedule caste women ( 94 percent), women of higher parity of 3 or more ( 92 percent), women with 0-9 years of education ( 93 percent) and women in rural ( 95 percent). IFA coverage is also lower among Christian women ( 84 percent) than Muslim ( 99 percent) and Hindu ( 96 percent) women. Availability of health facility in the village increase the coverage of IFA tablets at considerable extent, 91 percent of the women in villages with no health facility received IFA tablets and it increased to 97 percent among women living in villages with health facilities. Consumption of IFA tablets was at 85 percent. It was higher among Muslims ( 91 percent), other backward class ( 86 percent), high standard of living women ( 90 percent) and women completed 10 or more years of schooling ( 91 percent) than their counterparts. Again, during pregnancy in the last three years preceding the survey, 30 percent of women received 100 or more IFA tablets, 28 percent in rural areas and 31 percent in urban areas. Intake of 100 or more IFA is positively associated with education and standard of living index and negatively associated with parity. More women from Muslim religion (33 percent) and scheduled caste ( 34 percent) received 100 or more IFA tablets than their counterparts. Availability of health facility in the village does not make any difference in receiving IFA or intake of 100 or more IFA tablets/syrup.

For the last live birth or stillbirth during the three years preceding the survey, women were asked whether they were given tetanus toxoid injection to prevent them and their baby from getting tetanus. Table 4.5 shows that 97 percent of the women received two or more tetanus toxoid injections. Coverage of two or more TT injection is more or less similar in urban ( 97 percent) and rural areas ( 98 percent). The coverage of atleast one tetanus toxoid injection does not vary by educational level of women and parity of women. It varies between 97 to 99 percent for educational and parity levels. It also does not vary much between castes. The coverage is higher for Hindu ( 98 percent) and Christian ( 97 percent) than Muslim (93 percent) women. Coverage of at least one tetanus toxoid injection is similar for schedule caste and for other backward classes category women ( 97 percent each). Ninety-seven percent of women with a high standard of living received at least one tetanus toxoid injection and 99 percent of women with medium and 96 percent of women with low standard of living received at least one tetanus toxoid injection for their last live/still birth. Availability of health facility in the village not makes variation in women received at least one tetanus toxoid injection.

The percentage of women who received full antenatal care, (that is, at least three antenatal check-ups, and at least one tetanus toxoid injection and supplementary iron in the form of IFA tablets daily for 100 days as recommended by the RCH programme) has been presented in Figure 4.2. Twenty-nine percent of women in Pondicherry received full antenatal care. Full antenatal coverage was 28 percent in rural areas and 29 percent in urban areas. Coverage of full antenatal care is low for non-literate women, Christian women, women from other backward and women with a low standard of living.


### 4.6 Antenatal Care Indicator by District

Table 4.6 shows the percentage of women who had given live/still birth during the three years preceding the survey who received different types of antenatal care (the percentage who received antenatal check-up in the first trimester of pregnancy, the percentage who received at least three antenatal check-ups, the percentage who received at least one tetanus toxoid injection, the percentage given 100 or more iron folic acid tablets/syrup, and the percentage who received full antenatal care services) by district.

| Table 4.6 ANTENATAL CARE INDICATORS BY DISTRICT |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Percentage of women* who received different type of antenatal care by district, Pondicherry, 2002-04 |

> Note: * Women who had their last live/still birth since 1-1-1999/1-1-2001. ${ }^{1} 100$ or more iron folic acid tablets including syrup. ${ }^{2}$ At least three visits for antenatal check-ups, at least one TT injection received and adequate amount of IFA.

The utilisation of antenatal care services differs from district to district. In two out of four districts, Karaikal and Pondicherry less than 80 percent of the women received their first antenatal check-up in the first trimester of pregnancy. The percentage of women who received at least three visits for antenatal check-ups ranges from 98 percent in Pondicherry district to 100 percent in Yanam. There has been good coverage of tetanus toxoid injection in all districts, ranging from 91 in karaikal to 100 percent in Mahe, but on the other hand, performance regarding receipt of 100 or more IFA is poor in all the districts except Mahe ( 86 percent), it was 31 percent in Pondicherry and 19 percent in Karaikal. The percentage of women who received full antenatal care ranges from 18 percent in Karaikal to 86 percent in Mahe and 29 percent in Pondicherry. The coverage of full antenatal care is below than that of the state average (27 percent) in Karaikal (18 percent) and Yanam (no performance).

### 4.7 Pregnancy Complications and Treatment

Complications during pregnancy may affect both women's health and the outcome of the pregnancy adversely. Early detection of complications during pregnancy and their management are important components of the safe motherhood programme. In the survey, all the eligible women who had given last live birth or still birth during the three years preceding the survey were asked if at any time during the pregnancy, they had experienced any of the following pregnancy-related problems such as swelling of hands and feet, paleness, visual disturbance, vaginal bleeding, convulsions, weak or no movement of foetus, abnormal position of foetus and other problems. All the information is based on women's self-reporting which is presented in Table 4.7 and Figure 4.3.


| Percentage of women who had live/still births during three years preceding the survey by pregnancy complication and type of complication during pregnancy by some selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Type of pregnancy complication; |  |  |  |  |  |  |  |  |
| Background characteristic | with any pregnancy complication | Swelling of hands and feet | Paleness | Visual disturbances | Bleeding | Convulsion | Weak or no movement of foetus | Abnormal position of foetus | Other | $\begin{aligned} & \text { Number } \\ & \text { of } \\ & \text { women } \end{aligned}$ |
| Age group (in years) |  |  |  |  |  |  |  |  |  |  |
| Below 25 | 23.9 | 16.4 | 5.5 | 2.3 | 1.0 | 1.7 | 1.2 | 0.9 | 3.9 | 355 |
| 25-29 | 29.3 | 21.7 | 5.8 | 2.8 | 1.6 | 2.0 | 1.5 | 0.7 | 6.3 | 432 |
| 30-34 | 25.1 | 18.4 | 2.3 | 2.5 | 1.4 | 4.8 | 0.3 | 1.2 | 3.0 | 188 |
| 35 \& above | 8.9 | 6.6 | 0.9 | 0.0 | 0.6 | 0.0 | 0.4 | 2.4 | 0.0 | 66 |
| Children ever born |  |  |  |  |  |  |  |  |  |  |
| 1 | 34.2 | 25.9 | 5.8 | 4.9 | 1.0 | 0.7 | 2.1 | 0.7 | 6.1 | 405 |
| 2 | 20.8 | 14.6 | 4.2 | 0.9 | 1.6 | 3.3 | 0.3 | 0.8 | 3.5 | 480 |
| $3+$ | 16.5 | 9.8 | 3.8 | 0.9 | 1.3 | 2.9 | 0.8 | 2.2 | 3.2 | 156 |
| Any ANC |  |  |  |  |  |  |  |  |  |  |
| Yes | 25.4 | 18.3 | 4.8 | 2.4 | 1.3 | 2.3 | 1.1 | 1.0 | 4.5 | 1,041 |
| Residence |  |  |  |  |  |  |  |  |  |  |
| Rural | 15.3 | 9.0 | 5.6 | 1.1 | 1.8 | 3.1 | 1.6 | 1.6 | 3.5 | 221 |
| Urban | 28.1 | 20.8 | 4.6 | 2.8 | 1.2 | 2.0 | 1.0 | 0.8 | 4.8 | 820 |
| Standard of living index |  |  |  |  |  |  |  |  |  |  |
| Low | 20.5 | 11.0 | 5.6 | 1.3 | 0.9 | 2.7 | 1.2 | 2.3 | 4.9 | 176 |
| Medium | 24.9 | 18.7 | 4.2 | 1.7 | 1.3 | 0.9 | 0.3 | 0.8 | 5.3 | 251 |
| High | 27.0 | 20.3 | 4.8 | 3.0 | 1.4 | 2.7 | 1.4 | 0.6 | 4.0 | 614 |
| Total | 25.4 | 18.3 | 4.8 | 2.4 | 1.3 | 2.3 | 1.1 | 1.0 | 4.5 | 1,041 |

One-fourth (25 percent) of the women experienced at least one pregnancy related problem. The proportion was 15 percent in rural and 28 percent in urban. Women in their first parity ( 34 percent) face atleast one pregnancy related problem more than women with parity 3 and above ( 17 percent). This proportion is relatively high among women in high standard of living (27 percent) than women in low standard of living ( 21 percent). The major problems reported were 'swelling of hand and feet' (18 percent), 'paleness' (5 percent), 'convulsion’ and 'visual disturbance’ (2 percent each). Only one percent each reported about 'abnormal position of foetus', 'vaginal bleeding', and 'weak or no movement of foetus'. Other problems related to pregnancy were reported by five percent of women. Swelling of hands and feet is more common among younger women age 25-29 years, women in first parity, women in urban and women with high a standard of living. Visual disturbance was high in urban, high standard of living and women with parity one. Paleness was more among women in first parity, rural and low standard of living women.

Women who reported at least one pregnancy related complication were asked whether they had consulted someone or had sought treatment for their problem and also the source of treatment. Table 4.8 shows the percentage of women who had pregnancy complications who obtained advice or had sought treatment by source of treatment according to residence and availability of health facility in the village. Sixty-one percent of women reported that they had obtained advice or consulted someone for their problem.

Among women who sought treatment for pregnancy complications, 64 percent visited government health facility including a Primary Health Centre (11 percent) and Sub-centre (2 percent). Nearly two-fifths (39 percent) of them visited a private health facility, and four percent had gone to a facility with the Indian System of Medicine, while only two percent obtained advice from other health facility. Among women who sought treatment, 98 percent went to a doctor and two percent to Auxiliary Nurse Midwife or Nurse or LHV.

| TABLE 4.8 TREATMENT FOR PREGNANCY COMPLICATIONS |
| :--- | :---: | :---: | :---: |
| Percentage of women* who had any pregnancy complication, sought treatment and source of treatment |
| according to residence, Pondicherry, 2002-04 |

### 4.8 Delivery Care

### 4.8.1 Place of Delivery

One of the important thrusts of the Reproductive and Child Health Programme is to encourage deliveries under proper hygienic conditions under the supervision of trained health professionals. The provision of delivery services in the government health institutions is one of the components of the RCH programme. For each live/still birth during three years preceding the survey, DLHS-RCH asked the women where (place) their children were born, who assisted during the deliveries in case of home deliveries, characteristics of delivery, and any problems that occurred during the delivery. Table 4.9 and Figure 4.4 present the place of delivery. In Pondicherry, government facilities (70 percent) were more utilized for delivery than private health facilities ( 27 percent) and a small proportion of births took place at home ( 2 percent). About 98 percent of the deliveries in rural areas and 97 percent of the deliveries in urban areas took place in health institutions. Deliveries in health facilities in Pondicherry rose from 92 percent in Round-I to 97 percent in Round-II.

| Percent distribution of women who had given live/still births during three years preceding the survey, by place of delivery, according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Health institutions |  | Home | Other | Missing | Total percent | Number of women |
| Background characteristics | Public | Private |  |  |  |  |  |
| Age group (in years) |  |  |  |  |  |  |  |
| Below 30 | 72.3 | 24.3 | 2.8 | 0.5 | 0.0 | 100.0 | 788 |
| 30 and above | 63.7 | 35.2 | 0.5 | 0.5 | 0.0 | 100.0 | 253 |
| Children ever born |  |  |  |  |  |  |  |
| 1 | 65.4 | 31.7 | 1.8 | 1.1 | 0.1 | 100.0 | 405 |
| 2 | 71.7 | 25.7 | 2.4 | 0.3 | 0.0 | 100.0 | 480 |
| 3+ | 78.2 | 18.7 | 3.1 | 0.0 | 0.0 | 100.0 | 156 |
| Residence |  |  |  |  |  |  |  |
| Rural | 86.1 | 12.1 | 1.6 | 0.2 | 0.0 | 100.0 | 221 |
| Urban | 65.9 | 31.0 | 2.5 | 0.6 | 0.0 | 100.0 | 820 |
| Education |  |  |  |  |  |  |  |
| Non-literate | 88.3 | 8.2 | 3.5 | 0.0 | 0.0 | 100.0 | 133 |
| 0-9@ years | 77.5 | 18.9 | 2.8 | 0.8 | 0.0 | 100.0 | 412 |
| 10 years \& above | 59.3 | 38.7 | 1.6 | 0.4 | 0.0 | 100.0 | 496 |
| Religion |  |  |  |  |  |  |  |
| Hindu | 74.7 | 22.8 | 2.5 | 0.1 | 0.0 | 100.0 | 885 |
| Muslim | 35.2 | 61.2 | 1.2 | 2.4 | 0.0 | 100.0 | 102 |
| Christian | 67.4 | 26.1 | 1.2 | 5.3 | 0.0 | 100.0 | 50 |
| Caste\# 10.0 |  |  |  |  |  |  |  |
| Scheduled caste | 80.4 | 13.2 | 5.7 | 0.6 | 0.0 | 100.0 | 211 |
| Other backward class | 68.4 | 29.8 | 1.3 | 0.5 | 0.0 | 100.0 | 811 |
| Standard of living index |  |  |  |  |  |  |  |
| Low | 89.8 | 7.6 | 1.7 | 0.8 | 0.0 | 100.0 | 176 |
| Medium | 80.1 | 15.3 | 4.1 | 0.5 | 0.0 | 100.0 | 251 |
| High | 60.5 | 37.3 | 1.7 | 0.5 | 0.0 | 100.0 | 614 |
| Number of antenatal check-ups |  |  |  |  |  |  |  |
| 1-3 visits | (66.1) | (25.4) | (8.5) | (0.0) | (0.0) | 100.0 | 49 |
| 4+ visits | 69.1 | 28.0 | 2.3 | 0.6 | 0.0 | 100.0 | 992 |
| Delivery characteristics |  |  |  |  |  |  |  |
| Normal | 76.2 | 21.8 | 1.8 | 0.3 | 0.0 | 100.0 | 754 |
| Caesarean | 56.8 | 42.5 | 0.2 | 0.5 | 0.0 | 100.0 | 259 |
| Assisted | (51.6) | (12.9) | (25.8) | (9.7) | (0.0) | 100.0 | 28 |
| Availability of health facility ${ }^{1}$ in the village |  |  |  |  |  |  |  |
| No | 87.7 | 9.5 | 2.5 | 0.3 | 0.0 | 100.0 | 90 |
| Yes | 85.1 | 13.9 | 0.9 | 0.2 | 0.0 | 100.0 | 132 |
| Total | 70.2 | 27.0 | 2.3 | 0.5 | 0.0 | 100.0 | 1,041 |

Note: Total includes 4 women with Jain religion, one woman with scheduled tribe and 15 women with other caste who were not shown separately. @ Literate women with no years of schooling are also included. \# Total figure may not add to N due to do not know and missing cases. ${ }^{1}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village. ( ) Based on less than 50 unweighted cases.

The proportion of births occurring in health institutions is higher for women above 30 years ( 99 percent) than for women aged below 30 years ( 97 percent). Institutional deliveries, particularly in private health facilities, increase sharply with education and the standard of living. Ninety-seven percent of the births to non-literate women and 98 percent births to literate women who had completed at least 10 or more years of schooling took place at health institutions. Women with a low and high standard of living ( 98 percent) were more likely to give birth in health institutions than women with a medium standard of living (95 percent) (Figure 4.4). Institutional delivery is 98 percent among Hindu women, 96 percent among Muslim women and 94 percent among Christian women. Ninety-four percent births of women from scheduled-caste are institutional deliveries as compared to 98 percent of births to
women from other backward classes. Little more than, three-fourths (76 percent) of normal deliveries and 57 percent of caesarean deliveries occurred in Government health institutions. As expected, a large proportion of births occurred through caesarean section deliveries took place at health institutions. Ninety-nine percent of births in villages with health facility and 97 percent of births from villages without any health facility took place at health institutions.

### 4.8.2 Delivery Assisted by Skilled Persons

The extent of safe deliveries varied substantially by background characteristics of women (Table 4.10 and Figure 4.4). Ninety-nine percent of the births were safe in Pondicherry which increased from 93 percent in Round-I. It is 98 percent in urban areas and 99 percent in rural areas. Safe deliveries does not vary much by age, education, caste and parity of women. Women with low standard of living had 98 percent of safe deliveries which increases to 100 percent of women with a high standard of living. The proportion of safe deliveries not differs by availability of health facility in the villages.

| Table 4.10 DELIVERY ASSISTED BY SKILLED PERSONS |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of women who had given live/still births during three years preceding the survey by safe delivery according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |
| Background characteristic | Perce | $\text { safe }^{2}$ | Number of women |
|  | Yes | No |  |
| Age group (in years) |  |  |  |
| Below 30 | 98.2 | 1.8 | 788 |
| 30 and above | 99.3 | 0.7 | 253 |
| Children ever born |  |  |  |
| 1 | 98.7 | 1.3 | 405 |
| 2 | 98.4 | 1.6 | 480 |
| $3+$ | 98.0 | 2.0 | 156 |
| Residence |  |  |  |
| Rural | 99.3 | 0.7 | 221 |
| Urban | 98.2 | 1.8 | 820 |
| Education |  |  |  |
| Non-literate | 97.6 | 2.4 | 133 |
| 0-9@ years | 97.8 | 2.2 | 412 |
| 10 years \& above | 99.2 | 0.8 | 496 |
| Religion |  |  |  |
| Hindu | 98.9 | 1.1 | 885 |
| Muslim | 96.5 | 3.5 | 102 |
| Christian | 94.1 | 5.9 | 50 |
| Caste\# |  |  |  |
| Scheduled caste | 98.1 | 1.9 | 211 |
| Other backward class | 98.6 | 1.4 | 811 |
| Standard of living index |  |  |  |
| Low | 98.1 | 1.9 | 176 |
| Medium | 96.2 | 3.8 | 251 |
| High | 99.5 | 0.5 | 614 |
| Number of antenatal check-ups |  |  |  |
| 1-3 visits | (94.9) | (5.1) | 49 |
| 4+ visits | 98.4 | 1.6 | 992 |
| Delivery characteristics |  |  |  |
| Normal | 98.3 | 1.7 | 754 |
| Caesarean | 99.5 | 0.5 | 259 |
| Assisted | (90.3) | (9.7) | 28 |
| Availability of health facility ${ }^{1}$ in the village |  |  |  |
| No | 99.4 | 0.6 | 90 |
| Yes | 99.3 | 0.7 | 132 |
| Total | 98.5 | 1.5 | 1,041 |

Note: Total includes 4 women with Jain religion, one woman with scheduled tribe and 15 women with other caste who were not shown separately. @ Literate women with no years of schooling are also included. \# Total figure may not add to N due to do not know and missing cases. ${ }^{2}$ Either institutional delivery or home delivery assisted by doctor/ANM/Nurse/LHV. ${ }^{1}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village. ( ) Based on less than 50 unweighted cases.


Figure 4.5
Delivery Assisted by Skilled Person by Background Characteristic


Pondicherry, DLHS-RCH, 2002-04

### 4.9 Delivery Characteristics by District

Table 4.11 shows the delivery characteristics by district; institutional delivery (delivery in government or private health institutions), home delivery and attendant/assistance during home delivery for last live/still births to women during the three years preceding the survey. The proportion of institutional delivery is lowest in Yanam (82 percent), increased in Karaikal ( 94 percent) and it is highest in Mahe (100 percent) and Pondicherry ( 99 percent).

| Table 4.11 D <br> Place of deli Pondicherry, | ERISTICS BY DIS home deliveries | percentage of sa | deliveries by | trict, |
| :---: | :---: | :---: | :---: | :---: |
| Districts | Percentage of women who had institutional delivery | Percentage of women who had delivery at home | Home delivery assisted by skilled $^{1}$ persons | Percentage of safe ${ }^{2}$ delivery |
| Karaikal | 93.8 | 3.6 | 53.1 | 95.7 |
| Mahe | 99.6 | 0.0 | 0.0 | 99.6 |
| Pondicherry | 98.8 | 1.2 | 74.0 | 99.7 |
| Yanam | 82.3 | 17.7 | 39.7 | 89.3 |
| Pondicherry | 97.2 | 2.3 | 56.8 | 98.6 |

Note: Table includes last live/still birth since 1-1-1999/1-1-2001. ${ }^{1}$ Includes Doctor/ANM/Nuse. ${ }^{2}$ Either
institutional delivery or home delivery assisted by skilled person.
Compared to delivery in a private health facility, deliveries in a government health facility are more common in all the districts of Pondicherry. Ninety-seven percent of births are institutional delivery in the state, but in Yanam district 18 percent of the births took place at home. Karaiakl had four percent of home deliveries. The extent of safe deliveries are more than 95 percent except Yanam district ( 89 percent) and it was 100 percent in Mahe and Pondicherry districts.

### 4.10 Complications During Delivery

Complications during delivery include 'premature labour', 'obstructed labour', 'prolonged labour (more than 12 hours)', 'breech presentations', 'excessive bleeding during delivery' and 'other problems' at the time of delivery reported by women during the three years preceding the survey. Little more than one-third ( 35 percent) of the women experienced at least one problem during delivery (Table 4.12 and Figure 4.6). The proportion of delivery complications is lower among urban women (33 percent) than among rural women (42 percent).

| Table 4.12 DELIVERY COMPLICATIONS |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of women who had given last live/still births during three years preceding the survey by delivery complication according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
|  | Any delivery complic -ation | Type of delivery complication |  |  |  |  |  | Number of women |
| Background characteristics |  | $\begin{gathered} \text { Prematu } \\ \text {-re } \\ \text { labour } \end{gathered}$ | Excessi- <br> ve bleeding | Prolonged labour | $\begin{gathered} \text { Obstruct } \\ \text {-ed } \\ \text { labour } \end{gathered}$ | Breech presntation | Others |  |
| Age group (in years) |  |  |  |  |  |  |  |  |
| Below 30 | 33.6 | 4.1 | 2.1 | 9.9 | 7.2 | 2.7 | 13.9 | 788 |
| 30 and above | 39.5 | 1.4 | 2.3 | 4.9 | 7.3 | 0.7 | 25.1 | 253 |
| Children ever born |  |  |  |  |  |  |  |  |
| 1 | 44.2 | 6.1 | 1.7 | 12.7 | 6.9 | 3.6 | 20.9 | 405 |
| 2 | 33.7 | 2.2 | 2.3 | 6.1 | 7.6 | 1.6 | 18.2 | 480 |
| $3+$ | 15.0 | 0.4 | 3.1 | 6.0 | 6.8 | 0.5 | 0.9 | 156 |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 42.4 | 2.3 | 2.7 | 19.0 | 14.4 | 2.0 | 16.3 | 221 |
| Urban | 33.1 | 3.8 | 2.1 | 5.9 | 5.3 | 2.3 | 16.8 | 820 |
| Number of antenatal check-ups |  |  |  |  |  |  |  |  |
| $1-3$ visits | (37.3) | (3.4) | (5.1) | (11.9) | (8.5) | (6.8) | (11.9) | 49 |
| 4+ visits | 34.1 | 3.3 | 2.0 | 8.2 | 7.5 | 2.2 | 16.1 | 992 |
| Delivery characteristics |  |  |  |  |  |  |  |  |
| Normal | 16.4 | 3.1 | 2.2 | 9.1 | 5.5 | 0.3 | 0.5 | 754 |
| Caesarean | 87.4 | 2.1 | 2.4 | 7.1 | 12.6 | 8.0 | 62.9 | 259 |
| Assisted | (29.0) | (6.5) | (0.0) | (6.5) | (6.5) | (0.0) | (12.9) | 28 |
| Place of delivery |  |  |  |  |  |  |  |  |
| Government sector | 31.0 | 2.7 | 2.5 | 8.8 | 7.2 | 1.2 | 14.5 | 731 |
| Private sector | 44.8 | 4.4 | 0.5 | 8.9 | 6.4 | 4.8 | 23.8 | 281 |
| Home | (38.3) | (17.4) | (14.0) | (0.0) | (9.1) | (1.7) | (0.0) | 24 |
| Other | (57.1) | (0.0) | (0.0) | (23.7) | (33.5) | (0.0) | (0.0) | 6 |
| Total | 35.0 | 3.5 | 2.2 | 8.7 | 7.2 | 2.2 | 16.7 | 1,041 |
| Note: Table include 24 and 6 women with delivery at home and other place respectively who were not shown separately. () Based on less than 50 unweighted cases. |  |  |  |  |  |  |  |  |

Women with lower parity of 1-2 reported more delivery related problem (44 percent and 34 percent respectively) than women with higher parity of 3 or more ( 15 percent). Among women who had caesarean delivery, 87 percent reported experience of such problems, and 16 percent women with normal deliveries also cited complications during delivery. A relatively higher proportion of women who delivered in private health institutions (45 percent) faced at least one delivery complication compared to those who delivered at Government health institutions (31 percent). Delivery complications were reported more by women above 30 years ( 40 percent) than women below 30 years ( 34 percent).

The major problems reported were 'prolonged labour’ (9 percent), 'obstructed labour’ (7 percent), 'premature labour’ (4 percent), 'breech presentation’ and 'excessive bleeding’ ( 2 percent each), and 17 percent reported 'other' problems related to delivery. Prolonged labour, premature labour and breech presentation are more common among younger women of age 30 or less and women with low parity of first. Prolonged and obstructed labour are more reported by rural women than urban women and premature labour is more reported by urban women. Obstructed labour was more among women whose last delivery was caesareans
and prolonged labour was more likely among those who had normal delivery. Women whose recent delivery performed in private health facility were more likely to report about premature labour and breech presentation compared to women who preformed their last delivery at government sector hospital. Women who delivered at Government sector hospitals were more likely to report about excessive bleeding and obstructed labour compared to women who delivered at private hospitals.

Figure 4.6
Percentage of women with Delivery Complication and by Symptoms


Pondicherry, DLHS-RCH, 2002-04

### 4.11 Post Delivery Complications and Treatment

Table 4.13 and Figure 4.7 present information about women who faced complications after delivery according to some selected background characteristics. The incidence of post delivery complications judged by any of the following during the first six-weeks of delivery- ‘high fever’, 'lower abdominal pain’, 'foul smelling vaginal discharge’, 'excessive bleeding’, 'convulsion', ‘severe headache’, and 'other’ problems. Thirteen percent of women reported that they faced problems during the first six weeks after their delivery.

| Table 4.13 POST DELIVERY COMPLICATIONS |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of women who had given last live/still births during three years preceding the survey by post delivery complication according to selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |  |
|  | Any post delivery complication | Type of post delivery complication |  |  |  |  |  |  |  |
| Background characteristics |  | High fever | Lower abdominal pain | Foul smelling vaginal discharge | Excessive bleeding | Convul -sion | Severe headache | Others | Number of women |
| Age |  |  |  |  |  |  |  |  |  |
| Below 30 years | 14.8 | 3.5 | 7.0 | 0.4 | 4.6 | 0.5 | 3.8 | 1.2 | 788 |
| 30 and above | 9.0 | 0.7 | 6.6 | 0.0 | 4.6 | 0.3 | 1.7 | 0.1 | 253 |
| Children ever born |  |  |  |  |  |  |  |  |  |
| 1 | 15.7 | 3.8 | 6.9 | 0.6 | 4.0 | 0.8 | 4.6 | 1.9 | 405 |
| 2 | 12.2 | 2.6 | 7.3 | 0.1 | 4.3 | 0.2 | 2.0 | 0.3 | 480 |
| $3+$ | 11.2 | 1.2 | 5.6 | 0.3 | 6.7 | 0.2 | 3.7 | 0.4 | 156 |
| Residence |  |  |  |  |  |  |  |  |  |
| Rural | 17.8 | 3.0 | 11.0 | 1.0 | 5.5 | 0.8 | 5.6 | 2.4 | 221 |
| Urban | 12.2 | 2.8 | 5.8 | 0.1 | 4.3 | 0.4 | 2.6 | 0.5 | 820 |
| Delivery characteristics |  |  |  |  |  |  |  |  |  |
| Normal | 10.1 | 2.6 | 4.5 | 0.2 | 3.4 | 0.2 | 3.1 | 0.2 | 754 |
| Caesarean | 23.1 | 3.7 | 13.3 | 0.6 | 8.4 | 1.2 | 4.2 | 3.3 | 259 |
| Assisted | (12.9) | (3.2) | (9.7) | (3.2) | (0.0) | (0.0) | (0.0) | (0.0) | 28 |
| Place of delivery |  |  |  |  |  |  |  |  |  |
| Government sector | 13.6 | 2.0 | 7.0 | 0.3 | 4.9 | 0.3 | 3.1 | 1.2 | 731 |
| Private sector | 12.5 | 3.9 | 5.6 | 0.1 | 2.7 | 0.8 | 3.6 | 0.3 | 281 |
| Home | (19.0) | (18.6) | (17.3) | (1.7) | (19.0) | (1.7) | (4.7) | (0.0) | 24 |
| Other | (11.8) | (0.0) | (11.8) | (0.0) | (0.0) | (0.0) | (0.0) | (0.0) | , |
| Total | 13.4 | 2.9 | 6.9 | 0.3 | 4.6 | 0.4 | 3.3 | 0.9 | 1,041 |
| Note: Table include 24 and 6 women with delivery at home and other place respectively who were not shown separately. () Based on less than 50 unweighted cases. |  |  |  |  |  |  |  |  |  |

The proportion of women who cited at least one post delivery complication is higher in rural areas ( 18 percent) than in urban areas ( 12 percent). Younger women of 30 years and below, women in first parity and women had caesarean delivery are more prone to report at least one post delivery related problem.

Post delivery complications reported were lower abdominal pain (7 percent), excessive bleeding ( 5 percent), and high fever or severe headache (3 percent each). Only one percent of women reported about other problems. Lower abdominal pain, sever head ache and excessive bleeding are more reported by rural women than urban women. Other complications are similar in rural as well as in urban. Excessive bleeding was increasing steadily with increased parity. Other symptoms are more reported by women in first parity. There are minimal differences in the likelihood of having different symptoms in the postpartum problems by place of delivery.


Women who reported at least one complication during the postpartum period were asked, whether they had consulted or sought treatment for their problems and also the source of treatment. Table 4.14 shows the percentage of women who had post delivery complications and who sought treatment by source of treatment according to residence. Sixty-one percent of women reported that they had obtained advice or had consulted someone for their problems.

| Table 4.14 TREATMENT FOR POST DELIVERY COMPLICATIONS |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of women who had last live/still births during three years preceding the survey and who had any post delivery complication, sought treatment for the problems, and source of treatment according to residence, Pondicherry, 2002-04 |  |  |  |
|  |  | Residence |  |
| Treatment and source | Total | Rural | Urban |
| Percentage of women sought treatment who had any post delivery complication | 60.9 | (60.9) | 54.5 |
| Number of women | 139 | 39 | 100 |
| Percentage sought treatment at health facility |  |  |  |
| Government health facility ${ }^{1}$ | 56.9 | (82.1) | 39.9 |
| Primary health centre | 9.4 | (14.3) | 1.2 |
| Sub-centre | 1.5 | (7.1) | 1.2 |
| Private health facility ${ }^{2}$ | 39.5 | (17.9) | 54.3 |
| ISM $^{3}$ facility | 2.9 | (3.6) | 3.7 |
| Other | 5.6 | (10.7) | 7.1 |
| Percent distribution of women who obtained treatment from |  |  |  |
| Doctor | 81.7 | (67.9) | 83.7 |
| ANM/nurse/midwife/LHV | 14.9 | (32.1) | 11.0 |
| Other | 3.4 | (0.0) | 5.3 |
| Total percent | 100.0 | (100.0) | 100.0 |
| Number of women | 85 | 30 | 54 |

Note: ${ }^{1}$ Include municipal hospital, dispensary, urban health centre / urban health post / urban family welfare centre, community health centre / rural hospital, primary health centre and sub-centre. ${ }^{2}$ Include private hospital / clinic and non-governmental organization / trust hospital. ${ }^{3}$ Either government or private, Indian system of medicine. () Based on less than 50 unweighted cases.

Among women who sought treatment for complications in the postpartum period, 57 percent visited a government health facility including primary health centre ( 9 percent) and Sub-centre ( 2 percent). Forty percent of women visited private health facility, and three percent went to a facility with the Indian System of Medicine (either government or private) and another six percent obtained advice from other health facilities. Among women who sought treatment, 82 percent preferred to go to a doctor and 15 percent visited an Auxiliary Nurse Midwife or Nurse or LHV, and three percent went to other health professionals or to some one else.

### 4.12 Obstetric Morbidity by District

The extent of health problems/ complications women suffer during pregnancy, delivery and post delivery period indicates the state of obstetric morbidity. Table 4.15 presents the incidence of pregnancy, delivery and post-delivery complications and treatment seeking behaviour in case of pregnancy and post delivery complications by district. As mentioned earlier, in the state, 25 percent, 35 percent and 13 percent of the women experienced pregnancy, delivery and post delivery complications respectively. Sixty-one percent of the women sought treatment for pregnancy complications and post delivery complications.

In every district, a minimum of fifteen percent of the women experienced atleast one of the symptoms of pregnancy complications. In a few districts like, Karaikal (37 percent) and Mahe (27 percent) the incidence of pregnancy complications is comparatively higher than the state average.

The incidence of delivery complication is higher than that of pregnancy and post delivery complications. The percentage of women who experienced at least one type of delivery complication ranges from 16 percent in Yanam to 50 percent in Karaikal and incidence of post delivery complication varies from three percent in Yanam to 33 percent in Karaikal. The incidence of all three types of complications seems to be linked with each other in varying proportions.

In most of the districts of Pondicherry almost all the women received some kind of antenatal care. In spite of a large proportion of women having contact with a doctor or any other health workers during the antenatal period, in all districts 61 percent of the women sought treatment for pregnancy complication. It ranges from 52 percent in Pondicherry to 83 percent in Mahe. Similarly, among women who experienced at least one symptom of postpartum complication, the proportion seeking treatment also varies across the districts, ranging from 45 percent in Pondicherry to 93 percent in Yanam.

| Table 4.15 PREGNANCY, DELIVERY AND POST DELIVERY COMPLICATIONS <br> Extent of pregnancy, delivery and post delivery complications and treatment seeking behaviour by districts, Pondicherry, 2002-04 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | centage of wom |  |  |
| District | Who had complication during pregnancy | Sought ${ }^{2}$ treatment for pregnancy complication | Who had delivery complication | Who had post delivery complication | Sought ${ }^{3}$ treatment for post delivery complication |
| Karaikal | 36.6 | 78.5 | 50.3 | 33.2 | 84.6 |
| Mahe | 26.5 | 83.2 | 32.2 | 4.3 | 90.5 |
| Pondicherry | 20.6 | 52.3 | 33.6 | 10.0 | 45.0 |
| Yanam | 15.5 | 78.5 | 16.0 | 3.2 | 92.8 |
| Pondicherry | 25.4 | 60.8 | 35.0 | 13.4 | 60.9 |
| Note: ${ }^{1}$ Women who had last live/still birth during three years preceding the survey. ${ }^{2}$ Women who reported at least one complication of pregnancy. ${ }^{3}$ Women who reported at least one post delivery complication. |  |  |  |  |  |

## CHAPTER V

## CHILD CARE AND IMMUNIZATION

Child health services under the Reproductive and Child Health (RCH) programme include health education to mothers on breast-feeding and services for immunization, Vitamin A supplements and Iron prophylaxis, treatment of diarrhoea and Acute Respiratory Infections (ARIs). The District Level Household Survey (DLHS) covered all the currently married women whose last surviving child was born during the three years preceding the survey, and information on those breastfeeding currently and duration of breastfeeding. They were also asked about their awareness of diarrhoea management and danger signs of pneumonia and practices followed in case of episodes of diarrhoea and ARI among the children. Data on immunization, administering Vitamin A supplements and Iron prophylaxis was collected for the last two living children born after January 1, 1999/2001. This chapter presents an analysis of the data collected on the above aspects.

### 5.1 Breastfeeding

Educating mothers on correct breastfeeding practices and child nutrition is one of the components of the RCH programme. Infant feeding practices have significant effects on the health of both mothers and children. Mothers are affected through the influences of breastfeeding on the period of postpartum infertility, and hence on fertility levels and the length of birth intervals. These effects vary according to the duration and intensity of breastfeeding. Proper infant feeding, starting from the time of birth, is important for the physical and mental development of the child. Breastfeeding improves the nutritional status of young children and reduces morbidity and mortality. Breast milk not only provides important nutrients, but also protects the child against infection. The timing and type of supplementary foods introduced in an infant's diet have significant effects on the child's nutritional status.

As recommended by the World Health Organization (WHO), breastfeeding should be initiated immediately after birth and should be continued upto a minimum of six months. The WHO also suggests that the yellowish milk, known as colostrums, should be given to the baby because it provides protection against certain infections. Afterwards, it has to be supplemented with other semi-solid and solid foods at the proper time intervals.

Table 5.1 and Figure 5.1 shows the breastfeeding practices among children born during the three years preceding the survey in Pondicherry. Although, the practice of breastfeeding is common in Pondicherry, the initiation of breastfeeding within two hours of the birth of the child is not universally followed. Nearly three-fourths (74 percent) of the children were breastfed within two hours of birth, and 87 percent were breastfed within one day of birth (including those who were breastfed within two hours of birth), while 13 percent of children were breastfed after one day of birth. As shown in Figure 5.1, thirteen percent of children were breastfed within one day of birth but after two hours of birth, eleven percent were breastfed after the first day of birth but before 3 days and two percent of the children were put to the breast after three days. A higher proportion of children from Hindu and scheduled caste were breastfed within two hours ( 74 percent and 80 percent respectively). Women who reside in urban areas,
women who have had 10 and above years of school of education and women who live in households with a high standard of living are much less likely to start breastfeeding their children early. Relatively a higher proportion of children from urban areas ( 15 percent), Muslim children (14 percent), children of mothers with 10 and above years of school of education (17 percent) and children from households with a high standard of living (17 percent) were put to the breast after one day of birth.

| Table 5.1 INITIATION OF BREASTFEEDING |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of children under age 3 whose mother started breastfeeding within two hours of births, within one day of birth and after one day of birth, and percentage whose mother squeezed the first milk from her breast before breastfeeding by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |
|  | Percentage started breastfeeding |  |  | Percentage whose mother squeezed first milk from breast | Number of children |
| Background characteristic | Within two hours of birth | Within one day of birth ${ }^{1}$ | After one day of birth |  |  |
| Residence |  |  |  |  |  |
| Rural | 77.0 | 93.3 | 6.7 | 31.0 | 206 |
| Urban | 72.9 | 85.0 | 14.8 | 26.3 | 720 |
| Mother's education |  |  |  |  |  |
| Non-literate | 88.2 | 92.4 | 7.6 | 39.9 | 117 |
| 0-9@years | 76.8 | 90.0 | 9.7 | 26.6 | 361 |
| 10 and above | 67.6 | 82.9 | 17.1 | 24.7 | 448 |
| Religion |  |  |  |  |  |
| Hindu | 74.2 | 87.3 | 12.7 | 28.7 | 792 |
| Muslim | 66.8 | 84.6 | 14.2 | 23.3 | 92 |
| Other | (75.0) | (83.3) | (16.7) | (27.8) | 42 |
| Caste/tribe\# |  |  |  |  |  |
| Scheduled caste | 79.6 | 86.6 | 13.4 | 35.7 | 185 |
| Other backward class | 72.2 | 86.7 | 13.1 | 25.6 | 726 |
| Standard of living index |  |  |  |  |  |
| Low | 88.9 | 93.6 | 6.4 | 40.0 | 163 |
| Medium | 72.9 | 92.0 | 7.5 | 35.0 | 222 |
| High | 69.6 | 82.7 | 17.3 | 20.4 | 542 |
| Total | 73.8 | 86.9 | 13.0 | 27.4 | 926 |
| Note: Table based on youngest living child born during the three years preceding the survey ${ }^{1}$ Includes children who started breastfeeding within two hours of births <br> @ Literate mother with no years of schooling are included. \#Total figure may not add to N due to do not know and missing cases. Table includes 1 case of scheduled tribe and 12 cases of other caste category who were not shown separately. () Based on less than 50 unweighted cases. |  |  |  |  |  |

A little more than one-fourth of the women (27 percent) who gave birth to children during the three years preceding the survey squeezed the first milk from the breast before they began breastfeeding. The custom of squeezing the first milk from the breast before breastfeeding is widely practised in every group, but it is higher among the mothers of scheduled caste (36 percent), Hindu religion (29 percent), and children whose mothers are non-literate (40 percent). Children who live in households with a low standard of living ( 40 percent) are more likely than children in other households to have mothers who squeezed the first milk from the breast before breastfeeding. Children of rural mothers (31 percent) are more likely to squeezing out the first milk from the breast before breastfeeding than children of urban mothers (26 percent). Mothers of children born in the three years preceding the survey were
asked whether the child had been fed breast milk exclusively and if so, what the duration was. Here it needs to be mentioned that, exclusive breastfeeding includes breastfeeding the child without giving it anything including water. Results are shown in Table 5.2.


| Percentage of children under age 3 years by exclusive breastfeeding according to child's age in month, Pondicherry, 2002-04 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Status of exclusive breastfeeding |  |  |  |  |
| Age in months | Exclusive breastfeeding | At least 4 months | At least 6 months | Number of children |
| <6 | 63.9 | 41.7 | 7.9 | 149 |
| 6-11 | 3.0 | 30.3 | 10.5 | 191 |
| 12-17 | 0.0 | 50.6 | 4.0 | 126 |
| 18-23 | 0.0 | 40.3 | 3.7 | 162 |
| 24-29 | 0.3 | 44.8 | 2.8 | 126 |
| 30-35 | 0.0 | 41.8 |  | 120 |
| < 4 months | 81.4 | * | * | 98 |
| 4-6 months | 20.0 | 26.8 | * | 80 |
| 7-9 Months | 5.0 | 42.5 | 5.3 | 88 |
| Note: Table based on youngest living child born during the three years preceding the survey <br> * Percentage not shown: Based on the very few cases |  |  |  |  |

In Pondicherry, 81 percent of children under four months of age are exclusively breastfed. The percentage of infants exclusively breastfed drops steadily from 20 percent for children under 4-6 months of age to 5 percent for children who are 7-9 months old. Little more than one-fourth ( 27 percent) of children in the age group 4-6 months were exclusively breastfed up to 4 months and five percent of children in the age group 7-9 months are exclusively breastfed up to 6 months.

### 5.1.1 Breastfeeding by District

Table 5.3 shows that in all the districts of Pondicherry, more than 55 percent of the children were put to the breast within two hours of birth. At the highest of 90 percent of the children were breastfed within two hours of birth in Yanam. Little more than one-tenth ( 13 percent) of the children were put to the breast after one day of birth and it ranges from the lowest of four percent in Yanam to the highest of 14 percent in Pondicherry district. The percentage of children whose mother squeezed first milk before breastfeeding ranges from two percent in Mahe to 30 percent in Pondicherry. In two of the four districts, it is more than the state average of 27 percent.

| Percentage of children under age 3 whose mother started breastfeeding within two hours of births, within one day of birth and after one day of birth, percentage whose mother squeezed the first milk from her breast before breastfeeding and percentage of children who exclusively breastfeed by District, Pondicherry, 2002-04 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Percen | ge started bre | ffeeding | Percentage whose mother |  |
| District | Within two hours of birth | Within one day of birth ${ }^{1}$ | After one day of birth | squeezed first milk from breast | Exclusive breastfeeding ${ }^{2}$ |
| Karaikal | 79.5 | 91.6 | 7.9 | 28.0 | 2.7 |
| Mahe | 55.2 | 93.3 | 6.7 | 1.7 | 38.4 |
| Pondicherry | 73.4 | 86.3 | 13.7 | 29.9 | 3.6 |
| Yanam | 90.0 | 96.5 | 3.5 | 15.8 | 20.7 |
| Pondicherry | 73.8 | 86.9 | 13.0 | 27.4 | 5.7 |
| Note : Table based on youngest living child born during the three years preceding the survey <br> ${ }^{1}$ Includes children who started breastfeeding within two hours of births. ${ }^{2}$ Based on youngest children age |  |  |  |  |  |
|  |  |  |  |  |  |

There is a great deal of variation in the extent of exclusive breastfeeding for six months. It is highest in Mahe (38 percent) and lowest in Karaikal (3 percent) and Pondicherry (4 percent).

### 5.2 Immunization of Children

The immunization of children against six serious but preventable diseases namely, tuberculosis, diphtheria, pertusis, poliomyelitis and measles is the main component of the child survival programme. As part of the National Health Policy, the National Immunization Programme is being implemented on a priority basis. The Government of India initiated the Expanded Programme on Immunization (EPI) in 1978 with the objective of reducing morbidity, mortality and disabilities among children from six diseases.

The Universal Immunization Programme (UIP) was introduced in 1985-86 with the objective of covering at least 85 percent of all infants against the six vaccine preventable diseases by 1990. This scheme has been introduced in every district of the country. The standard immunization schedule developed for the child immunization programme specifies the age at which each vaccine should be administrated and the number of doses to be given. Routine vaccinations received by infants and children are usually recorded on a vaccination card that is issued for the child.

In the first phase of Round II, all the women with last and last but one living child born after January 1, 1999 were asked whether the child/children had received the vaccination against polio, tuberculosis (BCG), diphtheria, whooping cough (pertusis), tetanus (DPT) and measles, and for the second phase, the reference period was from January 1, 2001. For Polio and DPT, further information on polio at birth and number of doses was asked. Children who received BCG, three doses of DPT and polio (excluding polio 0 ) and measles are considered to be fully vaccinated. Information on the source of immunization for last dose and in case where immunization was not given, the reason for not giving immunization was also compiled.

Table 5.4, Figures 5.2 and 5.3 presents vaccination coverage rates for children in the age group 12-23 months. Eighty-nine percent of the children are fully vaccinated and less than one percent ( 0.1 percent) have not received any routine vaccination. Coverage of each vaccination is much higher than the percentage fully vaccinated. BCG and first dose of DPT has each been given to more than 98 percent of children (Figure 5.3). Ninety-three percent of the children have received three doses of DPT, 95 percent of the children received 3 drops of Polio, and 96 percent of the children have been vaccinated against measles. Moreover, not all children who begin the DPT and polio vaccination series, go on to complete them. The differences between the percentage of children receiving the first and third doses is four percentage point for DPT and one percentage point for polio.

There has been a four percent decline in full vaccination coverage in Pondicherry since the time of Round I in 1998-99 (93.7 percent in 1998-99). These data indicate that despite the progress that has been made in immunization coverage for children in Pondicherry, the coverage levels of full immunization has not reached 100 percent and ten percent of children who received some early vaccinations dropped out of the programme before receiving all of the recommended vaccinations.

| Table 5.4 VACCINATION OF CHILDREN |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | DPT |  |  | Polio |  |  |  |  | Number |
| Background characteristic | Polio 0 | BCG | 1 | 2 | 3 | 1 | 2 | 3 | Measles | vaccination | vaccination | children |
| Residence |  |  |  |  |  |  |  |  |  |  |  |  |
| Rural | 99.1 | 99.5 | 99.5 | 95.3 | 95.3 | 97.1 | 97.1 | 97.1 | 95.4 | 89.2 | 0.5 | 63 |
| Urban | 99.9 | 98.4 | 97.1 | 94.1 | 92.9 | 96.0 | 95.9 | 94.3 | 96.7 | 89.3 | 0.0 | 259 |
| Sex of the child |  |  |  |  |  |  |  |  |  |  |  |  |
| Male | 99.7 | 99.7 | 99.7 | 95.2 | 93.5 | 97.7 | 97.6 | 95.3 | 98.2 | 89.5 | 0.2 | 186 |
| Female | 99.8 | 97.1 | 94.6 | 93.1 | 93.1 | 94.2 | 94.2 | 94.2 | 94.0 | 88.8 | 0.0 | 136 |
| Birth order |  |  |  |  |  |  |  |  |  |  |  |  |
| 1 | 99.7 | 97.1 | 97.6 | 96.5 | 96.3 | 95.7 | 95.5 | 95.4 | 97.1 | 91.1 | 0.0 | 140 |
| 2 | 100.0 | 100.0 | 97.2 | 91.3 | 89.3 | 96.7 | 96.7 | 94.0 | 96.9 | 87.7 | 0.0 | 150 |
| 3+ | (98.1) | (98.1) | (98.1) | (98.1) | (98.1) | (92.5) | (92.5) | (92.5) | (92.5) | (86.8) | (1.9) | 32 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| Non-literate | 98.4 | 99.2 | 99.2 | 98.4 | 98.4 | 98.7 | 98.7 | 98.7 | 98.9 | 97.6 | 0.8 | 37 |
| 0-9@ years | 100.0 | 100.0 | 97.7 | 94.6 | 92.3 | 95.4 | 95.4 | 93.1 | 95.1 | 87.4 | 0.0 | 129 |
| 10 years and above | 99.9 | 97.4 | 97.1 | 93.1 | 93.0 | 96.3 | 96.2 | 95.3 | 97.0 | 88.8 | 0.0 | 156 |
| Religion |  |  |  |  |  |  |  |  |  |  |  |  |
| Hindu | 99.8 | 98.4 | 97.1 | 93.2 | 92.1 | 96.5 | 96.5 | 95.4 | 96.1 | 89.0 | 0.1 | 262 |
| Other | 99.7 | 99.5 | 99.7 | 99.2 | 98.8 | 95.1 | 94.8 | 92.4 | 97.9 | 90.5 | 0.0 | 60 |
| Caste/tribe \# |  |  |  |  |  |  |  |  |  |  |  |  |
| Scheduled caste | 100.0 | 100.0 | 92.2 | 91.1 | 91.1 | 91.1 | 91.1 | 91.1 | 90.7 | 88.6 | 0.0 | 53 |
| Other backward class | 99.7 | 98.4 | 98.6 | 94.9 | 93.7 | 97.2 | 97.1 | 95.5 | 97.7 | 89.4 | 0.1 | 264 |
| Standard of living index |  |  |  |  |  |  |  |  |  |  |  |  |
| Low | 99.0 | 99.5 | 94.5 | 93.0 | 88.0 | 93.6 | 93.6 | 88.6 | 90.3 | 82.9 | 0.5 | 58 |
| Medium | 99.7 | 94.2 | 99.3 | 99.3 | 99.3 | 99.3 | 99.0 | 99.0 | 99.3 | 92.9 | 0.0 | 70 |
| High | 100.0 | 99.9 | 97.9 | 92.9 | 92.8 | 95.9 | 95.9 | 95.2 | 97.2 | 89.8 | 0.0 | 194 |
| Total | 99.8 | 98.6 | 97.6 | 94.3 | 93.3 | 96.2 | 96.2 | 94.8 | 96.4 | 89.3 | 0.1 | 322 |
| Note: Table includes only last and last but one living child born since 1.1.1999/1.1.2001. |  |  |  |  |  |  |  |  |  |  |  |  |
| @ Literate mothers with no years of schooling are included. \# Total figure may not add to N due to do not know and missing cases. Total includes 4 cases of other category on caste who were not shown separately. ${ }^{1}$ BCG, three injection of DPT, three doses of Polio (excluding Polio 0) and measles. ( ) Based on less than 50 unweighted cases. |  |  |  |  |  |  |  |  |  |  |  |  |

The data indicates that the coverage of each type of vaccine is higher in rural than in urban areas except measles. Differentials in rural-urban against polio may be observed from the table. Hundred percent of the children have received BCG vaccine at the time of birth in rural areas whereas 98 percent received the same in the urban areas.


Ninety percent of male and 89 percent of female children are fully vaccinated. But the individual vaccination status varies between male and female children. There was a three percentage decline of BCG from male to female (100 percent and 97 percent respectively) and five percentage difference in DPT-I and two percentage difference in DPT-II, and four and three percentage difference in Polio-I \& II respectively and four percentage difference in measles vaccine. The relationship between vaccination coverage and birth order is not consistent for all vaccinations. BCG increases from 97 percent in first parity to 100 percent in second parity. Coverage of three DPT shows a seven percent decline from first parity to second parity. Full vaccination decreases three percentage point from first parity to second parity. Mother's education has differentiated much in children's vaccination coverage. Ninety-eight percent of children of non-literate mothers are fully vaccinated compared to 87 percent of children with mothers' education below high school and 89 percent of mothers who have at least completed high school. Eighty-three percent of children from households with a low standard of living are fully vaccinated compared to 90 percent of children from households with a high standard of living and 93 percent of children in medium standard of living.


Table 5.5 shows the percentage of children in the age group 12-23 months and 24-35 months with a vaccination card, and the percentage who received various vaccinations during the first year of life by current age of children and place of residence. The interviewer was shown this vaccination card.

The proportion of children fully vaccinated by age 12 months increased slightly from 89 percent in the age group 12-23 months to 90 percent for children in the age group 24-35 months. A rural-urban differential for the coverage of full vaccination is not observed in the age group of 12-23 months, but 84 percent of children in the age group $24-35$ months are fully vaccinated in rural areas against 92 percent of children in the age group 24-35 months in urban areas (Figure 5.4). The percentage of children received full vaccination in rural areas shows a six percentage decline from 12-23 months to 24-35 months, but in urban areas this percentage shows an increase of two percentage point. Eighty-nine percent of children in the age group 12-23 months have received all vaccinations in urban areas and 92 percent of children in the age group 24-35 months.

| Percentage of children age 12-23 months and 24-35 months with a vaccination card that shown to the interviewer and percentage who received specific vaccinations by 12 months of age according to residence, Pondicherry, 2002-04 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Total |  | Rural |  | Urban |  |
| Vaccination status | $\begin{gathered} 12-23 \\ \text { months } \end{gathered}$ | $24-35$ months | $12-23$ months | $\begin{gathered} \hline 24-35 \\ \text { months } \end{gathered}$ | $\begin{gathered} 12-23 \\ \text { months } \end{gathered}$ | $24-35$ months |
| Vaccination card shown to interviewer | 69.6 | 48.7 | 75.0 | 47.9 | 68.2 | 49.0 |
| Percentage vaccinated by 12 months of age |  |  |  |  |  |  |
| Polio 0 | 99.8 | 99.0 | 99.1 | 96.3 | 99.9 | 99.9 |
| BCG | 98.6 | 99.9 | 99.5 | 100.0 | 98.4 | 99.8 |
| Polio doses |  |  |  |  |  |  |
| No Polio | 2.5 | 1.9 | 1.4 | 2.3 | 2.8 | 1.8 |
| 1 | 0.1 | 1.9 | 0.0 | 2.3 | 0.1 | 1.8 |
| 2 | 1.4 | 0.8 | 0.0 | 2.7 | 1.7 | 0.1 |
| 3 | 96.1 | 95.4 | 98.6 | 92.8 | 95.4 | 96.3 |
| DPT injection |  |  |  |  |  |  |
| No DPT | 2.4 | 1.9 | 0.5 | 2.3 | 2.8 | 1.8 |
| 1 | 3.3 | 3.6 | 4.2 | 7.6 | 3.0 | 2.2 |
| 2 | 1.0 | 0.2 | 0.0 | 0.6 | 1.2 | 0.1 |
| 3 | 93.3 | 94.3 | 95.3 | 89.5 | 92.9 | 95.9 |
| Don't remember | 0.1 | 0.0 | 0.0 | 0.0 | 0.1 | 0.0 |
| Measles | 96.4 | 95.2 | 95.4 | 97.3 | 96.7 | 94.5 |
| Full ${ }^{1}$ vaccination | 89.3 | 89.6 | 89.2 | 83.7 | 89.3 | 91.6 |
| No vaccination at all | 0.1 | 0.1 | 0.5 | 0.0 | 0.0 | 0.1 |
| Number of children | 322 | 356 | 63 | 92 | 259 | 264 |
| Note:Table includes only last and last but one living child born since 1.1.1999/1.1.2001 ${ }^{1}$ BCG, three injection of DPT, three doses of Polio (excluding Polio 0 ) and measles |  |  |  |  |  |  |



### 5.3 Source of Immunization

Table 5.6 gives the percent distribution of children under three years of age who have received any vaccination by the source of last vaccine, according to place of residence and availability of health facilities in the village. The community/primary health centre (46 percent) is the primary provider of childhood vaccinations in Pondicherry. Four-fifths ( 80 percent) of the children were immunized at the government health facilities and 16 percent at private health facilities. Further, among the children immunized at government health facility 46 percent from community health centre or from primary health centre, 29 percent from Government/Municipal hospital, and five percent of them had received vaccination from the Sub-centre. The percentage of children receiving vaccination from the private sector is considerably lower in rural areas ( 7 percent) than in urban areas (19 percent). Even in urban areas, 77 percent of children received their vaccination from the government health facility. Three percent of children received vaccination from other sources. Ninety-five percent of children from villages where health facilities are available and ninety-one percent of children from villages where health facilities are not available received vaccination from the government health facility.

| Table 5.6 SOURCE OF CHILDHOOD VACCINATION |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Percent distribution of children under age 3 who have received any vaccination by source of last vaccination according to place of residence and availability of health facilities in the village, Pondicherry, 2002-04 |  |  |  |  |  |
|  |  | Residence |  | Availability of health facility ${ }^{1}$ in the village |  |
| Source of vaccination | Total | Rural | Urban | No | Yes |
| Government health sector |  |  |  |  |  |
| Government/municipal hospital | 29.2 | 9.9 | 34.4 | 14.3 | 6.6 |
| Community/primary health centre | 45.6 | 74.2 | 38.0 | 75.6 | 73.1 |
| Sub-centre | 5.1 | 9.0 | 4.1 | 1.3 | 14.9 |
| RCH/MCP camp | 0.0 | 0.1 | 0.0 | 0.0 | 0.2 |
| Private health sector |  |  |  |  |  |
| Private hospital | 14.4 | 5.8 | 16.7 | 8.0 | 4.1 |
| Private doctor | 1.6 | 0.7 | 1.8 | 0.8 | 0.6 |
| $\mathrm{ISM}^{2}$ health facility | 0.7 | 0.3 | 0.8 | 0.0 | 0.5 |
| Other | 3.3 | 0.0 | 4.1 | 0.0 | 0.0 |
| Total percent | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Number of children | 1,014 | 215 | 798 | 122 | 93 |
| Note:Table includes last and last but ${ }^{1}$ Includes sub-centre, primary healt hospital, and government dispensary ${ }^{2}$ Either government or private health | ving ch tre, C ine v y of Ind | born in nity he ystem | ree yea ntre or dicine | ding the hospita | y ernmen |

### 5.4 Vitamin A and IFA Supplements

Vitamin A deficiency is one of the most common nutritional deficiency disorders in the world, affecting more than 250 million children worldwide (Bolem et. al., 1997). The child survival programme also includes administration of five doses of Vitamin A for prevention of night blindness and distribution of IFA for iron supplement. In Round II, mothers of children born during the three years before the survey were asked whether their children had received a dose of

Vitamin A and IFA tablets/syrup. Those who said that their children had received a dose of Vitamin A and IFA tablets/syrup were further asked how many doses were given. Table 5.7 shows the percentage of children in the age group 12-35 months who received at least one dose of Vitamin A and IFA tablets/syrup by selected background characteristics. In the state of Pondicherry as a whole, 42 percent of the children received at least one dose of Vitamin A, and only 11 percent received IFA tablets/syrup. This indicates that fifty-eight percent of children in Pondicherry did not receive Vitamin A supplements and very few children received IFA tablets/syrup supplementation.
$\left.\begin{array}{|llll|}\hline \text { Table 5.7 VITAMIN A AND IFA SUPPLEMENTATION FOR CHILDREN } \\ \hline \text { Percentage of children age 12-35 months who have received at least one dose of Vitamin A and iron folic } \\ \text { acid tablets/syrup, according to selected background characteristics, Pondicherry, 2002-04 }\end{array}\right]$

Children in the age group 24-35 months are more likely to receive at least one dose of Vitamin A and IFA tablets/syrup than children in the age group 12-23 months. Children living in rural areas, female children, children whose mother completed high school and above, children living in households with medium and low standard of living and children of birth order 3 or above, children belonging to Hindu and other backward class and children in villages without health facility are more likely to receive a dose of Vitamin A compared to their counterparts. Male children, children of birth order 3 or more, children in rural areas, children whose mothers non-literate and less educated, children belonging to Hindu and Scheduled caste, children living in households with medium and low standard of living, and children in villages without health facility are less likely to receive iron folic acid tablets / syrup.

### 5.5. Immunization Coverage by District

The coverage of vaccination rates for all vaccines for children in the age group 12-23 months in each district is presented in Table 5.8. There are inter-district differentials in the coverage for different vaccinations and for children receiving all vaccinations. The percentage of children who are fully vaccinated ranges from 85 percent in Karaikal to 95 percent in Yanam. In Mahe, Yanam and Pondicherry, the coverage of full immunization is more than 90 percent ( 93 percent, 95 percent and 90 percent respectively). In Karaikal, the coverage rate of full immunization is below the state average of 89 percent. In Pondicherry state, 96 percent of children have received the measles vaccine. The coverage of polio drops at the time of birth varies from the lowest in Karaikal (98 percent) to the highest in Yanam and Pondicherry (100 percent each) followed by Mahe (99 percent).

| Table 5.8 CHILDHOOD VACCINATION BY DISTRICT |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of children who received specific vaccinations and Vitamin A supplementation by district, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
|  | Percentage vaccinated ${ }^{1}$ |  |  |  |  |  |  | Percentage received at least one dose of Vitamin $\mathrm{A}^{3}$ |
| District | Polio 0 | BCG | DPT3 | Polio3 | Measles | Full ${ }^{1}$ | None |  |
| Yanam | 100.0 | 100.0 | 98.8 | 97.3 | 97.8 | 95.0 | 0.0 | 27.8 |
| Pondicherry | 100.0 | 98.7 | 93.3 | 95.7 | 96.2 | 89.8 | 0.0 | 32.7 |
| Mahe | 98.7 | 97.9 | 95.6 | 97.0 | 94.6 | 93.1 | 0.0 | 90.5 |
| Karaikal | 98.4 | 99.2 | 93.9 | 92.1 | 96.9 | 85.3 | 0.8 | 69.2 |
| Pondicherry | 99.8 | 98.6 | 93.3 | 94.8 | 96.4 | 89.3 | 0.1 | 41.9 |

Note: Table includes only last and last but one living child born since 1.1.1999/1.1.2001
${ }^{1}$ Children age 12-23 months, ${ }^{2}$ BCG, three injection of DPT, three doses of Polio (excluding Polio 0 ) and measles.
${ }^{3}$ Children age 12-35 months.

### 5.6 Child Morbidity and Treatment

This section discusses the awareness, prevalence and treatment of diarrhoea and acute respiratory infection (ARI). Mothers of surviving children born during the three years preceding the survey were asked if their children suffered from cough and cold or diarrhoea during the two weeks preceding the survey, and if so, the type of treatment that had been given. Accuracy of all these measures is affected by the reliability of the mother's recall of when the diseases occurred.

### 5.6.1 Awareness of Diarrhoea

Diarrhoea is a major killer disease of children under five years of age. Deaths from acute diarrhoea are mostly due to dehydration resulting from loss of water and electrolytes. An attempt was made to collect data on awareness of diarrhoea management and the practice followed during the episode of diarrhoea. This has been presented in Table 5.9.

In Pondicherry, sixty-six percent of the mothers with births three years preceding the survey were aware of what to do when a child had diarrhoea, there is no change from Round I, and 26 percent were aware of ORS, which was twenty-nine percent in Round I showing a decline of three percentage points. Thirty-four percent of the women were aware of salt and sugar solution. Some of the women also reported that they would continue normal food (3 percent), continue breastfeeding ( 4 percent), and give plenty of fluids ( 6 percent), and 34 percent of women did not know what to give a child who had diarrhoea. As expected, knowledge of ORS is 27 percent among urban women and 25 percent among rural women. Women belongs to high school and above educated ( 29 percent) have higher knowledge compared to non-literate women (14 percent). Women belonging to Schedule caste ( 28 percent) are more likely to know about ORS than women belonging to other caste groups ( 25 percent). Knowledge of diarrhoea management by giving ORS decreases as the standard of living increases. Twenty-five percent of women in high standard of living know about ORS and it increases to 27 percent for women with a medium standard of living and 29 percent with a low standard of living. Knowledge of diarrhoea management by giving ORS is 30 percent for women in 25-34 years and 26 percent for women in 35-44 years age groups and declines to 21 percent among 15-24 years age. The knowledge on diarrhoea management decrease as the availability of health facility increases, 12 percent of women from villages with health facilities had knowledge on ORS and it increases to 44 percent of women from villages with no health facility.

| Table 5.9 AWARENESS OF DIARRHOEA |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of women who are aware of diarrhoea management, type of practice followed if child gets diarrhoea and percentage of women whose child suffered ${ }^{1}$ from diarrhoea by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
|  | Knowledge of diarrhoea management | Type of practices to be followed if child gets diarrhoea* |  |  |  |  |  |  |
| Background Characteristic |  | Give ORS | Salt and sugar solution | Continue normal food | Continue breastfeeding | Give plenty of fluids | Do not know | Number of women |
| Age (in years) |  |  |  |  |  |  |  |  |
| 15-24 | 62.9 | 20.6 | 28.8 | 2.5 | 4.2 | 3.9 | 37.2 | 374 |
| 25-34 | 68.9 | 29.6 | 36.5 | 3.3 | 3.9 | 6.2 | 31.1 | 631 |
| 35-44 | 56.9 | 25.7 | 39.8 | 2.4 | 2.2 | 12.4 | 43.1 | 67 |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 49.1 | 25.1 | 19.8 | 0.9 | 1.6 | 0.4 | 50.9 | 235 |
| Urban | 70.8 | 26.5 | 38.0 | 3.5 | 4.5 | 7.3 | 29.2 | 837 |
| Mother's education |  |  |  |  |  |  |  |  |
| Non-literate | 34.7 | 13.8 | 18.5 | 1.3 | 0.8 | 0.3 | 65.2 | 133 |
| 0-9@ years | 66.4 | 26.2 | 22.3 | 1.9 | 3.1 | 2.9 | 33.7 | 425 |
| 10 and above | 73.9 | 29.4 | 47.7 | 4.2 | 5.3 | 9.6 | 26.0 | 514 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 64.3 | 24.6 | 34.3 | 2.2 | 3.2 | 4.3 | 35.6 | 913 |
| Muslim | 71.9 | 32.0 | 33.1 | 10.5 | 5.9 | 13.0 | 28.5 | 101 |
| Christian | 80.1 | 38.9 | 37.1 | 2.4 | 12.4 | 12.5 | 19.9 | 50 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 58.1 | 27.8 | 18.8 | 0.8 | 2.3 | 2.8 | 41.8 | 217 |
| Other backward class | 67.5 | 24.6 | 36.8 | 3.3 | 4.1 | 6.1 | 32.5 | 837 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 45.1 | 28.5 | 10.4 | 1.3 | 3.4 | 1.8 | 54.8 | 180 |
| Medium | 59.8 | 27.0 | 34.0 | 4.1 | 4.4 | 5.4 | 40.3 | 264 |
| High | 74.7 | 25.2 | 40.8 | 3.0 | 3.8 | 7.1 | 25.3 | 628 |
| Availability of health facility ${ }^{2}$ in the village |  |  |  |  |  |  |  |  |
| Yes |  | 11.8 43.7 | 22.9 15.6 | 1.2 0.4 | 0.2 3.5 | 0.4 0.3 | 60.3 37.9 | 137 99 |
| No | 62.1 | 43.7 | 15.6 | 0.4 | 3.5 | 0.3 | 37.9 | 99 |
| Total | 66.1 | 26.2 | 34.0 | 3.0 | 3.9 | 5.8 | 33.9 | 1,072 |
| Note: Table based on women with living children born since 01.01.1999 for phase - I /01.01.2001 for phase - II. ${ }^{1}$ Last two weeks prior to survey. @ Literate mother with no years of schooling are included. \# Total figure may not add to N due to do not know and missing cases. Total includes 9 case of other category on religion 1 case of scheduled tribe and 15 case of other category of caste were not shown separately. ${ }^{2}$ Includes sub-centre, primary health centre, Community health centre or referral hospital, government hospital, and government dispensary within the village. |  |  |  |  |  |  |  |  |

### 5.6.2 Treatment of Diarrhoea

During the two weeks before the survey, six percent of the women reported that their children suffered from diarrhoea (Table 5.10). Women, whose children had diarrhoea, were further asked about treatment with ORS, any other medical treatment and source of treatment. Nearly one-half ( 48 percent) of the women mentioned that they gave ORS therapy and 76 percent of the women said that their child had been treated at health facility.

| Table 5.10 TREATMENT OF DIARRHOEA |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of women who sought treatment whose child suffered from diarrhoea and by source of treatment, according to place of residence and availability of health facility in the village, Pondicherry, 2002-04 |  |  |  |  |  |
| Sought treatment/ source of treatment | Total | Residence |  | Availability of health facility ${ }^{2}$ in the village |  |
|  |  | Rural | Urban | Yes | No |
| Percentage of women whose child suffered ${ }^{1}$ from diarrhoea | 6.1 | 4.1 | 6.7 | 5.4 | 2.3 |
| Number of women | 1,072 | 235 | 837 | 137 | 99 |
| Percentage of women whose child suffered ${ }^{1}$ from diarrhoea treated with ORS | 47.7 | * | 49.4 | * | * |
| Percentage of women whose child suffered ${ }^{1}$ from diarrhoea sought treatment | 76.4 | * | 73.5 | * | * |
| Number of women | 66 | 10 | 56 | 7 | 2 |
| Source of treatment |  |  |  |  |  |
| Government health facility |  |  |  |  |  |
| Hospital/dispensary | 11.9 | * | (32.5) | * | * |
| CHC/ Rural hospital | 0.5 | * | (0.0) | * | * |
| Primary health centre | 12.2 | * | (10.0) | * | * |
| Sub centre | 0.4 | * | (2.5) | * | * |
| Private health facility |  |  |  |  |  |
| Private hospital clinic | 76.7 | * | (55.0) | * | * |
| $\mathrm{ISM}^{3}$ facility | 17.7 | * | (32.5) | * | * |
| Percent distribution of women who seek treatment by |  |  |  |  |  |
| Doctor | 99.6 | * | (97.5) | * | * |
| ANM/Nurse/LHV | 0.4 | * | (2.5) | * | * |
| Total percent | 100.0 | * | (100.0) | * | * |
| Number of women | 50 | 9 | 41 | 7 | 2 |

Note: Table based on women with living children born since 01.01.1999 for phase - I /01.01.2001 for phase - II.
${ }^{1}$ Last two weeks prior to survey. ${ }^{2}$ Includes sub-centre, primary health centre, Community health centre or referral hospital, government hospital, and government dispensary within the village. ${ }^{3}$ Either government or private health facility of Indian System of Medicine. ( ) Based on less than 50 unweighted cases. *Percentage not shown: Based on very few cases.

Among those mothers whose children suffered from diarrhoea during the last two weeks before the survey and those women who consulted or obtained advice, 77 percent of women visited private hospitals/clinics, 25 percent went to government hospital and 18 percent of women treated their children through the Indian System of Medicine.

### 5.6.3 Awareness of Pneumonia

Another major killer disease among infants and children is Acute Respiratory Infections (ARI) including pneumonia. Early diagnosis and treatment with antibiotics can prevent a large proportion of ARI/pneumonia deaths. An attempt was made to understand the awareness level of pneumonia, and the proportion of children who had suffered from pneumonia during the last two weeks before the survey and their health seeking behaviour. This is presented in Table 5.11. It was found that only six percent of women with births three years preceding the survey in Pondicherry were aware of danger signs of pneumonia. This figure was lower than seven percent in Round-I. A relatively high proportion of women in urban areas ( 7 percent) were aware of the danger signs of pneumonia as compared to women from rural areas (1 percent).

Knowledge of danger signs of pneumonia is higher among women in the age group of 35-44 years (11 percent), women from Christian (18 percent), other backward caste (7 percent), highly educated women (10 percent) and women living in high standard of living household (8 percent). Awareness on danger signs of pneumonia is less than one percent in women living in villages with health facilities and two percent in women those who are living in villages with no health facilities.

Women, who were aware of the danger signs of pneumonia were further asked about different types of signs of pneumonia. Most of the women mentioned about 'difficulty in breathing' ( 77 percent), 'pain in chest and productive cough' ( 50 percent), 'chest in-drawing' (35 percent), 'not able to drink or take a feed' ( 22 percent), 'condition get worse than before' (18 percent), 'Wheezing/ whistling' and 'excessive drowsy and difficulty in keeping awake' (17 percent each), and 'rapid breathing' (16 percent).

## Table 5.11 AWARENESS OF PNUEMONIA

Percentage of women who are aware of danger signs of pneumonia by signs by selected background characteristics and availability of health facility in the village, Pondicherry, 2002-04

| Background characteristic | Percentage of women aware of danger signs of pneumonia | Number of women | Danger signs |  |  |  |  |  |  |  | Number of women |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Difficulty in breathing | Chest indrawing | Not able to drink or take a feeding | Excessive drowsy and difficulty in keeping awake | Pain in chest and productive cough | Conditions get worse than before | Wheezing/ whistling | Rapid breathing |  |
| Age (in years) |  |  |  |  |  |  |  |  |  |  |  |
| 15-24 | 3.7 | 374 | * | * | * | * | * | * | * | * | 14 |
| 25-34 | 6.6 | 631 | (89.0) | (35.2) | (37.4) | (26.4) | (71.4) | (27.5) | (14.3) | (15.4) | 42 |
| 35-44 | 10.7 | 67 | * | * | * | * | * | * | * | * | 7 |
| Residence |  |  |  |  |  |  |  |  |  |  |  |
| Rural | 1.3 | 235 | * | * | * | * | * | * | * | * | 3 |
| Urban | 7.1 | 837 | 76.1 | 33.3 | 22.5 | 17.5 | 52.6 | 18.2 | 17.5 | 16.3 | 59 |
| Mother's education |  |  |  |  |  |  |  |  |  |  |  |
| Non-literate | 0.1 | 133 | * | * | * | * | * | * | * | * | 0 |
| 0-9@ years | 2.3 | 425 | * | * | * | * | * | * | * | * | 10 |
| 10 and above | 10.2 | 514 | 73.2 | 39.4 | 20.8 | 17.2 | 51.9 | 17.1 | 13.6 | 12.7 | 53 |
| Religion |  |  |  |  |  |  |  |  |  |  |  |
| Hindu | 4.9 | 913 | (90.2) | (35.3) | (38.2) | (23.5) | (51.0) | (28.4) | (13.7) | (19.6) | 44 |
| Muslim | 9.2 | 101 | * | * | * | * | * | * | * | * | 9 |
| Christian | 17.7 | 50 | * | * | * | * | * | * | * | * | 9 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |  |  |  |
| Scheduled caste | 1.7 | 217 | * | * | * | * | * | * | * | * | 4 |
| Other backward class | 6.7 | 837 | 74.9 | 35.2 | 21.9 | 17.5 | 52.6 | 18.3 | 17.8 | 15.1 | 56 |
| Standard of living index |  |  |  |  |  |  |  |  |  |  |  |
| Low | 1.1 | 180 | * | * | * | * | * | * | * | * | 2 |
| Medium | 4.4 | 264 | * | * | * | * | * | * | * | * | 12 |
| High | 7.8 | 628 | (90.9) | (36.4) | (33.0) | (19.3) | (67.0) | (22.7) | (10.2) | (14.8) | 49 |
| Availability of health facility ${ }^{2}$ in the village |  |  |  |  |  |  |  |  |  |  |  |
| Yes | 0.7 | 137 | * | * | * | * | * | * | * | * | 1 |
| No | 2.3 | 99 | * | * | * | * | 0.0 | * | * | * | 2 |
| Total | 5.8 | 1,072 | 77.3 | 34.5 | 22.0 | 17.3 | 49.9 | 18.0 | 17.3 | 15.5 | 63 |

Note: Total includes 1 case with missing information on mother's education and 4 cases on other caste/tribe were not shown separately. Table based on women with living children born since 01.01.1999 for phase - I/01.01.2001 for phase - II. ${ }^{1}$ Last two weeks prior to survey. @ Literate mother with no years of schooling are included. \# Total figure may not add to N due to do not know and missing cases. ${ }^{2}$ Includes sub-centre, primary health centre, Community health centre or referral hospital, government hospital, and government dispensary within the village. ( ) Based on less than 50 unweighted cases. * Percentage not shown: Based on very few cases.

### 5.6.4 Treatment of Pneumonia

About six percent of women reported that their child had suffered from pneumonia during two weeks before the survey, the corresponding figures were eight percent in rural areas and five percent in urban areas (Table 5.12). The incidence of pneumonia was five percent and 12 percent respectively in villages with health facilities and villages with no health facility.

Table 5.12 also shows that the percentage of women whose children suffered from ARI symptoms in the last two weeks before the survey who sought advice/treatment and taken to a health facility or provider. Ninety percent of women received some advice or treatment whose children were ill with ARI.

Among them who got advice for children ill with ARI, 71 percent of women visited private hospital/clinic, 74 percent went to government health facility, 10 percent obtained treatment through Indian System of Medicine and less than one percent each follow home remedy and other source of treatment.

| Table 5.12 TREATMENT OF PNEUM Percentage of women who sought tre according to place of residence and | t whos bility of | suffere acility in | $m$ cough village, P | and s <br> ry, 20 | treatme |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Sought treatment/ source of treatment | Total | Residence |  | Availability of health facility ${ }^{2}$ in the village |  |
|  |  | Rural | Urban | Yes | No |
| Percentage of women whose child suffered from cough, cold and difficulty in breathing | 5.5 | 7.9 | 4.9 | 5.0 | 11.9 |
| Number of women | 1,072 | 235 | 837 | 137 | 99 |
| Percentage of women sought treatment whose child suffered from cough and cold | 90.3 | * | (86.6) | * | * |
| Number of women | 59 | 19 | 41 | 7 | 12 |
| Source of treatment |  |  |  |  |  |
| Government health facility |  |  |  |  |  |
| Hospital/dispensary | 25.3 |  | (24.5) | * | * |
| UHC UHPUWFC | 7.5 |  | (11.3) | * | * |
| CHC/ Rural hospital | 12.4 | * | (11.7) | * | * |
| Primary health centre | 18.3 | * | (11.3) | * | * |
| Sub centre | 10.6 | * | (12.2) | * | * |
| Private health facility |  |  |  |  |  |
| NGO/Trust hospital/clinic | 9.9 | * | (11.3) | * | * |
| Private hospital clinic | 60.6 | * | 72.2 | * | * |
| ISM ${ }^{3}$ facility | 9.5 | * | (13.6) | * | * |
| Home remedy | 0.7 | * | 0.0 | * | * |
| Other | 0.7 | * | 0.0 | * | * |
| Percent distribution of women who seek treatment by |  |  |  |  |  |
| Doctor | 96.1 | * | (100.0) | * | * |
| ANM/Nurse/LHV | 3.9 | * | 0.0 | * | * |
| Total percent | 100.0 | * | (100.0) | * | * |
| Number of women | 54 | 18 | 35 | 7 | 11 |
| Note:Table based on women with living children born since 01.01.1999 for phase - I /01.01.2001 for phase - II. ${ }^{1}$ Last two weeks prior to survey. ${ }^{2}$ Includes sub-centre, primary health centre, Community health centre or referral hospital, government hospital, and government dispensary within the village. <br> ${ }^{3}$ Either government or private health facility of Indian System of Medicine. * Percentage not shown : Based on very few cases. () Based on less than 50 unweighted cases. |  |  |  |  |  |

### 5.6.5. Awareness of Diarrhoea, ORS and Pneumonia and Incidence of Diarrhoea and Pneumonia by District

Table 5.13 presents the knowledge of diarrhoea management, knowledge of ORS, and incidence of diarrhoea by district. Although knowledge of diarrhoea management is above 60 percent in almost all districts but knowledge about ORS is low at 26 percent. Knowledge of ORS varies from 17 percent in Pondicherry district to 90 percent in Mahe district. Knowledge of ORS is 41 percent in Karaikal and 69 percent in Yanam. The incidence of diarrhoea is six percent in the state as a whole and it varies from three percent in Mahe to eight percent in Yanam.

## Table 5.13 KNOWLEDGE OF DIARRHOEA MANAGEMENT AND PNEUMONIA BY DISTRICT

Percentage of women by awareness of diarrhoea management, ORS, danger signs of pneumonia and whose child had suffered from diarrhoea and pneumonia during last two weeks prior to survey by district, Pondicherry, 2002-04

| District | Percentage of women aware of |  | Percentage of women whose child suffered ${ }^{1}$ from diarrhoea | Percentage of women aware of danger signs of pneumonia | Percentage of women whose child suffered ${ }^{1}$ from pneumonia |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Diarrhoea Management | ORS |  |  |  |
| Yanam | 89.8 | 69.2 | 7.7 | 12.3 | 0.4 |
| Pondicherry | 59.7 | 16.6 | 5.8 | 3.6 | 4.1 |
| Mahe | 96.1 | 89.8 | 3.3 | 29.2 | 10.1 |
| Karaikal | 65.7 | 41.0 | 6.0 | 4.4 | 12.6 |
| Pondicherry | 66.1 | 26.2 | 6.1 | 5.8 | 5.5 |

Note: Table based on women with last and last but one living children born since 01.01.1999/01.01.2001. ${ }^{1}$ Last two weeks prior to survey.

Table 5.13 also shows differentials in the awareness of danger signs of pneumonia and incidence of pneumonia. In comparison to awareness about diarrhoea management, the awareness of danger signs of pneumonia is quite low (6 percent). It is lowest in Pondicherry and Karaikal (4 percent each) and highest in Mahe ( 29 percent). Incidence of ARI symptoms is six percent and it is also low in Yanam ( 0.4 percent) district and highest in Karaikal (13 percent) followed by Mahe (10 percent) and Pondicherry (4 percent).

## CHAPTER VI

## FAMILY PLANNING

The Reproductive and Child Health Programme has been implemented with a new philosophy and direction to meet the health care needs of women and children. It envisages the provision of couples to control their fertility and have sexual relations free from the fear of pregnancy. Provision of free contraceptive services to all the needy couples is one of the components of the RCH programme. In DLHS-RCH a separate section on family planning was canvassed to all the eligible women to assess the knowledge and practice of various family planning methods. The information on source of currently adopted contraceptive method, source of supply of the method and health problems related to contraceptive use were collected from current users. The current non-users were asked about the past status of contraceptive use, reason for not using contraceptives currently and future intention to adopt a family planning method.

An attempt was made to understand why male methods of family planning especially that of vasectomy was not in common use. The husbands of sampled eligible women were asked about the contraceptive method they would recommend to a couple who was not desirous of any additional children. They were also asked about the reasons for not preferring male methods and their knowledge about the no-scalpel vasectomy. This chapter presents the results of data on contraceptive practices collected from both the sampled women and their husbands.

### 6.1 Knowledge of Family Planning Methods

Lack of knowledge of various contraceptive choices can be a major barrier to promotion and use of contraceptives among couples. In DLHS-RCH information on knowledge of contraceptives was obtained by asking a question, "Which are the family planning methods you know?" to each sampled eligible women. The knowledge of No-Scalpel Vasectomy (NSV) was also asked to the husbands of eligible women. If the respondent did not recognise the name of the family planning method, he was given a brief description on how the particular method was to be used. The DLHS-RCH assesses the knowledge of female sterilisation, male sterilisation including NSV, IUD, Pills, condom and traditional methods along similar lines.

The extent of knowledge of contraceptive methods among currently married women for specific methods and selected background characteristics are shown in Table 6.1 and Figure 6.1. Knowledge of any method including any modern contraceptive method is almost universal in the state of Pondicherry. The knowledge of any method and any modern method is universal and do not vary by residence (Rural 100 percent; Urban 100 per cent). The knowledge of modern spacing method among currently married women is 98 percent, and it is 99 percent among the women with urban residence and 97 percent in rural residence. There are large differentials in knowledge of all modern methods with respect to the aforesaid background characteristics. For instance, 62 percent of women from rural areas are aware about all modern methods compared to 79 percent of their urban counterparts. Availability of health facility within the village increases the awareness of all methods, it was 57 percent among women living in villages with no health facility and 66 percent among women living in villages with health facility.

| Table 6.1 KNOWLEDGE OF CONTRACEPTIVE METHODS |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of currently married women age 15-44 years who know any contraceptive method by specific method and selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |
|  |  | Residence |  | Availability of health facility in the village ${ }^{3}$ |  |
| Contraceptive methods | Total | Rural | Urban | No | Yes |
| Any method | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Any modern method | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Any modern spacing method ${ }^{1}$ | 98.3 | 97.4 | 98.5 | 97.5 | 97.4 |
| All modern methods ${ }^{2}$ | 75.2 | 61.9 | 78.6 | 57.1 | 65.5 |
| Female sterilization | 100.0 | 99.9 | 100.0 | 100.0 | 99.9 |
| Tubectomy | 96.6 | 99.4 | 95.8 | 99.1 | 99.6 |
| Laparoscopy | 84.7 | 87.3 | 84.0 | 89.9 | 85.4 |
| Male sterilization | 92.2 | 93.2 | 91.9 | 95.5 | 91.5 |
| Vasectomy | 81.9 | 80.4 | 82.3 | 72.7 | 86.1 |
| No-scalpel vasectomy | 32.7 | 24.1 | 34.9 | 26.1 | 22.6 |
| IUD/Loop | 94.8 | 93.7 | 95.1 | 92.7 | 94.4 |
| Pills | 90.1 | 79.9 | 92.7 | 77.6 | 81.6 |
| Daily | 74.0 | 57.3 | 78.3 | 48.1 | 64.0 |
| Weekly | 38.9 | 30.3 | 41.0 | 26.2 | 33.3 |
| Condom/Nirodh | 86.5 | 74.7 | 89.5 | 73.0 | 76.0 |
| Sponge (today) | 7.0 | 7.1 | 6.9 | 5.3 | 8.5 |
| Injectables | 24.0 | 24.1 | 23.9 | 17.2 | 29.2 |
| Norplant | 4.0 | 5.5 | 3.6 | 4.5 | 6.3 |
| Contraceptive herbs | 8.5 | 6.7 | 9.0 | 6.0 | 7.2 |
| Any traditional method | 54.7 | 32.6 | 60.4 | 36.1 | 29.9 |
| Any other Indian system of medicinal contraceptives | 3.4 | 6.3 | 2.6 | 11.2 | 2.7 |
| Number of women | 3,647 | 738 | 2,909 | 314 | 424 |
| Note: ${ }^{1}$ Include IUD, pills and condom. ${ }^{2}$ Include Female sterilization, Male sterilization, IUD, pills and condom ${ }^{3}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village. |  |  |  |  |  |

Female sterilisation is the most widely known method of all contraceptive methods in Pondicherry followed by IUD/Loop. All the sampled currently married women (100 percent) were aware of female sterilization and 92 percent knew about male sterilization. There is no rural -urban difference in knowledge of female (100 percent each) as well as male sterilization ( 92 percent in urban and 93 percent in rural). Knowledge on IUD/Loop was also same in rural ( 94 percent) as well as in urban ( 95 percent). There are differentials in spacing methods such as Pill and condom users with respect to the background characteristics. The best-known spacing methods are IUD/Loop ( 95 percent) and Pills ( 90 percent). Eighty-seven percent of women know about Condom. There is a large differential in knowledge of spacing methods by residence; 75 percent of the rural women know condom compared to 90 percent of urban women. The modern spacing methods, Pill and IUD are known by 80 and 94 percent of rural women respectively while the corresponding figures in urban areas are 93 and 95 percent respectively. The knowledge of these spacing methods remains low as compared to knowledge of sterilization.

In Pondicherry, 55 percent of the women are aware of a traditional method and only three percent are aware of other contraceptives of the Indian System of Medicine. It is also observed that women from villages without a health facility are also having equal awareness about modern spacing methods like women living in villages with a health facility.


| Table 6.2 KN <br> Percentage Pondicherry, | EDGE OF ntly marri 04 | CONTRAC d women | $\frac{\text { PTIVE MEI }}{\text { e 15-44 yea }}$ | HODS BY DI <br> s who know | any cont | ceptive m | d by | ecific | ethod and | istrict, |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Districts | Any method | Any modern ${ }^{1}$ method | Any modern spacing ${ }^{2}$ method | All modern methods | Male steriliz -ation | Female sterilization | IUD | Pill | Condom/ Nirodh | Any traditional method |
| Karaikal | 99.9 | 99.9 | 98.1 | 53.9 | 93.9 | 99.8 | 91.2 | 76.1 | 71.3 | 47.9 |
| Mahe | 99.9 | 99.9 | 97.4 | 72.3 | 95.1 | 99.9 | 92.1 | 89.9 | 79.5 | 89.6 |
| Pondicherry | 100.0 | 100.0 | 98.9 | 78.4 | 91.6 | 100.0 | 97.1 | 91.8 | 88.8 | 51.0 |
| Yanam | 100.0 | 100.0 | 81.9 | 54.1 | 98.5 | 100.0 | 61.3 | 77.0 | 66.9 | 33.3 |
| Pondicherry | 100.0 | 100.0 | 98.3 | 75.2 | 92.2 | 100.0 | 94.8 | 90.1 | 86.5 | 54.7 |
| Note: ${ }^{1}$ Includes Female sterilization, Male sterilization, IUD, Pills and Condom. ${ }^{2}$ Includes IUD, Pills and Condom. <br> ${ }^{3}$ Includes Female sterilization \& Male sterilization \& IUD \& Pills and Condom. |  |  |  |  |  |  |  |  |  |  |

### 6.1.1 Knowledge of Family Planning Methods by District

Table 6.2 shows the knowledge of contraceptive methods by districts in Pondicherry. In all districts almost all the women (100 percent) knew about contraceptives including modern methods. A large differential is noticed in the knowledge of all modern methods by districts. The awareness ranges from 54 percent in Karaikal and Yanam to 78 percent in Pondicherry district. There is no variation in the knowledge of female sterilization, almost all the women (100 percent) had heard about female sterilization. Knowledge about IUD/Loop is relatively lowest, 61 percent in Yanam district, whereas the same is highest at 97 percent in Pondicherry district. Knowledge of Pill ranges from 76 percent in Karaikal to 92 percent
in Pondicherry. Knowledge of condom ranges from the lowest of 67 percent in Yanam to the highest of 89 percent in Pondicherry. As for any traditional method, awareness is 90 percent in Mahe district and the least in Yanam district (33 percent).

### 6.1.2 Knowledge of No-Scalpel Vasectomy (NSV)

Knowledge of No-Scalpel Vasectomy among the husbands of currently married women in the state of Pondicherry is shown in Table 6.3. Twenty-nine percent of the husbands knew about No-Scalpel Vasectomy. In rural areas, 23 percent of husbands know about NSV compared to 31 percent in urban areas. For women residing in villages with a health facility, 22 percent of their husbands are aware of No-Scalpel Vasectomy and it is 24 percent for those living in villages without health facilities. Among the husbands who know about NSV, 75 percent reported that NSV is simpler than a conventional Vasectomy method, 57 percent reported that NSV does not lead to any complication and 45 percent reported that NSV does not affect man's sexual performance. Availability of health facility in the village makes significant difference in the opinion of NSV's affect on sexual performance. Forty-seven percent of husbands in villages with health facility reported that NSV does not affect sexual performance, and it was 56 percent among husbands of villages with no health facility.

| Table 6.3 KNOWLEDGE OF NO-SCALPEL VASECTOMY (NSV) |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Husbands knowledge of NSV by residence and availability of health facility in the village, Pondicherry, 2002-04 |  |  |  |  |  |
|  |  | Residence |  | Availability of health facility in the village ${ }^{1}$ |  |
| Knowledge of NSV | Total | Rural | Urban | No | Yes |
| Percentage of husband who had knowledge about NSV | 28.6 | 22.9 | 30.5 | 24.4 | 21.7 |
| Number of husbands | 2,773 | 688 | 2,085 | 294 | 394 |
| Who know that NSV is simpler than conventional vasectomy | 75.1 | 65.1 | 77.6 | 63.9 | 66.1 |
| Who feel that NSV does not lead to any complication | 57.4 | 57.1 | 57.5 | 61.3 | 53.7 |
| Who feel that NSV does not affect man's sexual performance | 45.2 | 51.0 | 43.8 | 56.1 | 46.7 |
| Number of husbands | 793 | 157 | 636 | 72 | 86 |

Note: ${ }^{1}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village.

### 6.1.3 Knowledge of No-Scalpel Vasectomy (NSV) by District

No-Scalpel Vasectomy awareness by districts in Pondicherry are provided in Table 6.4. The districts in which at least 25 percent of husbands know about NSV are Karaikal ( 35 percent), Mahe (32 percent) and Ponidcherry ( 28 percent). The district which have a least percentage of husbands know about NSV is Yanam (3 percent). That NSV does not lead to any complications was reported by 77 percent of the husbands in Mahe, followed by 69 percent in Yanam and 57 percent in Pondicherry and lowest 55 percent in Karaikal. The husbands who reported that the NSV does not affect man's sexual performance was highest in Karaikal district (72 percent) and the lowest in Pondicherry district (38 percent).

| Table 6.4 NO-SCALPEL VASECTOMY (NSV) BY DISTRICT |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of husbands of eligible women by knowledge of NSV by district, Pondicherry, 2002-04 |  |  |  |  |  |  |

### 6.2 Current use of Family Planning Methods

Table 6.5 and Figure 6.2 provide the information on current use of family planning methods for currently married women in Pondicherry. At the time of DLHS-RCH, 63 percent of currently married women were using some method of contraception, 11 percentage points up from Round-I ( 52 percent). Current contraceptive use is higher in rural areas ( 68 percent) than in urban areas (62 percent). Use of modern method is reported by 58 percent of the women, the breakdown of which is 49 percent for permanent methods and nine percent for spacing methods. Among the users of sterilization methods (49 percent), the most prefer method was female sterilization (49 percent), which invalidates the use of male sterilization ( 0.5 percent).

| Method | Any method | Any modern ${ }^{1}$ method | Any modern spacing method ${ }^{2}$ | Any sterilization | Male sterilization | Female sterilization | $\begin{aligned} & \text { IUD/ } \\ & \text { Loop } \end{aligned}$ | Pill | Condom / Nirodh | Any traditional method $^{3}$ | Rhythm/ periodic abstinence | Withdrawal | Number of women |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Residence Rural Urban | $\begin{aligned} & 68.2 \\ & 62.0 \end{aligned}$ | $\begin{aligned} & 65.7 \\ & 55.6 \end{aligned}$ | 5.4 9.4 | $\begin{aligned} & 60.2 \\ & 46.2 \end{aligned}$ | $\begin{aligned} & 0.4 \\ & 0.6 \end{aligned}$ | $\begin{aligned} & 59.8 \\ & 45.6 \end{aligned}$ | $\begin{aligned} & 2.0 \\ & 3.0 \end{aligned}$ | $\begin{aligned} & 0.0 \\ & 0.7 \end{aligned}$ | $\begin{aligned} & 3.4 \\ & 5.7 \end{aligned}$ | $\begin{aligned} & 2.5 \\ & 6.4 \end{aligned}$ | $\begin{aligned} & 0.8 \\ & 4.1 \end{aligned}$ | $\begin{aligned} & 1.7 \\ & 2.3 \end{aligned}$ | $\begin{array}{r} 738 \\ 2,909 \end{array}$ |
| Education <br> Non-literate 0-9@ years 10 years \& above | $\begin{aligned} & 79.3 \\ & 64.2 \\ & 55.9 \end{aligned}$ | $\begin{aligned} & 78.1 \\ & 60.1 \\ & 47.1 \end{aligned}$ | 3.1 6.2 12.9 | $\begin{aligned} & 75.0 \\ & 53.9 \\ & 34.3 \end{aligned}$ | $\begin{aligned} & 0.8 \\ & 0.6 \\ & 0.4 \end{aligned}$ | $\begin{aligned} & 74.2 \\ & 53.4 \\ & 33.9 \end{aligned}$ | $\begin{aligned} & 1.9 \\ & 2.3 \\ & 3.6 \end{aligned}$ | 0.0 0.3 1.0 | $\begin{aligned} & 1.2 \\ & 3.6 \\ & 8.3 \end{aligned}$ | $\begin{aligned} & 1.2 \\ & 4.1 \\ & 8.8 \end{aligned}$ | $\begin{aligned} & 0.6 \\ & 1.2 \\ & 6.6 \end{aligned}$ | $\begin{aligned} & 0.5 \\ & 2.9 \\ & 2.2 \end{aligned}$ | $\begin{array}{r} 654 \\ 1,385 \\ 1,607 \end{array}$ |
| Religion Hindu Muslim Christian Other | $\begin{array}{r} 64.6 \\ 53.2 \\ 56.1 \\ (81.6) \end{array}$ | $\begin{array}{r} 59.4 \\ 42.7 \\ 52.0 \\ (60.5) \end{array}$ | $\begin{array}{r} 7.8 \\ 16.0 \\ 8.1 \\ (20.8) \end{array}$ | $\begin{array}{r} 51.6 \\ 26.6 \\ 44.2 \\ (39.6) \end{array}$ | $\begin{array}{r} 0.5 \\ 0.6 \\ 0.3 \\ (0.0) \end{array}$ | $\begin{array}{r} 51.0 \\ 26.1 \\ 43.9 \\ (39.6) \end{array}$ | $\begin{array}{r} 2.5 \\ 7.2 \\ 1.5 \\ (0.0) \end{array}$ | $\begin{array}{r} 0.6 \\ 0.8 \\ 0.0 \\ (0.0) \end{array}$ | $\begin{array}{r} 4.8 \\ 8.1 \\ 6.5 \\ (20.8) \end{array}$ | $\begin{array}{r} 5.2 \\ 10.6 \\ 4.1 \\ (21.1) \end{array}$ | $\begin{array}{r} 3.2 \\ 6.9 \\ 2.3 \\ (0.0) \end{array}$ | $\begin{array}{r} 1.9 \\ 3.7 \\ 1.3 \\ (21.1) \end{array}$ | $\begin{array}{r} 3,125 \\ 300 \\ 201 \\ 22 \end{array}$ |
| Caste/tribe\# <br> Scheduled caste Other backward class Other | $\begin{aligned} & 65.8 \\ & 62.6 \\ & 69.1 \end{aligned}$ | $\begin{aligned} & 63.1 \\ & 56.1 \\ & 65.5 \end{aligned}$ | $\begin{aligned} & 5.6 \\ & 9.6 \\ & 2.5 \end{aligned}$ | $\begin{aligned} & 57.5 \\ & 46.6 \\ & 63.0 \end{aligned}$ | $\begin{aligned} & 0.2 \\ & 0.4 \\ & 6.3 \end{aligned}$ | $\begin{aligned} & 57.2 \\ & 46.1 \\ & 56.6 \end{aligned}$ | $\begin{aligned} & 0.8 \\ & 3.4 \\ & 0.8 \end{aligned}$ | 0.6 0.6 0.7 | $\begin{aligned} & 4.3 \\ & 5.6 \\ & 1.0 \end{aligned}$ | $\begin{aligned} & 2.7 \\ & 6.4 \\ & 3.6 \end{aligned}$ | $\begin{aligned} & 1.0 \\ & 4.1 \\ & 2.3 \end{aligned}$ | $\begin{aligned} & 1.8 \\ & 2.3 \\ & 1.3 \end{aligned}$ | $\begin{array}{r} 738 \\ 2,807 \\ 88 \end{array}$ |
| Standard of living index <br> Low <br> Medium <br> High | $\begin{aligned} & 68.4 \\ & 67.4 \\ & 60.4 \end{aligned}$ | 67.2 64.4 52.7 | 5.4 5.2 10.7 | $\begin{aligned} & 61.8 \\ & 59.2 \\ & 42.0 \end{aligned}$ | $\begin{aligned} & 0.9 \\ & 0.3 \\ & 0.6 \end{aligned}$ | $\begin{aligned} & 60.9 \\ & 58.9 \\ & 41.5 \end{aligned}$ | $\begin{aligned} & 2.8 \\ & 1.7 \\ & 3.3 \end{aligned}$ | 0.9 0.2 0.7 | $\begin{aligned} & 1.8 \\ & 3.3 \\ & 6.8 \end{aligned}$ | $\begin{aligned} & 1.2 \\ & 3.1 \\ & 7.7 \end{aligned}$ | $\begin{aligned} & 0.9 \\ & 0.9 \\ & 5.1 \end{aligned}$ | $\begin{aligned} & 0.3 \\ & 2.0 \\ & 2.6 \end{aligned}$ | $\begin{array}{r} 464 \\ 961 \\ 2,223 \end{array}$ |
| Availability of health facility in the village ${ }^{4}$ No Yes | 64.8 70.7 | 60.2 69.7 | 4.3 6.2 | $\begin{aligned} & 55.9 \\ & 63.5 \end{aligned}$ | $\begin{aligned} & 0.1 \\ & 0.6 \end{aligned}$ | $\begin{aligned} & 55.8 \\ & 62.8 \end{aligned}$ | $\begin{aligned} & 2.2 \\ & 1.8 \end{aligned}$ | 0.0 0.1 | $\begin{aligned} & 2.1 \\ & 4.4 \end{aligned}$ | $\begin{aligned} & 4.6 \\ & 1.0 \end{aligned}$ | $\begin{aligned} & 1.5 \\ & 0.2 \end{aligned}$ | $\begin{aligned} & 3.0 \\ & 0.6 \end{aligned}$ | $\begin{aligned} & 314 \\ & 424 \end{aligned}$ |
| Total | 63.3 | 57.6 | 8.6 | 49.0 | 0.5 | 48.5 | 2.8 | 0.6 | 5.2 | 5.7 | 3.4 | 2.2 | 3,647 |

Note: ${ }^{1}$ Include Female sterilization, Male sterilization, IUD, Pills and Condom. ${ }^{2}$ Include IUD, Pills and Condom. ${ }^{3}$ Include Rhythm/Periodic abstinence, Withdrawal and Other traditional method. @ Literate women with no years of schooling are also included. \#Total figure may not add to N due to don't know and missing cases. ${ }^{4}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village. () Based on less than 50 unweighted cases.

The use of traditional methods is reported by only six percent of the women of which two percent are using withdrawal and three percent follow the rhythm or periodic abstinence. The rural-urban differential is visible in the case of traditional methods, where six percent of the urban women are using this means of contraception compared to three percent of the rural women.


Current use of contraception is high among women of other castes (69 percent) and scheduled caste ( 66 percent) than among other backward class women ( 63 percent). The current use is also high among the non-literate women ( 79 percent) than the women who have less than 10 years of schooling ( 64 percent) and the women who have 10 or more years of schooling ( 56 percent). Current contraceptive use varies negatively with respect to the standard of living of the women, increasing the prevalence rate from 60 percent to 68 percent each for women from the high to the low ( 68 percent) and medium ( 67 percent) standard of living households. The availability of the health facility in the village is an important factor in motivating eligible women to use contraceptives, 71 percent of the women living in villages with a health facility are currently under contraception and this is slightly lower than the women from villages deprived of a health facility ( 65 percent). The current use of the traditional method is also higher among women with a higher education level and women with a high standard of living than their counterparts not on par with these categories of women.

### 6.2.1 Current Use of Family Planning Methods by District

Table 6.6 presents a picture of current contraceptive use in the districts of Pondicherry. The contraceptive use is a couple concepts as family planning methods can be used either by women or by their husbands. All the districts, the current use of contraception exceeds 58 percent of eligible women. It ranges from 59 percent in Karaikal and Mahe to 71 percent in Yanam district. The state figure of current spacing methods use is nine percent
and it ranges from one percent in Yanam to 11 percent in Karaikal. The variation in contraceptive prevalence at district level is basically due to the variation in the use of spacing methods as well as both modern and traditional contraceptive uses.

## Table 6.6 CONTRACEPTIVE PREVALENCE RATES BY DISTRICT

Percentage of currently married women age 15-44 years currently using any contraceptive method by district, Pondicherry, 2002-04

| Districts | Any method | Any modern ${ }^{1}$ method | Any modern spacing $^{2}$ method | Male sterilization | Female sterilization | IUD | Pill | Condom <br> / Nirodh | Any traditional ${ }^{3}$ method |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Karaikal | 58.6 | 53.8 | 11.0 | 0.9 | 42.0 | 4.8 | 0.4 | 5.8 | 4.7 |
| Mahe | 59.4 | 44.1 | 6.4 | 0.3 | 37.3 | 1.6 | 0.8 | 4.1 | 15.3 |
| Pondicherry | 65.2 | 60.2 | 7.9 | 0.1 | 52.1 | 2.4 | 0.5 | 5.0 | 5.0 |
| Yanam | 71.3 | 71.3 | 0.9 | 7.8 | 62.6 | 0.2 | 0.3 | 0.4 | 0.0 |
| Pondicherry | 63.3 | 57.6 | 8.6 | 0.5 | 48.5 | 2.8 | 0.6 | 5.2 | 5.7 |

Note: ${ }^{1}$ Include Female sterilization, Male sterilization, IUD, Pills and Condom
${ }^{2}$ Include IUD, Pills and Condom
${ }^{3}$ Include Rhythm/Periodic abstinence, Withdrawal and Other traditional method
The pattern of use of contraceptive methods in Pondicherry is the general existing pattern in India. The use of pill is less than one percent ( 0.6 percent) in Pondicherry compare to other states. The use of IUD/Loop and Condom/Nirodh is at the highest of five percent and six percent respectively in Karaikal. Use of traditional method is more in Mahe (15 percent) followed by Karaikal and Pondicherry ( 5 percent each) and it is not reported in Yanam.

### 6.2.2 Current Use and Ever Use of Family Planning Methods as reported by Women

Table 6.7 provides information on current contraceptive use and ever use of contraception by age and number of surviving children, living sons and daughters. The current use of any method of contraception among currently married women in the 15-19 years age group is only three percent and this attains a peak of 78 percent in the age group 35-39 years. A similar age pattern of contraceptive use is also observed both in case of modern methods. The use of traditional methods is highest in the age group of $30-34$ years ( 9 percent). The use of traditional method is nine percent for the women aged $30-34$ years, it is least (2 percent) for the women in younger age group 15-19 years. The use of modern methods ranges from only one percent for women in the age group 15-19 years to 71 percent for women in the age group 35-39 years and 70 percent for women in the age group 40-44 years.

| Percentage of currently married women in 15-44 years by current use and ever use of contraception according to selected demographic characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Percentage of women/husbands using |  |  | Not using any method | Perc women/h contrac | age of sbands by ive status |  |
| Demographic Characteristic | Any modern method ${ }^{1}$ | Any traditional method $^{2}$ | Any method |  | Ever used | Never used | Number of women |
| Age-group (in years) |  |  |  |  |  |  |  |
| 15-19 | 1.0 | 2.0 | 2.9 | 97.1 | 4.0 | 96.0 | 64 |
| 20-24 | 27.0 | 4.6 | 31.6 | 68.4 | 36.6 | 63.4 | 589 |
| 25-29 | 52.3 | 2.5 | 54.8 | 45.2 | 61.9 | 38.1 | 834 |
| 30-34 | 68.4 | 9.0 | 77.4 | 22.5 | 83.4 | 16.6 | 790 |
| 35-39 | 71.1 | 6.6 | 77.8 | 22.2 | 83.6 | 16.4 | 726 |
| 40-44 | 69.8 | 5.7 | 75.5 | 24.5 | 80.4 | 19.6 | 643 |
| Surviving children |  |  |  |  |  |  |  |
| 0 | 2.6 | 0.4 | 3.0 | 97.0 | 3.9 | 96.1 | 428 |
| 1 | 25.9 | 8.8 | 34.7 | 65.3 | 48.0 | 52.0 | 816 |
| 2 | 72.9 | 7.0 | 79.9 | 20.0 | 84.6 | 15.4 | 1,535 |
| 3 or more | 87.6 | 2.8 | 90.4 | 9.6 | 93.4 | 6.6 | 869 |
| Surviving sons |  |  |  |  |  |  |  |
| 0 | 33.1 | 5.5 | 38.6 | 61.3 | 46.2 | 53.8 | 1,278 |
| 1 | 65.4 | 6.6 | 72.1 | 27.9 | 76.9 | 23.1 | 1,503 |
| 2 or more | 80.3 | 4.1 | 84.5 | 15.5 | 89.0 | 11.0 | 867 |
| Surviving daughters |  |  |  |  |  |  |  |
| 0 | 36.4 | 5.2 | 41.6 | 58.4 | 47.2 | 52.8 | 1,344 |
| 1 | 65.5 | 6.4 | 71.8 | 28.2 | 78.6 | 21.4 | 1,495 |
| 2 or more | 78.5 | 5.1 | 83.6 | 16.3 | 87.7 | 12.2 | 807 |
| All women | 57.6 | 5.7 | 63.3 | 36.7 | 69.0 | 31.0 | 3,647 |
| Note: ${ }^{1}$ Include Female sterilization, Male sterilization, IUD, Pills and Condom. ${ }^{2}$ Include Rhythm/Periodic abstinence, Withdrawal and Other traditional method. |  |  |  |  |  |  |  |

It is crucial to understand the association between the number of living children and contraceptive use. The method of contraceptive use varies according to the number of surviving children in Pondicherry. The use of modern methods of contraception is high among women who have three or more surviving children and on the other hand the use of traditional methods was high among women who have only one living child. The use of any method of contraception is 85 percent among women who have two or more sons and 84 percent among women who have two or more daughters. The same trend can be observed in the case of use of any modern method which is 80 percent for the women who have two or more surviving sons and 79 percent among women who have two or more daughters.

### 6.2.3 Current Use and Ever Use of Family Planning Methods as Reported by Husbands

Information pertaining to current use of family planning methods among the husbands of currently married women in Pondicherry by age and number of surviving children, sons and daughters are given in Table 6.8.

| Table 6.8 USE OF CONTRACEPTION AS REPORTED BY MEN |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of husbands of currently married women by current use and ever use of contraception by selected demographic variables, Pondicherry, 2002-04. |  |  |  |  |  |
|  | Percentage of husbands/women using |  |  |  |  |
| Demographic Characteristics | Any modern method ${ }^{1}$ | Any traditional method ${ }^{2}$ | Any method | Not using any method | Number of men |
| Age-group (in years) |  |  |  |  |  |
| <25 | 11.0 | 5.5 | 16.5 | 83.5 | 56 |
| 25-34 | 42.3 | 4.0 | 46.3 | 53.6 | 874 |
| 35-44 | 68.5 | 6.1 | 74.6 | 25.4 | 1,221 |
| 45+ | 74.6 | 5.4 | 80.0 | 20.0 | 621 |
| Surviving children |  |  |  |  |  |
| 0 | 4.0 | 0.5 | 4.5 | 95.5 | 302 |
| 1 | 27.7 | 8.5 | 36.2 | 63.8 | 557 |
| 2 | 74.0 | 6.5 | 80.5 | 19.5 | 1,215 |
| 3 or more | 87.5 | 2.7 | 90.2 | 9.8 | 698 |
| Surviving sons |  |  |  |  |  |
| 0 | 35.1 | 5.6 | 40.6 | 59.4 | 939 |
| 1 | 68.0 | 6.1 | 74.1 | 25.9 | 1,134 |
| 2 or more | 82.2 | 3.7 | 85.9 | 14.1 | 700 |
| Surviving daughters |  |  |  |  |  |
| 0 | 40.0 | 4.7 | 44.7 | 55.3 | 992 |
| 1 | 68.6 | 6.1 | 74.7 | 25.3 | 1,129 |
| 2 or more | 77.5 | 4.8 | 82.2 | 17.8 | 652 |
| All men | 60.5 | 5.3 | 65.7 | 34.3 | 2,773 |
| Note: ${ }^{1}$ Include Female sterilization, Male sterilization, IUD, Pills and Condom. ${ }^{2}$ Include Rhythm/Periodic abstinence, Withdrawal and Other traditional method. |  |  |  |  |  |

The current use of any method of contraception among the husbands (aged below 25 years) of currently married women is 17 percent and it gradually picks up with the age of husband, to a peak of 75 percent in the age group 35-44 years and 80 percent in the age group of 45 and above years. Similar age patterns of contraceptive use are observed in the case of modern methods. Among the husbands in the age group 35-44 years and below 25 years, the use of traditional methods is six percent and it is four percent among the husbands in the younger age group of 25-34 years. The use of modern methods ranges from 11 percent for husbands below 25 years of age to 75 percent for the husbands in the age group of 45 and above years.

### 6.3 Reasons for Not Using Male Methods

The DLHS-RCH asked husbands of currently married women about the contraceptive methods that he or his wife was using currently. The husbands who were not using male methods were further asked the reasons for it. Table 6.9 provides information about reasons for not using male contraceptive methods in Pondicherry. Among all the husbands interviewed, 83 percent reported about female methods. Reporting of female methods is higher in rural areas ( 91 percent) than in urban areas ( 80 percent). The reasons cited for not preferring the male methods are the greater popularity of female methods ( 59 percent), fear of weakness ( 33 percent), fear of impotency ( 8 percent), lack of sexual pleasure ( 4 percent), fear of operation (2 percent) and other reasons (1 percent). However, significant rural-urban differential exists in the reasons for not using male methods also. The expression for fear of weakness is higher in urban areas ( 34 percent) than in rural areas ( 30 percent). On the other hand, popularity of female methods as a reason for not using male methods of contraception is more or less equal in rural ( 59 percent) and urban ( 58 percent) areas. Fear of impotency is common in both rural and urban areas (8 percent and 7 percent respectively). Lack of sexual pleasure is more reported in rural (6 percent) than in urban (4 percent).

| Percentage of husbands with their choice of family planning methods and reasons for not accepting male methods according to residence, Pondicherry, 2002-04 |  |  |  |
| :---: | :---: | :---: | :---: |
|  |  | Residence |  |
| accepting male methods | Total | Rural | Urban |
| Percentage of husbands who have reported female methods | 82.6 | 91.3 | 79.5 |
| Number of men | 1,823 | 474 | 1,350 |
| Reasons for not accepting male methods* |  |  |  |
| Fear of impotency | 7.5 | 7.8 | 7.4 |
| Lack of sexual pleasure | 4.3 | 6.3 | 3.5 |
| Fear of method failure | 0.4 | 0.5 | 0.3 |
| Fear of operation | 1.6 | 1.6 | 1.6 |
| Fear of weakness | 33.0 | 29.9 | 34.2 |
| Female methods are more popular | 58.6 | 59.0 | 58.4 |
| Other | 1.4 | 1.6 | 1.3 |
| Number of men | 1,505 | 432 | 1,073 |
| Note: * Percentages may add to more than 100.0 because multiple responses could be recorded. |  |  |  |

### 6.4 Source of Contraceptive Methods

To asses the various sources of contraceptive methods, DLHS-RCH collected information on source of obtaining methods. Table 6.10 and Figure 6.3 show the percent distribution of current users of modern contraceptives by source of contraceptives. Family planning methods and services in Pondicherry are provided primarily through a network of government hospitals. The services are also provided by private hospitals and clinics, as well as non-governmental organisations (NGOs). Modern spacing methods like IUD, Pill and Condom are available through both the government and private sectors. Government/municipal hospitals are the main source for female sterilization (88 percent) followed by Private hospital (9 percent), Community Health Centres or Primary Health Centres (2 percent each). Among the IUD users, 31 percent reported the source as Private hospital, 40 percent as Government/Municipal hospital, four percent from the Private doctor, 13 percent from Community Health Centres or Primary Health Centres and five percent from Sub-centre. It is found that chemist is the main source for Condom (32 percent) followed by other sources (24 percent), CHC/PHC (12 percent) and Government nurse/ANM (10 percent).

| Table 6.10 SOURCE OF MODERN CONTRACEPTIVE METHODS <br> Percent distribution of current users of modern contraceptive methods by method and source of supply, Pondicherry, 2002-04 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Contr | tive m |  |  |  |
| Source | Female sterilization | Male sterilization | IUD/ <br> Loop | Pills | Condom / Nirodh | All modern methods ${ }^{1}$ |
| Government medical centre | 89.5 | * | 57.7 | * | 37.9 | 82.9 |
| Government/Municipal hospital | 87.9 | * | 39.7 | * | 8.7 | 77.8 |
| CHC/PHC | 1.5 | * | 12.6 | * | 12.0 | 3.0 |
| Sub-centre | 0.0 | * | 4.6 | * | 0.7 | 0.3 |
| Government doctor | 0.0 | * | 0.3 | * | 0.0 | 0.0 |
| Government nurse/ ANM | 0.0 | * | 0.0 | * | 10.2 | 1.1 |
| Family planning/RCH camp | 0.0 | * | 0.5 | * | 0.0 | 0.0 |
| Out reach/MCP clinic in village | 0.0 | * | 0.0 | * | 1.6 | 0.2 |
| Mobile clinic | 0.0 | * | 0.0 | * | 4.6 | 0.5 |
| Private medical centre | 9.9 | * | 35.4 | * | 4.7 | 10.7 |
| Private hospital | 8.5 | * | 31.3 | * | 4.1 | 9.2 |
| Private doctor | 1.4 | * | 4.1 | * | 0.6 | 1.4 |
| Chemist | NA | NA | NA | * | 31.6 | 3.0 |
| Other | 0.6 | * | 6.8 | * | 23.5 | 3.2 |
| Do not know | 0.0 | * | 0.0 | * | 0.0 | 0.0 |
| Missing | 0.0 | * | 0.0 | * | 2.3 | 0.2 |
| Total percent | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Number of users | 1,769 | 19 | 102 | 21 | 191 | 2,102 |
| Note: ${ }^{1}$ Includes female sterilization, male sterilization, IUD, Pills or condom. CHC: Community health centre, PHC: Primary health centre. NA: Not applicable. * Percentage not shown : Based on very few cases. |  |  |  |  |  |  |

Figure 6.3
Source of Family Planning Among Current Users of Modern Contraceptive Methods


Note: Total percent may add more than 100.0 due to rounding

### 6.5 Problems with Current Use of Contraceptive Methods

Women who were using a modern contraceptive method were asked if they had experienced any problems related with the current methods they are using. Table 6.11 shows the percentage of current contraceptive users who reported specific health problems, treatment seeking behaviour and their satisfaction about the method. The analysis of the method specific problems reveals that 15 percent of the sterilized women have problem with the contraceptive methods in use. The most common problems experienced by sterilized women are bodyache or backache (62 percent), weakness or inability to work (44 percent), white discharge (12 percent), weight gain and excessive bleeding (10 percent each), irregular periods (4 percent), spotting (3 percent), cramps ( 2 percent) and dizziness, nausea/vomiting and breast tenderness (1 percent each).


### 6.6 Treatment for Health Problems with Current Use of Contraception

The study of respondents who sought treatment for contraceptive related health problems (Table 6.12) reveals that 60 percent of the sterilized women sought treatment. Regarding the satisfaction about the method, 94 percent of the sterilized women reported satisfaction with sterilization.

Among those women who had sought treatment for contraceptive related problems, a higher proportion of women undergone sterilisation had taken treatment from Government health facility ( 68 percent). Forty-seven percent had taken treatment from Government hospitals/dispensaries, 13 percent from PHC, six percent from CHC/Rural hospital. Private hospital/clinic were used by 42 percent of the women. Only six percent approached ISM health facility.

| Table 6.12 FOLLOW-UP VISIT AND SOUGHT TREATMENT FOR HEALTH PROBLEMS WITH CURRENT USE |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of women who had follow-up visit, satisfied with current method and sought treatment with side effect with the method by use of method, Pondicherry, 2002-04 |  |  |  |
|  | Type of method |  |  |
| Health problems/side effect | Female sterilization | IUD/loop | Pill |
| Women who had follow up visit by health worker after adoption of method | 25.2 | 44.6 | * |
| Women who are satisfied with method of current use | 94.4 | 96.6 | * |
| Number of current users | 1,769 | 102 | 21 |
| Women who sought treatment for the health problem | 60.0 | * | 0.0 |
| Number of women with side effects | 265 | 22 | 0 |
| Source of treatments |  |  |  |
| Government health facility |  |  |  |
| Government hospital/dispensary | 46.8 | * | 0.0 |
| UHC/UHP/UFWC | 0.5 | * | 0.0 |
| CHC/Rural hospital | 5.7 | * | 0.0 |
| PHC | 13.4 | * | 0.0 |
| Sub-centre | 0.5 | * | 0.0 |
| Out reach/MCP clinic in village | 0.7 | * | 0.0 |
| Private health facility |  |  |  |
| NGO/trust hospital clinic | 0.3 | * | 0.0 |
| Private hospital/clinic | 41.6 | * | 0.0 |
| ISM health facility ${ }^{1}$ | 6.0 | * | 0.0 |
| Chemist/Medical shop | 1.2 | * | 0.0 |
| Home remedy | 0.2 | * | 0.0 |
| Other | 0.3 | * | 0.0 |
| Number of women with side effects | 159 | 15 | 0 |

### 6.7 Advice to Non-Users to Use Contraception

Information about non-users who were advised by the ANM/health worker to adopt contraceptives and their future intention to use by preferred method according to their background characteristics are presented in Table 6.13. In DLHS-RCH currently married women who were not using any method of contraception were asked about advice given by ANM/health worker for adoption of any contraceptive method. It is evident that 25 percent of the women were advised by ANM/health worker to adopt any family planning method in Pondicherry. Among rural women, 40 percent were advised by ANM/health worker to adopt any method and it is higher than the urban women (22 percent) who were advised so.


Note: * Exclude women in menopause or those who have undergone hysterectomy.
${ }^{1}$ Includes sub-centre, primary health centre, community health centre or referral hospital, government hospital, and government dispensary within the village. ( ) Based on les than 50 unweighted cases.

The recommended contraceptive methods by ANM/health worker is dominated by female sterilization (66 percent) and IUD/Loop (29 percent). Two percent were advised to adopt Condom/Nirodh as spacing methods and one percent were advised to adopt pill. Male sterilization has been advised to one percent. This pattern of advice also emerges irrespective of residence and availability of health facility in the village. Condom usage is promoted in urban areas (3 percent) and it was not advised in rural areas.

### 6.7.1 Future Intentions

Among the non-users, 31 percent of women have expressed their intention to use any method of contraception in the future (Table 6.14). The intention to use any method of contraception is 32 percent in rural areas and 31 percent in urban areas.

Among the women who intended to use permanent methods of contraception, 82 percent preferred female sterilization whereas eight percent of the women preferred male sterilization. In case of temporary methods, the preferred method by women is IUD/Copper-T/loop (7 percent) and Condom/Nirodh (2 percent). It is interesting to note that traditional methods were not preferred by a single women.

Forty-one percent of the husbands intended to use contraception in the future, they were more in rural areas ( 60 percent) than in urban areas ( 35 percent). Methodwise choice in intention to use contraception is dominated by female sterilization, being reported by 94 percent followed by IUD/Copper-T/ Loop (4 percent), and male sterilization and Condom/Nirodh (1 percent each).

Table 6.14 FUTURE INTENTION TO USE CONTRACEPTION
Percentage of current non-users** who were intended to use contraception in future by preferred method according to place of residence, Pondicherry, 2002-04

| Future intention to use/method | Women |  |  | Husband |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Total | Rural | Urban | Total | Rural | Urban |
| Percentage of respondents who intend to use contraceptive in future | 31.4 | 31.5 | 31.4 | 40.7 | 59.6 | 35.2 |
| Number of non-users | 1,308 | 231 | 1,076 | 929 | 211 | 717 |

Percent distribution of non-user who were preferred to use family planning methods by preferred method

|  |  |  |  |  | 93.7 | 97.8 |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Female sterilization | 81.7 | 90.7 | 79.8 | 91.6 |  |  |
| Male sterilization | 7.8 | 4.1 | 8.6 | 1.4 | 0.0 | 2.1 |
| IUD/copper-T/loop | 6.6 | 4.9 | 6.9 | 4.0 | 2.0 | 5.0 |
| Oral pills | 1.2 | 0.0 | 1.5 | 0.0 | 0.0 | 0.0 |
| Condom/Nirodh | 2.3 | 0.3 | 2.8 | 0.8 | 0.2 | 1.0 |
| Withdrawal | 0.2 | 0.0 | 0.3 | 0.1 | 0.0 | 0.2 |
| Other | 0.1 | 0.0 | 0.1 | 0.0 | 0.0 | 0.0 |
|  |  |  |  | 100.0 | 100.0 | 100.0 |
| Total percent | 100.0 | 100.0 | 100.0 |  |  |  |
| Number of non-users | 410 | 73 | 338 | 378 | 126 | 252 |

Note: * Exclude women who are in menopause or those who have undergone hysterectomy.

### 6.7.2 Future Intention to Use Among Women by Number of Living Children

Currently married women who were not using any contraceptive method at the time of survey were asked about their intentions to use a method in the future. Those women who intended to use contraceptives in the future were further asked about preferred methods. This type of information aids the managers and programmers to identify the potential groups of future users and to provide the type of contraceptives that are likely to be in demand. Table 6.15 provides the information on intention to use contraception in future according to number of living children and residence in Pondicherry. Among the current non-users, around 17 percent of the women intended to use contraception within the next twelve months. Five percent of women wanted to use within one to two years whereas nine percent reported their intention to use contraceptives after two years. Forty-one percent are not sure of their intention to use, where as 27 percent reported no intention to use. The intention of using contraception more than two years is higher among the women who have one living child compared to the women who have either two or no living children. About 72 percent of the women who have no living children reported that they are yet to decide about the use of contraceptives. The above said pattern exists in both rural and urban areas.


### 6.8 Reasons for Discontinuation and Non-Use of Contraception

Currently married non-pregnant women who were not using any contraceptive method at the time of survey were categorised as past users and never users according to their contraceptive experience. In DLHS-RCH, women who had discontinued contraceptive use were asked about the main reason for discontinuation. The survey also asked women who had never used contraceptives about the main reason for not doing so. Table 6.16 shows the main reason for not using contraceptives among both the past never users and current non-users. Among the past users, 42 percent of the women mentioned that they discontinued the use because they wanted child. Inconvenience of the method (16 percent), Weakness/inability to work (6 percent), method failed/became pregnant (4 percent), irregular periods and difficult to get method ( 3 percent each), excessive bleeding and white discharge ( 2 percent), and other reasons ( 18 percent) are also mentioned. Forty-two percent
of the urban and 43 percent of the rural women discontinued contraception due to their want for a child. Four percent of the urban women and one percent of rural women have reported method failure/become pregnant as the reason for discontinuation. In urban areas, 20 percent of women reported as other reason for discontinuing the use and where as the same is four percent among rural women. In rural one percent reported about white discharge, in urban the percentage was two. For 20 percent of rural and 15 percent of urban women method was inconvenient. Fourteen percent of the rural and five percent of urban women reported weakness/inability to work as the reason for discontinuation. Four percent of the rural and two percent of the urban women reported about excessive bleeding.

| Percent distribution of women who were past users (current non-users) by reason for discontinuation of the contraceptive method according to place of residence, Pondicherry, 2002-04 |  |  |  |
| :---: | :---: | :---: | :---: |
|  |  | Place of residence |  |
| Reasons | Total | Rural | Urban |
| Reason for discontinuation |  |  |  |
| Wanted child | 42.3 | (43.4) | 42.1 |
| Method failed/became pregnant | 3.6 | (1.1) | 4.0 |
| Supply not available | 0.3 | (0.0) | 0.4 |
| Difficult to get method | 2.5 | (0.0) | 2.9 |
| Weakness/inability to work | 6.4 | (14.0) | 5.2 |
| Body ache/ Backache | 0.4 | (0.0) | 0.4 |
| Weight gain | 0.5 | (0.7) | 0.4 |
| Breast tenderness | 1.2 | (8.6) | 0.0 |
| Irregular periods | 2.9 | (0.0) | 3.4 |
| Excessive bleeding | 2.3 | (4.0) | 2.1 |
| White discharge | 1.9 | (1.1) | 2.0 |
| Lack of pleasure | 0.5 | (3.1) | 0.0 |
| Method was inconvenient | 15.7 | (19.8) | 15.0 |
| Other | 17.9 | (4.2) | 20.2 |
| Missing | 1.6 | (0.0) | 1.8 |
| Total percent | 100.0 | 100.0 | 100.0 |
| Number of past users | 210 | 30 | 180 |
| Note () Based on less than 50 unv |  |  |  |

### 6.8.1 Reasons for Not Using Contraceptive Methods

DLHS-RCH asked women and husbands who are currently not using any contraception and main reasons why they were not currently using a method. The responses are presented in Table- 6.17. The reported main reasons for not using contraception are cost too much ( 34 percent), difficult to become pregnant (13 percent), cannot work after sterilization ( 7 percent), opposed to family planning and worry about side effects ( 5 percent each), not liking the existing method ( 3 percent), against the religion ( 2 percent) and afraid of sterilization (1 percent). About 28 percent of the women reported other reasons for not using contraception. As far as rural-urban differentials are concerned, a little variation is observed in the reasons for not using any contraception except for the reasons : difficult to become pregnant ( 20 percent in rural and 12 percent in urban) and others ( 20 percent in rural and 29 percent in urban).

| Table 6.17 REASON FOR NOT USING CONTRACEPTIVE METHOD |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of current non-users who were currently not using contraceptive method by reason according to place of residence, Pondicherry, 2002-04 |  |  |  |  |  |  |
| Reason | Women |  |  | Husband* |  |  |
|  | Total | Rural | Urban | Total | Rural | Urban |
| Lack of Knowledge about FP method | 0.0 | 0.0 | 0.0 | 0.1 | 0.0 | 0.2 |
| Against the Religion | 2.2 | 1.5 | 2.4 | 5.3 | 6.5 | 5.0 |
| Opposed to family planning | 4.7 | 2.5 | 5.1 | 1.2 | 0.5 | 1.4 |
| Not like existing method | 3.0 | 3.7 | 2.9 | 5.9 | 0.0 | 7.4 |
| Afraid of sterilization | 1.4 | 0.7 | 1.5 | 0.0 | 0.0 | 0.0 |
| Can not work after sterilization | 7.3 | 6.4 | 7.5 | 7.0 | 2.7 | 8.1 |
| Worry about side effects | 4.9 | 6.1 | 4.7 | 7.0 | 2.3 | 8.2 |
| Costs too much | 34.0 | 36.4 | 33.6 | 0.2 | 0.0 | 0.3 |
| Health does not permit | 0.0 | 0.0 | 0.0 | 46.2 | 47.8 | 45.8 |
| Hard/inconvenient to get method | 0.5 | 0.0 | 0.6 | 0.1 | 0.5 | 0.0 |
| Inconvenient to use method | 0.3 | 0.0 | 0.4 | 1.1 | 0.6 | 1.3 |
| Difficult to become pregnant | 13.1 | 20.1 | 11.8 | 15.5 | 26.5 | 12.6 |
| Other | 28.0 | 20.1 | 29.4 | 7.2 | 11.7 | 5.9 |
| Missing | 0.6 | 2.6 | 0.2 | 3.1 | 0.7 | 3.8 |
| Total percent | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Number of current non-users | 607 | 94 | 513 | 355 | 75 | 280 |
| Note: ${ }^{1}$ Not applicable for women. * Excluding not decided cases on timing of next child. |  |  |  |  |  |  |

### 6.9 Unmet Need for Family Planning Services

Unmet need for family planning is one of the indicators to assess the effectiveness of the family planning programme. Policy makers and family planning programme planners use this to know the demand for family planning services/supplies. Unmet need is defined in this report separately for limiting and spacing. Unmet need for spacing includes the proportion of currently married women who are neither in menopause nor had hysterectomy nor are currently pregnant and who want more children after two years or later and are currently not using any family planning method. The women who are not sure about whether and when to have next child are also included in unmet need for spacing. The women who are not sure about the timing of the next child are also included in the unmet need for spacing. Unmet need for limiting includes the proportion of currently married women who are neither in menopause nor had hysterectomy nor are currently pregnant and do not want any more children but are currently not using any family planning method. Total unmet need refers to the totality of unmet for limiting and spacing. Table 6.18 provides the information about unmet need for limiting and spacing in Pondicherry by background characteristics. The unmet need in Pondicherry is 17 percent consisting of five percent for spacing and 12 percent for limiting.

| Percentage of currently married women with unmet need for family planning (FP) services by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Unmet need for FP |  |  |  |
| Background Characteristic | Spacing ${ }^{1}$ | Limiting ${ }^{2}$ | Total | women |
| Age (in years) |  |  |  |  |
| 15-19 | 22.1 | 0.2 | 22.3 | 64 |
| 20-24 | 11.2 | 7.9 | 19.1 | 589 |
| 25-29 | 6.6 | 10.2 | 16.7 | 834 |
| 30-34 | 2.5 | 8.0 | 10.5 | 790 |
| 35-39 | 1.2 | 17.1 | 18.3 | 726 |
| 40-44 | 0.2 | 19.1 | 19.3 | 643 |
| Residence |  |  |  |  |
| Rural | 3.4 | 9.2 | 12.7 | 738 |
| Urban | 4.8 | 12.8 | 17.6 | 2,909 |
| Education |  |  |  |  |
| Illiterate | 1.6 | 8.2 | 9.8 | 654 |
| 0-9 @ years | 3.5 | 14.8 | 18.3 | 1,385 |
| 10 years and above | 6.6 | 11.4 | 18.0 | 1,607 |
| Religion |  |  |  |  |
| Hindu | 3.9 | 11.3 | 15.2 | 3,125 |
| Muslim | 12.4 | 14.8 | 27.2 | 300 |
| Christian | 3.3 | 21.9 | 25.2 | 201 |
| Others | (0.0) | (0.0) | (0.0) | 22 |
| Caste/tribe\# |  |  |  |  |
| Scheduled caste | 4.4 | 11.7 | 16.2 | 738 |
| Other backward class | 4.2 | 12.5 | 16.7 | 2,807 |
| Others | 13.7 | 5.5 | 19.2 | 88 |
| Number of living children |  |  |  |  |
| 0 | 2.8 | 1.7 | 4.5 | 428 |
| 1 | 14.5 | 17.8 | 32.3 | 816 |
| 2 | 2.0 | 13.9 | 15.9 | 1,535 |
| 3 | 0.6 | 8.1 | 8.7 | 687 |
| 4+ | 0.5 | 11.0 | 11.5 | 181 |
| Standard of living Index |  |  |  |  |
| Low | 4.3 | 11.9 | 16.2 | 464 |
| Medium | 3.3 | 8.5 | 11.8 | 961 |
| High | 5.1 | 13.7 | 18.8 | 2,223 |
| All women | 4.5 | 12.1 | 16.6 | 3,647 |
| Note: ${ }^{1}$ Unmet need for spacing includes the proportion of currently married women who are neither in menopause or had hysterectomy nor are currently pregnant and who want more children after two years or later and are currently not using any family planning method. The women who are not sure about whether and when to have next child are also included in unmet need for spacing. |  |  |  |  |
| ${ }^{2}$ Unmet need for limiting includes the proportion of currently married women who are neither in menopause or had hysterectomy nor are currently pregnant and do not want any more children but are currently not using any family planning method. |  |  |  |  |
| Total unmet need refers to unmet for limiting and spacing. |  |  |  |  |
| @ Literate women with no years of schooling are also included. \# The total figure may not add to N due to do not know and missing cases. () Based on less than 50 unweighted cases. |  |  |  |  |

The unmet need is high for women below 20 years and 20-24 years, mainly for spacing ( 22 percent and 11 percent respectively) rather than for limiting. Unmet need is also relatively high for women aged $35-39$ years ( 18 percent) and aged 40 or more years (19 percent) mostly for limiting. Urban women have higher unmet need (18 percent) than the rural women (13 percent). Unmet need for family planning is higher among the literate women with $0-9$ years of schooling and the women with 10 or more years of schooling (18 percent) than non-literate women (10 percent). Hindu women (15 percent) have lesser unmet need for family planning compared to Muslim ( 27 percent) and Christian women ( 25 percent). Unmet need for family planning is higher for other caste (19 percent) followed by other backward caste (17 percent) and Scheduled Caste (16 percent) women.

Women in high standard of living (19 percent) have higher unmet need than the women of low (16 percent) and medium standard of living (12 percent). Unmet need is much higher for women with one living child ( 32 percent) than women with either no child (5 percent) or four or more children (12 percent). Among the women with one child the unmet need is due to spacing by four percent of total unmet need, whereas for women with two children or more unmet need is exclusively for limiting.

### 6.9.1 Unmet Need for Family Planning Services by District

Table 6.19 provides the information about unmet need for limiting, spacing and total by district. The unmet need for family planning services for state is 17 percent and it ranges from 14 percent in Yanam to 27 percent in Mahe. In 2, out of 4 districts unmet need for family planning is more than state average. Unmet need for limiting was found to be lowest in Yanam (4 percent) followed by Mahe ( 7 percent) and highest in Karaikal (14 percent). Similarly, unmet need for spacing was lowest to three percent in Pondicherry and highest of 20 percent in Mahe. It may also observe that in Karaikal and Pondicherry districts unmet need for limiting was more than spacing, and in Mahe and Yanam unmet need for spacing was more than limiting.

|  |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of currently married women with unmet need by district, Pondicherry, 2002-04 |  |  |  |
|  | Unmet need for |  |  |
| Districts | Spacing | Limiting | Total |
| Karaikal | 5.1 | 13.8 | 18.8 |
| Mahe | 19.8 | 6.9 | 26.7 |
| Pondicherry | 3.2 | 11.8 | 15.0 |
| Yanam | 9.5 | 4.0 | 13.5 |
| Pondicherry | 4.5 | 12.1 | 16.6 |

## CHAPTER VII

## ACCESSIBILITY AND PERCEPTION ABOUT GOVERNMENT HEALTH FACILITIES

The Government health facilities at all the levels provide various RCH services. Auxiliary Nurse Midwife (ANM), family planning worker or male health worker play a key role in delivering the services to the community. Health workers are expected to make regular visits to all the households in their assigned area. During these contacts, the health workers are supposed to monitor various aspects of the health of women and children, provide information related to health and family planning, counsel and motivate to adopt appropriate health and family planning practices and deliver other selected services. These contacts are also important as they enhance the creditability of services and establish necessary rapport with the clients. In order to assess the extent of utilisation of government health facilities by all eligible women and to find out whether ANM/health workers reach the households for providing RCH services, a separate section in the women's questionnaire was canvassed to all the eligible women. This chapter deals with the accessibility and the opinion of women about the services provided by the government health workers. The quality of care offered by the government health programme as perceived by currently married women is also presented.

### 7.1 Home Visit by Health Workers

Table 7.1 shows the percentage of currently married women visited by health workers at home during the three months prior to the survey. Nearly one-fourth ( 23 percent) of the women in Pondicherry reported that health worker visited them at their residence at least once in last three months preceding the survey. Younger women seemed more likely to report a home visit than older women. Twenty-seven percent of women in the age group 15-24 years reported at least one home visit compared to only 19 percent of women in the age group 35 years and older. The percentage of women in Pondicherry receiving home visits is higher in rural areas ( 35 percent) than in urban areas ( 20 percent). Women with a low standard of living ( 32 percent) seemed more likely to report home visits than the women in high standard of living ( 21 percent). Muslim women (33 percent) reported about more home visits of health worker than Hindu (22 percent) and Christian (21 percent) women. Twenty-four percent of Scheduled caste women and 23 percent of other backward castes reported about home visit of health workers. Home visits were more common for women residing in the villages with no health facility ( 39 percent) than women residing in villages with health facility ( 30 percent).

Women who reported a home visit during the three months preceding the survey were asked who visited their household during the past three months and whether they were satisfied with the kind of services/advice received, and the time spent by these health workers. Among women who received services at home, 90 percent received services from ANM/LHV, 12 percent from male health worker and less than one percent from doctor ( 0.3 percent). There were rural-urban differentials by visit of households by health worker. Ninety-one percent of women who received services at home were satisfied with the time spent with them and 92 percent of women were satisfied with the services or advice given to them.

| Table 7.1 HOME VISIT BY HEALTH WORKER <br> Percentage of women who had home visit by a doctor, ANM/LHV, or male health worker in the 3 months preceding the survey, among women who had home visit, satisfied with time spent by health workers and with services provided by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Background characteristic |  |  | Home visit by ${ }^{1}$ |  |  | Percentage of women satisfied with |  | Number of women |
|  | Percentage with home visit | Number of women | Doctor | ANM / LHV | Male health worker | Amount of time | Services/ advices |  |
| Age (in years) |  |  |  |  |  |  |  |  |
| 15.24 | 27.3 | 653 | 0.1 | 94.9 | 8.4 | 93.6 | 97.1 | 178 |
| 25-34 | 24.5 | 1,624 | 0.4 | 91.7 | 9.4 | 89.9 | 92.6 | 398 |
| 35-44 | 18.6 | 1,370 | 0.4 | 82.5 | 18.0 | 91.2 | 88.6 | 254 |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 34.8 | 738 | 0.6 | 83.9 | 17.7 | 94.9 | 96.1 | 256 |
| Urban | 19.7 | 2,909 | 0.2 | 92.1 | 9.2 | 89.4 | 90.6 | 574 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 20.7 | 654 | 0.0 | 91.1 | 9.3 | 94.2 | 96.7 | 135 |
| 0-9@ years | 24.8 | 1,385 | 0.6 | 83.6 | 19.0 | 93.2 | 94.4 | 344 |
| 10 and above | 21.8 | 1,607 | 0.2 | 94.8 | 5.8 | 87.8 | 88.6 | 351 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 21.8 | 3,125 | 0.3 | 92.4 | 8.3 | 91.1 | 92.4 | 682 |
| Muslim | 33.0 | 300 | 0.9 | 71.2 | 34.9 | 92.6 | 93.9 | 99 |
| Christian | 20.7 | 201 | (0.0) | (88.9) | (13.3) | (86.7) | (93.3) | 42 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 24.3 | 738 | 0.3 | 84.9 | 16.0 | 91.0 | 93.8 | 179 |
| Other backward class | 22.6 | 2,807 | 0.3 | 90.6 | 10.8 | 91.0 | 91.8 | 634 |
| Other | 10.1 | 75 | * | * | * | * | * | 8 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 32.2 | 464 | 0.4 | 89.6 | 12.3 | 91.4 | 92.6 | 149 |
| Medium | 22.8 | 961 | 0.3 | 90.1 | 11.1 | 94.0 | 97.6 | 219 |
| High | 20.8 | 2,223 | 0.3 | 89.3 | 12.0 | 89.7 | 89.7 | 462 |
| Availability of health facility ${ }^{2}$ in the village |  |  |  |  |  |  |  |  |
| No | 38.6 | 424 | 1.0 | 79.5 | 22.0 | 95.0 | 96.2 | 164 |
| Yes | 29.6 | 314 | 0.0 | 91.6 | 10.1 | 94.6 | 96.1 | 93 |
| Total | 22.8 | 3,647 | 0.3 | 89.6 | 11.8 | 91.1 | 92.3 | 830 |
| Note: ${ }^{1}$ Percentage add to more than 100.0 due to multiple responses. @ Literate mother with no years of schooling are included. \# Total number may not add to N due to do not know and missing cases. Total includes 22 cases of other religion and 12 case of scheduled tribe on caste category who were not shown separately. ${ }^{2}$ Includes sub-center, primary health center, Community health center or referral hospital, government hospital, and government dispensary within the village. <br> () Based on les than 50 unweighted cases. *Percentage not shown: Based on very few cases. |  |  |  |  |  |  |  |  |

The proportion of women who were satisfied with the amount of time spent and advices provided by health workers varied across various background characteristics. Ninety-four percent of women in the age group of 15-24 years, 91 percent in the age group of 35-44 years and 90 percent in the age group of 25-34 years reported satisfaction with the time spent by health workers. Similarly, ninety-seven percent of women in the age group 15-24 years, 93 percent in the age group 25-34 years and 80 percent of the age group 35-44 years reported satisfaction with services. Urban women (89 percent) were less satisfied with the time spent by health workers during home visits than rural women ( 95 percent). Similarly, rural women ( 96 percent) were satisfied with the service than urban women ( 91 percent).

Muslim women (93 percent) are more likely to be satisfied with amount of time spent by health workers during home visits than Hindu ( 91 percent). Women in medium standard of living expressed more satisfaction about the amount of time spent ( 94 percent) and services/ advice ( 98 percent) received by health workers than women in high and low standard of living. There was no difference in satisfaction with the time spent by the health worker between women living in villages with health facility and women with no health facility.

### 7.2 Home Visit by Health Workers by District

In Yanam district of Pondicherry, health workers visited 10 percent of the women at home (Table 7.2 and Figure 7.1). In Pondicherry district 21 percent of the women were visited by health workers. There are two districts (Mahe and Karaikal) in which more than one-third of women received home visits ( 36 percent and 43 percent respectively). Male health workers visit to home is not reported in Yanam district and it is highest in Karaikal (33 percent) district followed by Pondicherry (6 percent). The percentage of women visited by doctor at home was only one percent in Mahe and Karaikal. Doctors visit to home is not reported in Pondicherry and Yanam.


In almost all the districts, more than 90 percent of the women said that health worker had spent enough time with them and they had satisfaction with services/advices given by them. The percentage of women satisfied with the time spent by health worker ranges from 90 percent in Karaikal to 99 percent in Yanam and the satisfaction on services ranged from 92 percent in Karaikal to 99 percent in Mahe.

| Percentage of women who had home visit by a doctor, ANM/LHV or male health worker in the 3 months preceding the survey, among women who had home visit, satisfied with time spent by health workers and with services provided by district, Pondicherry, 2002-04 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | me visit |  | Percentag satisfi | f women with |
| District | Percentage with home visit | Doctor | ANM / LHV | Male health worker | Time spent | Service |
| Karaikal | 42.5 | 1.2 | 72.2 | 32.8 | 89.5 | 91.9 |
| Mahe | 35.8 | 1.1 | 98.7 | 1.4 | 97.1 | 98.5 |
| Pondicherry | 20.7 | 0.0 | 94.5 | 5.5 | 92.4 | 93.1 |
| Yanam | 10.0 | 0.0 | 100.0 | 0.0 | 99.4 | 97.0 |
| Pondicherry | 22.8 | 0.3 | 89.6 | 11.8 | 91.1 | 92.3 |
| Note: ${ }^{1}$ Percentage add to more than 100.0 due to multiple responses. |  |  |  |  |  |  |

### 7.3 Matters Discussed during Home visits or Visits to Health Facilities

Women who were visited at home by a family planning worker as well as those who visited government health facility or other health facility during the three months preceding the survey were asked about the different topics discussed with the workers during any of these visits. Table 7.3 shows the percentage of women who discussed the health and family planning or any health related matters to the health workers during home visits or visits to a health facility during the past three months. There are 373 pregnant woman or women with children born during the reference period, and other women includes 348 current users and 110 current non-users, who were visited by health workers at home.

The major focus of discussion during home visits are disease prevention (38 percent) and immunization ( 25 percent). In addition, discussions were also made on treatment of health problems (12 percent), nutrition ( 10 percent), child care and antenatal care ( 9 percent each), family planning and sanitation/cleanliness ( 6 percent each) and delivery care ( 2 percent). Treatment for health problems (13 percent 26 percent respectively) and disease prevention (53 percent and 41 percent respectively) were mentioned more often by current users of contraception and by current non-users than pregnant women or women with child born after reference period ( 7 percent and 23 percent respectively). As expected, pregnant women or women with child born after reference period were much more likely than other women to report that they discussed about childcare, delivery care, family planning, immunization and antenatal care. A higher proportion of current contraceptive users and current non-users discussed about treatment of disease prevention and health problems in the order during home visit by health workers past three months preceding the survey.

The topics discussed most often during visits to health facility by women were treatment of health problems (52 percent), immunization and childcare (16 percent each), antenatal care (10 percent), disease prevention ( 7 percent), and delivery care (4 percent). Only three percent of the women reported that they discussed postpartum care during the visit. During visit to health facility, nearly one-third (31 percent) of the pregnant women or women with children born during reference period discussed on immunization and 29 percent discussed treatment of a health problem, 21 percent discussed childcare, 17 percent discussed about antenatal care, eight percent discussed delivery care, six percent in disease prevention, four percent each discussed on nutrition and post-partum care and only two percent discussed about family planning. A few pregnant women or women with children born after reference period also discussed about supplementary feeding, family planning, oral re-hydration and breastfeeding during visit to health facility. A higher proportion of current users and nonusers discussed on treatment of health problems ( 77 percent and 70 percent respectively) and disease prevention (8 percent and 11 percent respectively) than pregnant women with children after reference period during visit to health facility in three months prior to survey.

| Percentage of women who were visited by health worker in the three months preceding the survey, and percentage of women who visited health facility, and the percentage of women ${ }^{1}$ who discussed specific topics with the health worker Pondicherry, 2002-04 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Pregnant women or women with children born after reference period ${ }^{2}$ | Other | men |  |
| Topic discussed |  | Current contraceptive users | Current non-users | Total |
| During home visit |  |  |  |  |
| Family planning | 7.3 | 4.6 | 5.0 | 5.9 |
| Breastfeeding | 0.6 | 0.8 | 0.0 | 0.6 |
| Supplementary feeding | 0.5 | 0.3 | 0.0 | 0.4 |
| Immunization | 44.9 | 8.0 | 11.9 | 25.1 |
| Nutrition | 9.5 | 11.5 | 3.6 | 9.6 |
| Diseases prevention | 23.2 | 52.8 | 40.7 | 37.9 |
| Treatment of health problem | 7.3 | 12.8 | 26.1 | 12.1 |
| Antenatal care | 15.8 | 3.3 | 3.4 | 8.9 |
| Delivery care | 3.6 | 0.1 | 0.1 | 1.7 |
| Postpartum care | 1.1 | 1.5 | 0.0 | 1.1 |
| Childcare | 14.1 | 5.0 | 3.4 | 8.9 |
| Sanitation / cleanliness | 4.1 | 8.0 | 4.6 | 5.8 |
| Oral rehyderation | 0.7 | 0.1 | 0.2 | 0.4 |
| Other | 1.2 | 6.7 | 8.4 | 4.4 |
| Number of women | 373 | 348 | 110 | 830 |
| During visit to health facility |  |  |  |  |
| Family planning | 1.7 | 0.6 | 0.0 | 1.1 |
| Breastfeeding | 0.1 | 0.0 | 0.0 | 0.1 |
| Supplementary feeding | 1.5 | 1.5 | 0.0 | 1.4 |
| Immunization | 31.4 | 0.3 | 0.0 | 16.4 |
| Nutrition | 3.8 | 3.4 | 0.0 | 3.3 |
| Diseases prevention | 5.6 | 7.6 | 11.3 | 7.0 |
| Treatment of health problem | 29.2 | 77.4 | 70.2 | 51.6 |
| Antenatal care | 17.0 | 1.8 | 2.9 | 9.8 |
| Delivery care | 7.6 | 0.8 | 1.1 | 4.4 |
| Postpartum care | 3.5 | 2.9 | 0.4 | 3.0 |
| Childcare | 21.2 | 11.8 | 4.5 | 16.0 |
| Sanitation / cleanliness | 0.9 | 0.0 | 0.0 | 0.5 |
| Oral rehyderation | 0.7 | 0.1 | 0.0 | 0.4 |
| Other | 0.9 | 0.2 | 4.2 | 0.9 |
| Number of women | 366 | 266 | 71 | 703 |
| Note: Percentage add to more than 100.0 due to multiple responses. <br> ${ }^{1}$ Women who visited private health facility are not included. |  |  |  |  |

### 7.4 Visit to Health Facility

Table 7.4 presents the percentage of currently married women who needed to visit health facility and visited the health facility by residence and availability of health facility in the village. Fifteen percent of women needed to visit health facility but did not visit in comparison with 42 percent of women who needed to visit health facility and visited in past three months of the survey. The proportion of such women was 48 percent in rural areas and 41 percent in urban areas. Among them who visited any health facility, 53 percent of
women reported that they had visited a private hospital, (42 percent in rural areas and 56 percent in urban areas).

| Table 7.4 VISIT TO HEALTH FACILITY |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Percentage of women who need to visit health facility and visited, and percent distribution of women visited health facility by type of health facility according to place of residence and availability of health facilities in the village, Pondicherry, 2002-04 |  |  |  |  |  |
| Health facility | Total | Residence |  | Availability of health facility ${ }^{1}$ in the village |  |
|  |  | Rural | Urban | No | Yes |
| Percentage of women who needed to visit health facility and not visited | 15.0 | 18.9 | 14.0 | 12.2 | 23.8 |
| Percentage of women who needed to visit health facility and visited | 41.9 | 47.7 | 40.5 | 48.3 | 47.3 |
| Number of women | 3,647 | 738 | 2,909 | 314 | 424 |
| Government health facility |  |  |  |  |  |
| Hospital / CHC / FRU /RH | 26.7 | 22.3 | 28.0 | 28.3 | 17.8 |
| Dispensary | 0.5 | 0.3 | 0.6 | 0.5 | 0.1 |
| Primary health center | 16.0 | 33.5 | 10.8 | 23.2 | 41.2 |
| Sub-center | 0.7 | 1.4 | 0.5 | 0.2 | 2.3 |
| Private health facility |  |  |  |  |  |
| Hospital | 52.7 | 42.2 | 55.9 | 47.4 | 38.2 |
| Dispensary | 0.0 | 0.2 | 0.0 | 0.2 | 0.1 |
| $I_{\text {ISM }}{ }^{2}$ hospital/dispensary | 2.0 | 0.2 | 2.6 | 0.2 | 0.1 |
| Other | 1.3 | 0.1 | 1.6 | 0.0 | 0.1 |
| Total percent | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Number of women | 1,530 | 352 | 1,178 | 152 | 201 |

Note: CHC: Community health center, FRU: First referral unit, RH: Referral Hospital
${ }^{1}$ Includes sub-center, primary health center, Community health center or referral hospital, government hospital, and government dispensary within the village
${ }^{2}$ Either government or private health facility of Indian System of Medicine
Table includes 3 missing cases in availability of health facility in the village

Only forty-four percent of the women visited a government health facility, of which 27 percent visited to Government hospital/CHC/FRU/RH, one percent each visited Sub-centres and Government dispensary, and 16 percent visited Primary Health Centre. Only two percent of the women reported that they visited Indian system of medicine hospital/ dispensary either government or private. Women in villages with health facility ( 61 percent) are more likely to visit Government health facility than women in village without health facility ( 52 percent) in the past three months of the survey and women in villages with health facility are more likely to visit to PHC (41 percent) than women in Villages with health no health facility ( 23 percent). Unlike this women in villages with a health facility are less likely to visits hospitals/CHC/FRU/RH (18 percent) than women in villages with no health facility (28 percent).

### 7.5 Visit to Health Facility by District

Table 7.5 presents the percentage of currently married women who needed to visit health facility and visited the health facility by districts. The proportion of women who needed to visit a health facility, but did not visit ranges from 13 percent in Yanam to 16 percent in Pondicherry. Out of 4, in 3 districts i.e. Karaikal and Mahe ( 47 percent each) and Pondicherry (43 percent) less than half of the women visited health facility for their health problems. In Yanam, 16 percent of the women visited to health facility for their health problems. Among them who visited health facility, more than 60 percent of the women visited Government health facility in two districts Karaikal (62 percent) and Yanam (68 percent). In Mahe, 50 percent of women visited Government health facility, whereas among women visited private health facility when needed, in Pondicherry, more than half of the women visited to private health facility in past three months to the survey.

| Percentage of women who needed to visit health facility, but not visited and percentage of women who visited health facility by type of health facility by district, Pondicherry, 2002-04 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Percentage of women who | Percentage of women who | Percentage of women who visited to |  |
| Districts | health facility, but not visited | health facility and visited | Government health facility | Private health facility |
| Karaikal | 15.0 | 47.1 | 62.3 | 37.6 |
| Mahe | 15.0 | 46.8 | 50.4 | 49.6 |
| Pondicherry | 15.8 | 42.9 | 42.5 | 56.1 |
| Yanam | 13.2 | 16.2 | 68.1 | 31.9 |
| Pondicherry | 15.0 | 41.9 | 44.7 | 54.0 |

### 7.6 Client's Perception of Quality of Government Health Services

Utilization of services is an essential indicator reflecting the quality of services. Better quality of services would have a higher utilization rate, which is very important from the policy point of view. Unless clients are satisfied with the services provided by the government, efforts made by the government will be wasted. In order to assess the utilization of government health facilities, a question was asked whether they had visited any health facility for their health problem during past three months to the survey. Those who visited the government health facility were asked their perceptions about quality of services, (personal manner like courtesy, respect, sensitivity, and friendliness of the physician and staff, technical skills and quality like thoroughness, carefulness, and competence and waiting time for receiving the services) and the same is presented in Table 7.6. Little more than three-fourths of the women perceived that the convenience of the health facility location was good. More than seven-tenth of the women perceived personal manner as well technical skills and quality of physician, ANM/nurse and other staff was good. They perceived that personal manner (courtesy, respect, sensitivity, and friendliness) and technical skills (thoroughness, carefulness, and competence) of the physician, nurses and other staff were good. The waiting time is felt as poor by 23 percent of women. Explanation given to the women is reported as good by 68 percent. General comfort is reported by 66 percent of women. A few respondents mentioned that
location of the health facility (14 percent), personnel manner of physician and general comfort (17 percent each), technical skills and quality of the physician (16 percent), the explanation given to the women and waiting time ( 10 percent each), personal manner of the nurse ( 9 percent), technical skills and quality of the nurse and personal manner and technical skills and quality of other staff including paramedical staff (7 percent each ) were excellent.

| Table 7.6 QUALITY OF GOVERNMENT HEALTH FACILITY |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of women who visited government health facility and rated quality and availability of services during most recent visit to a government health facility in the three months preceeding the survey, Pondicherry,2002-04 |  |  |  |
| Quality indicator | Poor | Good | Excellent |
| The convenience of the health facility location | 8.3 | 77.8 | 13.9 |
| Length ${ }^{1}$ of time spend towards waiting | 23.2 | 65.7 | 9.6 |
| Personal manner ${ }^{2}$ of the physician ${ }^{5}$ | 12.6 | 70.4 | 17.1 |
| The technical skills and quality ${ }^{3}$ of the physician ${ }^{5}$ | 14.6 | 69.0 | 16.4 |
| Personal manner ${ }^{2}$ of nurse | 20.3 | 70.9 | 8.8 |
| The technical skills and quality ${ }^{3}$ of nurse | 20.1 | 72.5 | 7.3 |
| Personal manner of other staff ${ }^{5}$ | 20.0 | 72.6 | 7.3 |
| The technical skills and quality of other ${ }^{4}$ staff | 25.3 | 67.6 | 7.1 |
| The explanation of what was done to her | 22.1 | 68.1 | 9.8 |
| Medical, surgical and diagnostic equipment | 26.0 | 61.0 | 13.0 |
| General comfort | 17.1 | 66.1 | 16.7 |
| Note: ${ }^{1}$ Poor indicate long waiting time, good indicate average waiting time, and excellent indicate short waiting time. ${ }^{2}$ Courtesy, respect, sensitivity, friendliness. ${ }^{3}$ Thoroughness, carefulness, competence. ${ }^{4}$ Including paramedical staff. ${ }^{5}$ Includes hospital/community health center/ first referral unit/ referral hospital, dispensary, and primacy health center last visit made by women. |  |  |  |

### 7.7 Reason for not visiting Government Health Centre

Women who visited the private health centre were asked the main reason for not visiting the government health centre and the results are presented in Table 7.7. Thirty percent of the currently married women reported unsuitable time of services as one of the reason for not visiting the government health centre for their health problems, this reason is reported by 29 percent of rural women and 30 percent of urban women and more reported in women from those village where health facilities are available ( 35 percent) than women from those villages where health facilities are not available ( 22 percent). Twenty-seven percent reported that poor quality of services as a hindrance to visit the government health centre and 26 percent reported about heavy rush in Government health facility ( 22 percent in rural; 27 percent in urban). Other reasons for not visiting government health centres were, doctor/health workers do not examine properly and medicine rarely/not given or of bad quality (3 percent each), and inconvenient location (2 percent).

| Percent distribution of women visited private health facility by reason for not visiting government health facility according to residence and availability of health facilities in the village, Pondicherry, 2002-04 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Residence |  | Availability of health facility ${ }^{1}$ in the village |  |
| Reason | Total | Rural | Urban | No | Yes |
| Not conveniently located | 1.5 | 2.3 | 1.3 | 3.9 | 0.8 |
| Time is not suited | 29.5 | 28.8 | 29.7 | 22.4 | 34.9 |
| Poor quality of services | 26.9 | 35.1 | 25.1 | 43.9 | 26.8 |
| Heavy rush | 25.7 | 21.7 | 26.6 | 15.8 | 27.3 |
| Non/rare-availability of doctors/health workers | 0.3 | 0.3 | 0.3 | 0.0 | 0.6 |
| Doctors/health workers do not examine properly | 2.5 | 0.9 | 2.9 | 0.0 | 1.7 |
| Medicine not/rarely given or of bad quality | 3.3 | 5.1 | 2.9 | 2.9 | 7.1 |
| Doctors/paramedical staff does not behave properly | 0.1 | 0.0 | 0.1 | 0.0 | 0.0 |
| Referred by government doctor | 0.2 | 0.0 | 0.3 | 0.0 | 0.0 |
| Other | 10.0 | 5.9 | 11.0 | 11.2 | 0.9 |
| Total percent | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Number of women | 827 | 149 | 677 | 72 | 77 |
| Note: ${ }^{1}$ Includes sub-center, primary health center, Community health center or referral hospital, government hospital, and government dispensary within the village |  |  |  |  |  |

### 7.8 Family Planning Information and Advice Received

Women who are currently not using any contraceptive method were asked whether they were ever advised by ANM or family planning health worker to adopt family planning method and method advised during any of the contact. One-fourth ( 25 percent) of current non-users said that they had advices or discussion on method of family planning with ANM or family planning health worker (Table 7.8). The most frequently discussed method was female sterilization ( 66 percent) followed by IUD ( 29 percent). Only two percent of women received advices to use condom and only one percent received advice to adopt male sterilization as a contraceptive method. Discussions about traditional method, such as rhythm or withdrawal were rare. There is much variation exists by type of residence in terms of family planning information and advice received. Advice on female sterilization was more reported by rural women ( 71 percent) than urban women ( 66 percent). On the other hand more women in urban (30 percent) reported about advice on IUD than rural (26 percent). Like that advice on male sterilization was two percent in urban and one percent in rural.

| Table 7.8 ADVICE TO ADOPT FAMILY PLANNING METHOD |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of current non-users who reported ever advised to adopt family planning method by method of family planning by ANM/health worker, according to residence, Pondicherry, 2002-04 |  |  |  |
| Method | Total | Rural | Urban |
| Percentage of non-users who were advised to adopt family planning method | 24.8 | 39.7 | 21.6 |
| Number of women | 1,308 | 231 | 1,076 |
| Method |  |  |  |
| Female sterilization | 66.3 | 70.7 | 64.5 |
| Male sterilization | 1.3 | 0.6 | 1.6 |
| IUD | 28.8 | 25.9 | 30.0 |
| Pills | 1.1 | 2.2 | 0.7 |
| Condom | 2.4 | 0.0 | 3.3 |
| Withdrawal | 0.2 | 0.6 | 0.0 |
| Total percent | 100.0 | 100.0 | 100.0 |
| Number of women | 324 | 92 | 232 |

### 7.9 Availability of Pills and Condom

To explore difficulties faced in the procurement of condoms and pills, current users of these methods were asked that they had been able to get their supply whenever needed. The results are presented in Table 7.9. Only three percent of pills users reported that they had a problem in getting Pills. A higher proportion of rural women (6 percent) than urban women (3 per cent) had problems in getting a supply of pills.

| Percentage of current condom or pill users who ever had a problem in getting supply of condoms/pills by residence, Pondicherry, 2002-04 |  |  |
| :---: | :---: | :---: |
| Method/residence | Percentage who had a problem getting supply | Number of users |
| Condom |  |  |
| Rural | * | 0 |
| Urban | * | 20 |
| Total | * | 21 |
| Pills |  |  |
| Rural | 6.0 | 25 |
| Urban | 2.9 | 166 |
| Total | 3.3 | 191 |
| Note: * Percentage not shown: Based on very few cases. |  |  |

### 7.10 Quality of Care of Family Planning Services

Several aspects of quality of care of family planning services were also investigated. Current user of a sterilization was asked whether the person or centre where sterilization had been performed, informed her about other alternative methods of family planning; and further it was asked whether she was told by a ANM or health worker about possible side effects of the modern method at the time she accepted the method; whether she received any follow-up care after accepting the method. Tables 7.10 and 7.11 present the results of this investigation.

Twenty-four percent of sterilized women reported that ANM or health worker informed them about alternative methods that they could use (Table 7.10) before adopting sterilization. The percentage of sterilized women received such information by ANM or health worker in the government health facilities was 25 percent and it was 22 percent in private health facilities. It was more in urban (27 percent) than in rural (17 percent).

| Table 7.10 INFORMATION OF OTHER MODERN METHOD BEFORE STERILIZATION |  |  |  |  |
| :--- | :--- | :--- | :--- | :--- | :--- |
| Percentage of current users of sterilization who were informed about other modern method by <br> the source where they get sterilized according to the source of sterilization and residence, <br> Pondicherry, 2002-04 |  |  |  | Number |
|  | Total | Rural | Urban | of users |
| Source of sterilization | 24.5 | 17.3 | 27.1 | 1,598 |
|  | 21.7 | 10.6 | 22.6 | 179 |
| Government health facility | 24.3 | 17.1 | 26.6 | 1,789 |
| Private health facility |  |  |  |  |
| Total |  |  |  |  |

Note: Total includes 1, 11 and 1 women who said that they sterilized at mobile clinic, other and who do not know including missing information of place/source of sterilization, are not shown separately.

Another important fact of informed contraceptive choice is being fully informed about any side effects and any other problems associated with the method. In Pondicherry, 51 percent of users of any modern method were informed about possible side effects or health problems associated with their current method. Sixty percent of acceptors of sterilization in rural area and 52 percent in urban area reported that they were informed about side effects. Among users of modern method other than sterilization, 28 percent of rural users and 37 percent of urban users were informed about side effects. It is clear from the result that ANM or health workers in Pondicherry are providing sufficient information to half of the couples who need to make an informed choice about contraceptive methods but it requires further improvement. The situation with respect to follow-up services is also encouraging. Follow-up services among sterilization users are slightly higher than user of other modern methods. About 36 percent of sterilization users in rural area and 22 percent in urban area reported that they received follow-up services by ANM or health worker. Nearly one-fourth (22 percent) of the users of other modern method received follow-up services. In all, 35 percent of the users of any modern method in rural area and 22 percent in urban areas received follow-up services. The results clearly shows that follow-up services given by health worker or ANM/Nurse after accepting contraception is at low level and requires improvement.

| Table 7.11 INFORMATION ON SIDE EFFECT AND FOLLOW-UP FOR CURRENT METHOD |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of current users of modern contraceptive methods who were told about side effects or other problems of current method by a health worker or ANM/Nurse at the time of accepting the method and percentage who received follow-up services after accepting the method by current method and residence, Pondicherry, 2002-04 |  |  |  |
| Information/follow-up | Total | Rural | Urban |
| Told about side effects |  |  |  |
| Sterilization | 54.1 | 59.9 | 52.3 |
| Other modern method | 35.5 | 27.5 | 36.9 |
| Any modern method | 51.4 | 57.1 | 49.7 |
| Received follow-up |  |  |  |
| Sterilization | 25.0 | 35.6 | 21.5 |
| Other modern method | 22.0 | 22.5 | 21.9 |
| Any modern method | 24.6 | 34.5 | 21.6 |

### 7.11 Quality of Care Indicators for Contraceptive Users by District

Table 7.12 shows inter-district variations in the percentage of users of sterilization who were told about alternative methods before adopting sterilization and about side effects or other problems related to the current method or users of modern contraceptive methods, and the percentage of users who received follow-up services.

| Table 7.12 QUALITY OF CARE INDICATORS FOR CONTRACEPTIVE USERS BY DISTRICT |
| :--- | :--- | :--- | :--- | :--- | :--- |

The percentage of sterilization-users who were told about alternate method is lowest in Pondicherry ( 20 percent) and highest in Yanam (44 percent). There are also inter-district variations in the percentage of sterilization- users and users of modern contraceptive methods who were told about the possible side effect. In case of sterilization, the proportion varied from a low of 12 percent in Mahe to a high of 75 percent in Karaikal. For other modern contraceptive methods, at a maximum, of 46 percent users in Karaikal and a minimum of 24 percent of users in Mahe were told about the side effects of the method. Follow-up services are slightly better for acceptors of sterilization than for other modern methods in most of the
districts of Pondicherry. Table 7.12 also shows district wise variation in the percentage of current non-users who were ever advised to adopt contraceptive methods, which varies from a low of 11 percent in Mahe to a high of 43 percent in Karaikal.

Overall, the quality of care for family planning and health services is some what satisfactory in many of the district of Pondicherry; some of the districts are need to work to improve their health and family planning services, particularly services that are provided by the Government sector.

### 7.12 Quality of Care of Maternal Health Care

Information on few other aspects of quality of care in terms of maternal care was also collected. Women with last live/still births during three years preceding the survey were asked whether the Doctor/ANM/health worker advised you to go to health facility for delivery when they were pregnant, and received any follow-up care after delivering the baby within 2 weeks of delivery and received follow-up care at least one visit within six weeks of delivery. The same information is presented in Table 7.13.

| Table 7.13 ADVICED TO HAVE DELIVER SERVICES FOR POSTPARTUM CHECK |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of women* who were advised worker and percentage who receive follow delivery by ANM according to residence, P |  | facility ks and | health eeks of |
| Advice/follow-up service | Total | Rural | Urban |
| Percentage of women who were advised to have delivery at health facility | 79.8 | 92.3 | 76.4 |
| Percentage of women who were visited within 2 weeks of delivery | 33.6 | 35.0 | 33.2 |
| Percentage of women who were visited at least once within 6 weeks of delivery | 39.6 | 42.1 | 39.0 |
| Number of women | 1,041 | 221 | 820 |
| Note: * Women who had live birth/still birth after 1.1.1999/2001 |  |  |  |
| Total includes 4 missing cases on advised to have delivery at health facility and 2 cases on visited at least once within 6 weeks of delivery who were not shown separately. |  |  |  |

Four-fifths (80 percent) of the women with last live/still births during three years preceding the survey reported that they were advised by doctor or health worker to have delivery in health facility. Women from rural areas ( 92 percent) were more likely than urban areas ( 76 percent) to get advised to deliver their child at health facility.

In district wise variation, the percentage varies from 52 percent in Yanam to 84 percent in Pondicherry (Table 7.14). In 3 of 4 districts, more than three-fourths of women were advised to deliver their child in health facility.

| Table 7.14 QUALITY OF CARE INDICATORS FOR MATERNAL CARE |  |  |  |
| :---: | :---: | :---: | :---: |
| Among currently married women* who are given live/still birth three years preceding the survey, quality of care indicators related to delivery care by district, Pondicherry, 2002-04 |  |  |  |
|  | Percentage of women |  |  |
| District | Advised to have delivery at health facility by doctor/ health worker | Visited within 2 weeks of delivery by ANM | Visited at least once within 6 weeks of delivery by ANM |
| Karaikal | 78.5 | 36.4 | 57.0 |
| Mahe | 77.2 | 36.0 | 41.0 |
| Pondicherry | 84.2 | 33.7 | 36.4 |
| Yanam | 52.1 | 16.5 | 17.3 |
| Pondicherry | 79.8 | 33.6 | 39.6 |
| Note: * Women who had live birth/still birth after 1.1.1999/2001 |  |  |  |

Thirty-four percent of the women reported that they were visited by an ANM within two weeks of delivery; such visit was 35 percent in rural areas and 33 percent in urban areas. Forty-two percent of the women in rural areas and 39 percent in urban areas received at least one follow-up service within six weeks of delivery. Little more than one-third of the women were received postpartum check-up within 2 weeks of delivery in all the districts of Pondicherry except Yanam (17 percent). The proportion of women who had at least one postpartum check-up within six weeks of delivery varied from a low of 17 percent in Yanam to high of 57 percent in Karaikal (Table 7.14).

## CHAPTER - VIII

## REPRODUCTIVE HEALTH PROBLEMS AND AWARENESS OF RTIs/STIs AND HIV/AIDS

One of the important components of the Reproductive and Child Health Programme is to have a healthy sexual life without any fear of contracting disease. With this approach the RCH programme places a lot of emphasis on promoting and encouraging healthy sexual behaviour among couples through various Information, Education and Communication (IEC) activities. Health workers are also expected to educate women and men about Reproductive Tract Infections (RTIs) and Sexually Transmitted Infections (STIs) and motivate those people with RTI/STI problems to seek medical help. The DLHS-RCH has made an attempt to collect information on awareness and prevalence of RTI/STI. Apart from this, information on knowledge of HIV/AIDS, source of information and way of avoiding AIDS were also collected.

### 8.1 Awareness of RTI/STI

An attempt was made to assess whether couples were aware of RTI/STI. Currently married women and their husbands were asked about their awareness of RTI/STI, and if they were aware, they were further questioned about the source of information and mode of transmission of the disease.

Table 8.1 and Figure 8.1 shows the percentage of women aware of RTI/STI by background characteristics. Nearly two-fifths ( 39 percent) of the women in Pondicherry were aware of RTI/STI. The proportion of women who were aware of RTI/STI is higher in urban areas ( 43 percent) than in rural areas ( 21 percent). Awareness of RTI/STI is much lower among younger women less than 25 years, non-literate women, women from Hindu religion, scheduled caste women and women from households with a low standard of living. Awareness of RTI/STI increases from 11 percent among non-literate women to 58 percent among women who have completed 10 or more years of schooling. The standard of living index shows a positive relationship with awareness of RTI/STI, ranging from 18 percent among women with a low standard of living to 49 percent among women with a high standard of living. The awareness was higher in Christian (55 percent) than Muslim (46 percent) and Hindu women (37 percent).

Those women who had heard of RTI/STI were further asked about the source of information of RTI/STI, which is presented in Table 8.1. Sixty-seven percent of the women reported that they received information of RTI/STI from television. Thirty-seven percent each of them received information from newspaper or books or magazines and relatives/friends. Other sources of information of RTI/STI as reported by women were radio ( 23 percent), slogans or posters or pamphlets or wall hoardings (19 percent), doctor (12 percent), health worker (11 percent), eight percent received information from community meeting, three percent of the women reported that they had heard of RTI/STI from school teacher and only two percent from other sources.

Table 8.2 shows the percentage of husbands of currently married women who heard of RTI/STI by specific source of information according to some selected background characteristics. In Pondicherry, the percentage of men ( 82 percent) who heard of RTI/STI is higher than that of women ( 39 percent) (Figure 8.1). Men from urban areas and aged 35 and above years were relatively more aware of RTI/STI. Men who belongs to Hindu and Muslim religion and other caste are less likely to report awareness of RTI/STI. The level of awareness of RTI/STI increases with an increase in education level and standard of living. Forty-seven percent of non-literate men were aware of RTI/STI as compared to 96 percent of men who had completed 10 or more years of schooling. Sixty-four percent of men from households with a low standard of living were aware of RTI/STI as compared to 90 percent of men with a high standard of living.


Television (50 percent), newspaper/books/magazines (48 percent) and relatives or friends (47 percent) are the most prominent source of RTI/STI for men in Pondicherry. Other important sources of information about RTI/STI are slogans or posters or pamphlets or wall hoardings and radio (16 percent each) followed by doctor (7 percent). Only four percent of the men received this information from community meeting, three percent from health workers, and only one percent of the men reported that they heard of RTI/STI from other sources and from school teacher.

Electronic media such as 'television' and radio is an important source of information of RTI/STI for men who are from urban areas and belong to Muslim religion as well 'other' backward caste category. The differences in the knowledge of RTI/STI from television as a source of information by educational level and standard of living household are quite visible. Eight percent of non-literate men had heard of RTI/STI from television which increased to

60 percent for men who have completed 10 or more years of schooling. Knowledge of RTI/STI through television among men increased from 21 percent in low standard of living to 59 percent in high standard of living. Newspapers/books/magazines are the second most important source of information of RTI/STI. Men from urban areas, literate men with 10 and above years of education, Christian men, men from other backward caste, men with a high standard of living, men in 25-34 and 35-44 years are more prone to receive information from Newspapers/books/magazines.

| Background Characteristic | Percentage who have heard about RTI/STI | Number of Women | Among those who have heard about RTI/STI, percentage who received information from |  |  |  |  |  |  |  |  |  | Number of women who have heard about RTI/STI |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Radio | $\begin{gathered} \text { Televis } \\ \text { ion } \\ \hline \end{gathered}$ | Newspaper/ Books/ Magazines | Slogan/ Pamphlets/ Posters/ Wall Hoardings | Doctor | Health worker | School teacher | Community Meeting | Relative/ Friends | Others |  |
| Age group (in years) |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 31.4 | 653 | 28.9 | 62.7 | 44.8 | 26.0 | 4.0 | 8.5 | 2.8 | 6.6 | 28.9 | 2.8 | 205 |
| 25-29 | 40.4 | 834 | 24.4 | 69.5 | 33.3 | 19.1 | 10.4 | 8.6 | 2.4 | 9.5 | 36.1 | 0.8 | 337 |
| 30-34 | 42.0 | 790 | 14.4 | 66.0 | 37.6 | 19.5 | 16.2 | 14.1 | 1.6 | 8.5 | 37.4 | 0.7 | 332 |
| 35-39 | 38.3 | 726 | 22.6 | 65.9 | 36.4 | 19.5 | 13.9 | 7.9 | 5.3 | 7.7 | 39.4 | 4.4 | 278 |
| 40-44 | 39.8 | 643 | 27.2 | 68.8 | 37.6 | 14.2 | 11.6 | 17.6 | 2.2 | 6.2 | 38.7 | 3.4 | 256 |
| Residence |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rural | 21.1 | 738 | 22.2 | 56.3 | 29.2 | 27.0 | 8.4 | 21.2 | 5.4 | 20.5 | 38.9 | 6.3 | 156 |
| Urban | 43.0 | 2,909 | 22.9 | 68.1 | 38.4 | 18.4 | 12.2 | 10.2 | 2.5 | 6.3 | 36.2 | 1.7 | 1,252 |
| Education |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Non-literate | 11.1 | 654 | 6.8 | 19.5 | 1.8 | 0.7 | 1.4 | 20.3 | 1.4 | 1.2 | 71.8 | 7.0 | 73 |
| 0-9@ years | 29.6 | 1,385 | 20.6 | 53.8 | 16.7 | 16.3 | 11.6 | 11.8 | 1.8 | 10.0 | 48.3 | 4.1 | 410 |
| 10 and above | 57.5 | 1,607 | 25.1 | 76.3 | 49.3 | 22.2 | 12.6 | 10.5 | 3.3 | 7.4 | 28.5 | 1.0 | 925 |
| Religion |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hindu | 37.1 | 3,125 | 22.0 | 67.3 | 37.6 | 18.9 | 11.8 | 11.9 | 2.5 | 8.2 | 35.4 | 2.1 | 1,158 |
| Muslim | 45.5 | 300 | 27.8 | 54.7 | 35.3 | 23.8 | 11.3 | 10.7 | 4.2 | 4.3 | 40.0 | 4.6 | 136 |
| Caste/tribe ${ }^{\text {* }}$ |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Scheduled caste | 30.2 | 738 | 26.1 | 59.6 | 35.9 | 20.1 | 13.9 | 16.5 | 4.0 | 11.8 | 51.8 | 3.7 | 223 |
| Other backward class | 40.5 | 2,807 | 21.3 | 67.9 | 36.6 | 17.9 | 11.3 | 10.6 | 2.6 | 7.3 | 33.7 | 1.9 | 1,137 |
| Other | 48.7 | 75 | (46.4) | (79.4) | (78.0) | (55.0) | (1.9) | (7.2) | (2.4) | (4.8) | (39.7) | (0.0) | 37 |
| Standard of living index |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Low | 17.9 | 464 | 14.7 | 38.3 | 10.8 | 16.7 | 9.9 | 24.9 | 2.5 | 15.7 | 42.3 | 10.3 | 83 |
| Medium | 25.4 | 961 | 18.8 | 45.5 | 27.9 | 22.1 | 6.1 | 12.5 | 1.2 | 10.1 | 51.7 | 2.3 | 244 |
| High | 48.6 | 2,223 | 24.4 | 73.8 | 41.6 | 19.0 | 13.2 | 10.1 | 3.2 | 6.8 | 32.6 | 1.6 | 1,081 |
| Total | 38.6 | 3,647 | 22.8 | 66.8 | 37.4 | 19.4 | 11.7 | 11.4 | 2.8 | 7.9 | 36.5 | 2.2 | 1,408 |
| Note: @ Literate women with no year of schooling are also included. \#Total figure may not add to N due to do not know and missing cases. Total includes 18 case of other religion, 5 case of scheduled tribe category on caste were not shown separately. ( ) Based on less than 50 unweighted cases. |  |  |  |  |  |  |  |  |  |  |  |  |  |

## Table 8.2 SOURCE OF KNOWLEDGE ABOUT RTI/STI AMONG MEN

 background characteristics, Pondicherry, 2002-04.

| Background characteristic | Percentage who have heard about RTI/STI | Number of men | Among those who have heard about RTI/STI, percentage who received information from |  |  |  |  |  |  |  |  |  | Number of men who have heard about RTI/STI |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Radio | Television | Newspaper/ Books/ Magazines | Slogan/ <br> Pamphlets/ <br> Posters/ <br> Wall <br> Hoardings | Doctor | Health worker | School teacher | Community Meeting | Relative/ Friends | Others |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 25-34 | 77.6 | 874 | 15.0 | 47.9 | 48.6 | 15.6 | 4.8 | 2.8 | 0.6 | 3.2 | 49.7 | 1.6 | 678 |
| 35-44 | 84.6 | 1,221 | 15.7 | 52.4 | 49.2 | 16.9 | 8.2 | 3.4 | 1.1 | 4.8 | 43.5 | 1.1 | 1,033 |
| 45+ | 84.2 | 621 | 16.0 | 45.5 | 46.6 | 13.1 | 5.2 | 3.1 | 1.6 | 3.7 | 49.7 | 1.3 | 523 |
| Residence |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rural | 80.4 | 688 | 7.6 | 25.6 | 31.7 | 17.2 | 3.1 | 6.4 | 1.0 | 4.0 | 62.1 | 1.3 | 553 |
| Urban | 82.6 | 2,085 | 18.1 | 57.4 | 53.6 | 15.0 | 7.7 | 2.1 | 1.0 | 4.0 | 41.7 | 1.3 | 1,721 |
| Education |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Non-literate | 46.8 | 282 | 1.1 | 7.8 | 1.1 | 0.7 | 1.7 | 9.0 | 0.7 | 8.3 | 88.7 | 1.0 | 132 |
| 0-9@ years | 73.7 | 1,100 | 7.5 | 39.6 | 25.2 | 11.0 | 3.9 | 3.1 | 0.6 | 2.8 | 57.3 | 1.9 | 811 |
| 10 and above | 95.7 | 1,391 | 21.9 | 60.0 | 67.0 | 19.8 | 8.6 | 2.6 | 1.3 | 4.3 | 36.0 | 0.9 | 1,331 |
| Religion |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hindu | 81.5 | 2,422 | 13.6 | 46.9 | 46.7 | 13.9 | 6.2 | 3.1 | 0.9 | 3.8 | 48.6 | 1.1 | 1,973 |
| Muslim | 82.5 | 176 | 32.2 | 72.3 | 51.6 | 29.7 | 10.5 | 5.0 | 3.8 | 9.0 | 35.2 | 4.5 | 145 |
| Christian | 87.8 | 154 | 22.3 | 61.9 | 59.8 | 23.8 | 4.9 | 2.4 | 0.0 | 2.6 | 38.1 | 0.5 | 135 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Scheduled caste | 79.3 | 603 | 8.4 | 32.2 | 36.8 | 62.3 | 6.1 | 5.2 | 0.4 | 3.0 | 63.3 | 1.5 | 478 |
| Other backward class | 83.3 | 2,098 | 16.9 | 53.8 | 50.4 | 16.4 | 6.3 | 2.7 | 1.2 | 4.0 | 41.8 | 1.3 | 1,747 |
| Other | 61.5 | 58 | (49.7) | (91.8) | (95.4) | (25.1) | (18.5) | (3.6) | (1.5) | (18.5) | (73.3) | (0.0) | 36 |
| Standard of living index |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Low | 63.6 | 786 | 12.2 | 21.2 | 18.8 | 14.5 | 4.1 | 4.3 | 0.8 | 4.8 | 62.6 | 3.8 | 246 |
| Medium | 89.6 | 1,621 | 12.5 18.3 | 37.4 59.4 | 35.4 58.3 | 17.6 | 4.4 7.8 | 3.9 2.7 | 0.6 1.2 | 4.7 3.6 | 60.9 36.6 | 0.8 1.0 | 1,453 |
| High |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Total | 82.0 | 2,773 | 15.5 | 49.7 | 48.3 | 15.6 | 6.5 | 3.2 | 1.0 | 4.0 | 46.6 | 1.3 | 2,274 |

 scheduled tribe on caste on who had heard about RTI/STI were not shown separately. ( ) Based on less than 50 unweighted cases.

### 8.1.1 Knowledge of Mode of Transmission of RTI/STI

Women who were aware of RTI/STI were asked about the mode of transmission. This is presented in Table 8.3. Among women who reported knowledge of RTI/STI, one-fifth (20 percent) of them did not know anything about the mode of transmission of this disease. This proportion is relatively higher among rural women, literate with 0-9 years of schooling, nonliterate women, women from Muslim religion, women from other backward class, women coming from households with low standard of living and women less than 25 years. One-third (33 percent) of rural women do not know about the mode of transmission of RTI/STI compared to 19 percent of urban women.

| Percentage of currently married women aged 15-44 years who have heard of RTI/STI, knowledge of mode of transmission by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Background characteristic | Percentage by knowledge of mode of transmission |  |  |  | Do not know | Number of women who have heard of RTI/STI |
|  | Homosexual intercourse | Heterosexual intercourse | Lack of personnel hygiene | Others |  |  |
| Age (in years) |  |  |  |  |  |  |
| <25 | 7.3 | 53.8 | 40.5 | 2.7 | 26.1 | 205 |
| 25-29 | 13.5 | 57.7 | 36.7 | 5.1 | 23.7 | 337 |
| 30-34 | 8.5 | 61.5 | 44.2 | 2.4 | 19.6 | 332 |
| 35-39 | 9.0 | 63.1 | 48.9 | 5.3 | 19.2 | 278 |
| 40-44 | 13.4 | 62.9 | 45.7 | 7.8 | 13.0 | 256 |
| Residence |  |  |  |  |  |  |
| Rural | 10.8 | 48.9 | 20.9 | 6.8 | 33.4 | 156 |
| Urban | 10.5 | 61.4 | 45.8 | 4.4 | 18.6 | 1,252 |
| Education |  |  |  |  |  |  |
| Non-literate | 1.0 | 56.9 | 45.2 | 3.6 | 27.8 | 73 |
| 0-9@ years | 9.7 | 44.2 | 36.6 | 3.7 | 29.8 | 410 |
| 10 years and above | 11.6 | 67.3 | 45.8 | 5.1 | 15.4 | 925 |
| Religion |  |  |  |  |  |  |
| Hindu | 10.6 | 61.4 | 42.2 | 4.3 | 20.8 | 1,158 |
| Muslim | 16.9 | 54.8 | 41.1 | 6.2 | 23.2 | 136 |
| Christian | 2.4 | 51.2 | 53.4 | 6.3 | 10.9 | 109 |
| Casteltribe\# |  |  |  |  |  |  |
| Scheduled caste | 9.2 | 61.7 | 49.3 | 5.3 | 18.5 | 223 |
| Other Backward Class | 10.3 | 58.8 | 41.4 | 4.7 | 21.3 | 1,137 |
| Other | (20.6) | (82.3) | (54.5) | (0.5) | (3.8) | 37 |
| Standard of living index |  |  |  |  |  |  |
| Low | 6.2 | 52.6 | 28.9 | 7.2 | 33.0 | 83 |
| Medium | 13.6 | 44.9 | 32.9 | 5.6 | 30.2 | 244 |
| High | 10.2 | 64.0 | 46.4 | 4.2 | 17.0 | 1,081 |
| Total | 10.5 | 60.0 | 43.1 | 4.6 | 20.2 | 1,408 |

Note: @ Literate women with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 4 cases of other religion and 7 cases of scheduled caste category on caste were not shown separately. ( ) Based on less than 50 unweighted cases

Heterosexual intercourse and lack of personnel hygiene ( 60 per cent and 43 percent respectively) were the main mode of transmission of RTI/STI reported by women. Eleven percent of women reported homosexual intercourse and five percent reported other modes of transmission of RTI/STI. Mode of transmission is positively related with education of women and household standard of living.

Table 8.4 presents the knowledge of mode of transmission of RTI/STI among men. Among men who had heard of RTI/STI, only five percent of them mentioned that they did not know any thing about the mode of transmission of this disease. The percentage of men who did not know about the mode of transmission is higher among urban, non-literate, other religion and men from households with a low standard of living. Among the men who new the modes of transmission of RTI/STI, 87 percent mentioned heterosexual intercourse, 25 percent reported lack of personnel hygiene, six percent mentioned homosexual intercourse, and less than one percent reported other modes of transmission. The mode of transmission is steadily increased with increase in household standard of living.

| Percentage of husbands of currently married women who have heard of RTI/STI, knowledge of mode of transmission by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Background characteristic | Percentage by knowledge of mode of transmission |  |  |  | Do not know | Number of men who have heard of RTI/STI |
|  | Homosexual intercourse | Heterosexual intercourse | Lack of personnel hygiene | Others |  |  |
| Age (in years) |  |  |  |  |  |  |
| < 25 | (4.3) | (93.6) | (4.3) | (2.1) | (4.3) | 39 |
| 25-29 | 7.3 | 87.1 | 22.6 | 0.8 | 3.7 | 678 |
| 30-34 | 5.0 | 88.5 | 24.9 | 0.3 | 4.9 | 1,033 |
| 35-39 | 5.3 | 83.3 | 27.1 | 0.3 | 6.8 | 523 |
| 40-44 | 1.7 | 83.7 | 19.4 | 0.9 | 5.5 | 553 |
| Residence |  |  |  |  |  |  |
| Rural | 7.1 | 87.8 | 26.2 | 0.3 | 5.1 | 1,721 |
| Urban | 4.2 | 61.9 | 18.8 | 0.0 | 17.0 | 132 |
| Education |  |  |  |  |  |  |
| Non-literate | 1.7 | 79.8 | 19.1 | 0.4 | 8.0 | 811 |
| 0-9@ years | 8.5 | 93.5 | 28.4 | 0.5 | 2.3 | 1,331 |
| 10 years and above | 6.0 | 86.0 | 23.4 | 0.4 | 5.6 | 1,973 |
| Religion |  |  |  |  |  |  |
| Hindu | 4.2 | 91.5 | 25.6 | 2.2 | 2.1 | 145 |
| Muslim | 3.1 | 91.6 | 36.0 | 0.0 | 3.4 | 135 |
| Other | 2.1 | 79.8 | 25.2 | 0.9 | 9.5 | 478 |
| Caste/tribe\# |  |  |  |  |  |  |
| Scheduled caste | 6.7 | 88.4 | 24.3 | 0.3 | 4.2 | 1,747 |
| Scheduled tribe | (5.1) | (99.5) | (11.3) | (0.5) | (0.0) | 36 |
| Standard of living index |  |  |  |  |  |  |
| Low | 0.3 | 78.1 | 16.0 | 0.6 | 12.7 | 246 |
| Medium | 3.7 | 81.2 | 20.9 | 0.9 | 7.2 | 575 |
| High | 7.6 | 90.5 | 27.4 | 0.3 | 3.2 | 1,453 |
| Total | 5.8 | 86.8 | 24.5 | 0.5 | 5.2 | 2,274 |

Note: @ Literate men with no years of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 21 case of Christian on religion and 6 case of scheduled tribe category on caste were not shown separately. ( ) Based on less than 50 unweighted cases.

### 8.2 Prevalence of RTI/STI

In DLHS-RCH, information was collected on the common symptoms of reproductive tract infections and sexually transmitted infections from women and their husbands, and information on menstruation related problems in the three months immediately preceding the survey.

The prevalence of reproductive tract infections and sexually transmitted tract infections is judged by their symptoms. All the respondents were told about symptoms of RTI/STI, and were asked whether they had any of them. In case of the presence of at least one symptom, they were further asked whether they sought treatment for such problems, and if they had sought treatment, details regarding the source of treatment also recorded. The topic of RTI/STI is quite sensitive. The culture of silence prevents people from discussing such topics in front of others. In spite of intensive training of the investigators, the respondent might have hesitated in reporting the symptoms of RTI/STI. What gets reported in the survey though may not have given the exact prevalence, but may have given the lower limit for it.

Table 8.5 and Figure 8.2 shows that 13 percent of currently married women reported at least one reproductive health problem. The problems reported by women were 'low backache' (5 percent), 'itching over vulva' (4 percent), 'some mass coming out of vagina' (3 percent), and 'pain in lower abdomen not related to menses', and 'painful sexual intercourse' and 'involuntary escape of urine while coughing or sneezing’ (2 percent each). Other symptoms of reproductive health reported by women were 'fever', 'boils/ ulcers/ warts around vulva', 'frequent / painful passage of urine' and 'swelling/lump in breast' (1 percent each). Very few women reported 'bleeding after sexual intercourse' and 'swelling in the groin' (less than 1 percent). Rural women (20 percent) reported more problems than urban women (11 percent).

| Table 8.5 SYMPTOMS OF RTI/STI AMONG WOMEN |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of currently married women aged $15-44$ years who reported any symptoms RTI/STI and sp symptoms during three months prior to survey, according to residence, Pondicherry, 2002-04 |  |  |  |
|  |  | Residence |  |
| Symptoms | Total | Rural | Urban |
| Percentage of women reported any RTI/STI symptoms | 12.8 | 20.2 | 10.9 |
| Symptoms |  |  |  |
| Itching over vulva | 3.6 | 4.6 | 3.3 |
| Boils/ ulcers/ warts around vulva | 0.7 | 0.7 | 0.7 |
| Pain in lower abdomen not related to menses | 2.0 | 3.7 | 1.6 |
| Low backache | 4.8 | 7.8 | 4.1 |
| Pain during sexual intercourse | 1.7 | 3.5 | 1.3 |
| Bleeding after sexual intercourse | 0.4 | 0.4 | 0.4 |
| Swelling in the groin | 0.2 | 0.9 | 0.0 |
| Frequent / painful passage of urine | 1.2 | 2.9 | 0.8 |
| Fever | 0.5 | 2.4 | 0.1 |
| Some mass coming out of vagina | 2.9 | 6.7 | 1.9 |
| Any involuntary escape of urine while coughing or sneezing | 1.5 | 2.7 | 1.2 |
| Swelling / lump in breast | 1.1 | 1.6 | 1.0 |
| Number of women | 3,647 | 738 | 2,909 |



Table 8.6 and Figure 8.3 shows the prevalence of reproductive health problems among husbands of currently married women. The prevalence of RTI/STI among men was judged by the reporting of symptoms. Only one percent of men reported experiencing at least one symptom of reproductive health problem in the last three months preceding the survey. The prevalence of reported symptoms is higher among rural men ( 5 percent) than among urban men ( 0.4 percent). The reproductive health problems experienced by men are 'difficulty/pain while urinating or very frequent urination (1 percent), discharge from penis ( 0.2 percent) and any sore/rash/redness on genitals or anal area ( 0.1 percent).


| Table 8.6 SYMPTOMS OF RTI/STI AMONG MEN |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of husbands of currently married women who reported any symptoms RTI/STI and specific symptoms during three months prior to survey and sought treatment for RTI/STI by source of treatment, according to residence, Pondicherry, 2002-04 |  |  |  |
|  |  | Residence |  |
| Symptoms and treatment | Total | Rural | Urban |
| Percentage of men reported any RTI/STI symptoms | 1.4 | 4.7 | 0.4 |
| Symptoms |  |  |  |
| Any discharge from penis | 0.2 | 0.3 | 0.1 |
| Any sore / rash / redness on genitals or anal area | 0.1 | 0.1 | 0.1 |
| Difficulty / pain while urinating or very frequent urination | 1.2 | 4.1 | 0.2 |
| Swelling of testis or in groin area | 0.0 | 0.1 | 0.0 |
| Itching / irritation around genital | 0.0 | 0.2 | 0.0 |
| Number of Men | 2,773 | 688 | 2,085 |
| Percentage of men sought treatment for any RTI/STI ${ }^{1}$ | (28.9) | (20.7) | * |
| Number of Men | 39 | 32 | 7 |
| Percentage sought treatment at health facility ${ }^{2}$ |  |  |  |
| Government health facility ${ }^{3}$ | (45.5) | (33.3) | * |
| Sub centre | (18.2) | (16.7) | * |
| Private health facility ${ }^{4}$ | (45.5) | (50.0) | * |
| ISM ${ }^{5}$ facility | (27.3) | (16.7) | * |
| Chemist/ medical shop | (9.1) | (16.7) | * |
| Other | (27.3) | (33.3) | * |
| Percentage obtained treatment from ${ }^{2}$ |  |  |  |
| Doctor | (63.6) | (50.0) | * |
| Male health worker | (9.1) | (0.0) | * |
| Traditional healer | (18.2) | (16.7) | * |
| Relative/friends | (9.1) | (16.7) | * |
| ISM practitioner | (18.2) | (16.7) | * |
| Home remedy | (9.1) | (16.7) | * |
| Chemist medical shop | (27.3) | (33.3) | * |
| Other | (27.3) | (33.3) | * |
| Number of men | 39 | 37 | 7 |
| Note : ${ }^{1}$ Based on men with any symptoms of RTI/STI |  |  |  |
| ${ }^{2}$ Percentage may add more than 100.0 due to multiple responses |  |  |  |
| ${ }^{3}$ Includes Government municipal hospital, dispensary, UHC/ UHP /UWFC, CHC/ rural hospital, Primary health centre, sub-centre. ${ }^{4}$ Includes private hospital/ clinic, non-governmental / trust hospital/clinic,. ${ }^{5}$ Either government or private hospital/clinic of Indian system of medicine. ( ) Based on less than 50 unweighted cases. * Percentage not shown: Based on very few cases. |  |  |  |

The DLHS-RCH also collected information from currently married women on symptoms of RTIs, that is, on abnormal vaginal discharge, texture, colour and odour of discharge in the three months immediately preceding the survey. The prevalence of reproductive health problems among currently married women is estimated from women's experiences. Table 8.7 shows the asymptotic prevalence of vaginal discharge related problems among currently married women in Pondicherry during the three months preceding the survey according to residence. Eight percent of the women reported problems related to vaginal discharge. The prevalence of vaginal discharge problem is relatively higher among rural women (14 percent) than among urban women ( 7 percent).

| Table 8.7 ABNORMAL VAGINAL DISCHARGE |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of currently married women aged 15-44 years who reported about abnormal vaginal discharge during three months prior to survey and percentage who sought treatment and source of treatment according to residence, Pondicherry, 2002-04 |  |  |  |
|  | Residence |  |  |
| Symptoms and treatment | Total | Rural | Urban |
| Percentage of women reported abnormal |  |  |  |
| Number of Women | 3,647 | 738 | 2,909 |
| Percentage of women sought treatment for vaginal discharge ${ }^{1}$ | 35.4 | 42.6 | 31.7 |
| Number of Women | 304 | 103 | 201 |
| Percentage sought treatment at health facility ${ }^{2}$ |  |  |  |
| Government health facility ${ }^{3}$ | 51.4 | (51.2) | 44.0 |
| Primary health centre | 15.5 | (14.6) | 19.8 |
| Sub centre | 2.5 | (2.4) | 3.8 |
| Private health facility ${ }^{4}$ | 49.8 | (51.2) | 57.6 |
| ISM ${ }^{5}$ facility | 5.9 | (14.6) | 7.5 |
| Home remedy | 3.6 | (7.3) | 4.6 |
| Other | 7.2 | (9.8) | 10.4 |
| Percent distribution of women who obtained treatment from ${ }^{2}$ |  |  |  |
| Doctor | 86.9 | (75.6) | 82.1 |
| ANM/nurse/midwife/LHV ${ }^{6}$ | 9.8 | (19.5) | 13.3 |
| Other health professionals ${ }^{6}$ | 3.3 | (4.5) | 4.6 |
| Total percent | 100.0 | (100.0) | 100.0 |
| Number of women | 108 | 44 | 64 |
| Note: ${ }^{1}$ Based on women who reported having vaginal discharge. ${ }^{2}$ Based on women who sought treatment for vaginal discharge. ${ }^{3}$ Includes Government municipal hospital, dispensary, UHC/ UHP /UWFC, CHC/ rural hospital, Primary health centre, sub-centre and out reach/ MCP clinic in village. ${ }^{4}$ Includes private hospital/ clinic, nongovernmental / trust hospital/clinic, chemist/ medical shop. ${ }^{5}$ Either government or private hospital/clinic of Indian system of medicine, ${ }^{6}$ Includes dai (trained or untrained), relative or friends and chemist/ medical shop. ( ) Based on less than 50 unweighted cases. |  |  |  |

Among the women who had reported symptoms of vaginal discharge, 35 percent went for treatments, higher percentage from rural areas ( 43 percent) compared to their urban counterparts ( 32 percent). Government ( 51 percent) and private ( 50 percent) health facilities were equally preferred for treatment. Among the Government health facility, 16 percent went to Primary Health Centre and three percent to Sub-centre. Four percent took home remedies, seven percent visited other places for treatment and six percent use ISM facility. In urban areas, the proportion of women who visited a private health facility is 58 percent and the proportion of women, who visited a facility rendering the Indian System of Medicine is eight percent. The proportion of women who visited Government health facility is 44 percent. A significantly higher proportion of women in the state of Pondicherry obtained treatment from doctors ( 87 percent) for their problems. About 10 percent of women were treated by ANM/Nurse/LHV and three percent by other health professionals.

### 8.3 Menstruation Related Problems

Table 8.8 shows the percentage of women who had menstruation problems and who sought treatment during the three months preceding the survey. The Table shows that around 15 percent of women in Pondicherry had menstruation problems and the figures are 13 percent and 15 percent in the rural and urban areas respectively.

| Table 8.8 MENSTRUATION RELATED PROBLEMS |  |  |  |
| :---: | :---: | :---: | :---: |
| Percentage of currently married women aged 15-44 years who had any menstruation related problem during three months prior to survey and percentage who sought treatment and source of treatment according to residence, Pondicherry, 2002-04 |  |  |  |
|  |  | Residence |  |
| Symptoms and treatment | Total | Rural | Urban |
| Percentage of women with any menstruation related problem | 14.6 | 12.9 | 15.1 |
| Number of Women | 3,152 | 634 | 2,518 |
| Symptoms ${ }^{1}$ |  |  |  |
| No period | 5.3 | 0.3 | 6.4 |
| Painful period | 29.1 | 26.1 | 29.8 |
| Frequent or short period | 10.7 | 6.2 | 11.7 |
| Delayed period | 37.0 | 36.7 | 37.1 |
| Prolonged bleeding | 3.0 | 3.3 | 3.0 |
| Excessive bleeding | 13.9 | 20.7 | 12.5 |
| Continuous bleeding | 2.4 | 2.7 | 2.4 |
| Scanty bleeding | 10.8 | 8.4 | 11.3 |
| Inter-menstrual bleeding | 2.2 | 4.2 | 1.8 |
| Percentage of women sought treatment |  |  |  |
|  | 48.4 | 45.4 | 49.0 |
| Number of Women | 461 | 82 | 379 |
| Percentage sought treatment at health facility ${ }^{6}$ |  |  |  |
| Government health facility ${ }^{2}$ | 39.8 | (51.3) | 36.4 |
| Primary health centre | 5.5 | (17.9) | 2.6 |
| Sub centre | 0.2 | (5.1) | 0.0 |
| Private health facility ${ }^{3}$ | 57.1 | (46.2) | 60.1 |
| ISM ${ }^{4}$ facility | 1.7 | (12.8) | 1.3 |
| Other | 2.5 | (7.7) | 2.5 |
| Percentage of women obtained treatment from ${ }^{6}$ |  |  |  |
| Doctor | 91.7 | (84.6) | 92.7 |
| ANM/nurse/midwife/LHV | 4.8 | (15.4) | 3.5 |
| Other health professionals ${ }^{5}$ | 5.9 | (15.4) | 4.5 |
| Other | 0.3 | (7.7) | 0.0 |
| Number of women who are currently menstruating | 223 | 37 | 186 |
| Note : ${ }^{1}$ Based on women who reported any menstruated related problems. <br> ${ }^{2}$ Includes Government municipal hospital, dispensary, UHC/ UHP /UWFC, CHC/ rural hospital, Primary health centre, sub-centre and out reach/ MCP clinic in village. ${ }^{3}$ Includes private hospital/ clinic, non-governmental / trust hospital/clinic, chemist/ medical shop. ${ }^{4}$ Either government or private hospital/clinic of Indian system of medicine, ${ }^{6}$ Includes dai (trained or untrained), relative or friends and chemist/ medical shop. ${ }^{6}$ Multiple responses. ( ) Based on less than 50 unweighted cases. |  |  |  |

Among the women who had reported menstrual problems in Pondicherry, 37, 29, 14 and 11 percent reported delayed periods, painful periods, excessive bleeding and scanty bleeding as symptoms respectively. The magnitude of these symptoms except excessive bleeding and intermenstrual bleeding is more in urban than in rural. Painful periods and delayed periods are the main menstrual problems prevalent in Pondicherry. Among the women who had menstrual problems, 48 percent sought treatment in the state, and the figures for urban and rural areas are 49 percent and 45 percent respectively. Private health facility is the main source of treatment for menstrual problems. Fifty-seven percent of women sought treatment at a private facility and 40 percent sought treatment from Government health facility. Two percent of the women had ISM treatment. Most of the women went to a doctor for treatment (92 percent).

### 8.4 Prevalence of RTI/STI by District

Table 8.9 presents the prevalence of RTIs/STIs among currently married women and their husbands by districts. The reported symptoms of RTIs/STIs among women is lowest in Yanam (6 percent) and highest in Karaikal (22 percent). The problems related to abnormal vaginal discharge ranges from three percent in Mahe and Yanam districts to 10 percent in Karaikal and Pondicherry districts.

| District | Percentage of women |  |  | Percentage of men |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | With any symptoms of RTI/STI | Reported any abnormal vaginal discharge | Sought treatment for abnormal vaginal discharge | With any symptoms of RTI/STI | Sought treatment for RTI/STI problems |
| Karaikal | 22.1 | 9.8 | 42.4 | 1.8 | (52.2) |
| Mahe | 19.7 | 3.0 | 76.8 | 1.0 | (42.8) |
| Pondicherry | 12.2 | 9.7 | 34.7 | 1.9 | (0.0) |
| Yanam | 6.1 | 3.3 | 70.6 | 0.2 | (100.0) |
| Pondicherry | 12.8 | 8.3 | 35.4 | 1.4 | (28.9) |

In comparison to women, fewer men (1 percent) from all districts of Pondicherry reported about the symptoms of RTIs/STIs. Less than one percent of men in Yanam reported about the prevalence of symptoms of RTI/STI. Men in Karaikal and Pondicherry (2 percent each) reported the highest prevalence of RTIs/STIs symptoms. In all the districts prevalence of reported RTIs/STIs symptoms are more in women than in men.

The percentage of women who have sought treatment for RTI/STI (abnormal vaginal discharge) ranges from 35 percent in Pondicherry district to 77 per cent in Mahe.

### 8.5 HIV/AIDS

Acquired Immune Deficiency Syndrome (AIDS) is an illness caused by the Human Immune Virus (HIV), which weakens the immune system and leads to death through secondary infection such as tuberculosis or pneumonia. The virus is generally transmitted through sexual contact, through the placenta of HIV-infected women to their children, or through contact with contaminated needle (injections) or blood. Prevalence of HIV and AIDS has been on the rise for more than a decade in India and has reached alarming proportions in recent years. To prevent HIV transmission, the government has been making various efforts.

DLHS-RCH has collected information on the general state of awareness of HIV/AIDS, its transmission, its prevention and common misconceptions about HIV/AIDS. All the currently married women in the age group 15-44, and their husbands were first asked if they had ever heard of an illness called HIV/AIDS. Respondents who had heard of HIV/AIDS were further asked about their source of information, mode of transmission and correct knowledge of HIV/AIDS transmission.

### 8.5.1 Knowledge of HIV/AIDS

Table 8.10 shows the percentage of women who had heard about HIV/AIDS by some selected background characteristics. Ninety-eight percent of currently married women in Pondicherry have heard of HIV/AIDS, which is one percentage point higher than RCH Round-I. In Round-I 97 percent of currently married women were aware of HIV/AIDS.

Knowledge of HIV/AIDS is slightly lower among women from non-literate, Hindu religion, other caste, households with a low standard of living, and older women. Knowledge of HIV/AIDS increased with increase in educational level and household standard of living. Ninety-four percent of non-literate women had heard of HIV/AIDS against 100 percent of women who had completed 10 or more years of schooling. Similarly, 96 percent of women with a low standard of living had heard of HIV/AIDS against 99 percent of women with a high standard of living. Ninety-eight percent of Hindu women, 99 percent of Muslim and 100 percent of Christian were aware of HIV/AIDS. Women from scheduled caste and other backward caste category were more knowledgeable about HIV/AIDS (98 percent each) than women belonging to other castes ( 96 percent).

The government has been using mass media, such as television, radio, and newspaper extensively to increase awareness among the general public about HIV/AIDS and its prevention. Table 8.10 shows the percentage of currently married women who were aware of HIV/AIDS from different sources. The most prominent source of information about HIV/AIDS is television. Eighty-nine percent of women reported that television was their source of information about HIV/AIDS followed by relatives or friends ( 52 percent), newspapers or books or magazines ( 38 percent), radio ( 34 percent) and slogans or pamphlets, posters or wall hoardings (27 percent). Seven percent of the women reported that they acquired knowledge about HIV/AIDS either from community meetings or by a health worker or doctor. A comparatively high proportion of rural women received information about HIV/AIDS from community meetings, and relatives or friends than that of urban women.

## Table 8.10 SOURCE OF KNOWLEDGE ABOUT HIVIAIDS AMONG WOMEN

Percentage of currently married women aged 15-44 years who have heard about HIVIAIDS and percentage who received information from specific sources by selected background characteristics, Pondicherry, 2002-04.

| Background characteristic | Percentage who have heard about HIVIAIDS | Number of Women | Among those who have heard about HIV/AIDS, percentage who received information from |  |  |  |  |  |  |  |  |  | Number of women who have heard about HIVIAIDS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Radio | Television | Newspaper/ Books/ Magazines | Slogan/ <br> Pamphlets/ <br> Posters/ <br> Wall <br> Hoardings | Doctor | Health worker | School teacher | Community Meeting | Relative/ Friends | Others |  |
| Age group (in years) |  |  |  |  |  |  |  |  |  |  |  |  |  |
| < 25 | 98.8 | 653 | 36.5 | 88.4 | 41.6 | 28.3 | 4.5 | 8.8 | 2.6 | 5.8 | 48.9 | 4.3 | 645 |
| 25-29 | 98.4 | 834 | 34.4 | 90.6 | 39.8 | 27.9 | 8.0 | 5.1 | 3.9 | 7.1 | 51.3 | 2.2 | 821 |
| 30-34 | 99.0 | 790 | 31.4 | 88.5 | 35.6 | 27.4 | 8.3 | 6.1 | 3.3 | 7.3 | 52.2 | 2.1 | 782 |
| 35-39 | 97.7 | 726 | 35.5 | 90.2 | 36.3 | 27.9 | 4.7 | 5.0 | 3.8 | 7.9 | 51.4 | 3.4 | 710 |
| 40-44 | 97.7 | 643 | 34.0 | 86.9 | 37.3 | 23.2 | 6.2 | 8.3 | 3.1 | 5.5 | 54.7 | 2.8 | 629 |
| Residence |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rural | 98.4 | 738 | 34.0 | 79.7 | 18.2 | 16.2 | 4.9 | 7.8 | 3.4 | 10.8 | 65.4 | 3.5 | 726 |
| Urban | 98.3 | 2,909 | 34.3 | 91.4 | 43.1 | 29.8 | 6.9 | 6.2 | 3.4 | 5.8 | 48.2 | 2.7 | 2,861 |
| Education |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Non-literate | 94.2 | 654 | 23.7 | 73.9 | 3.9 | 5.1 | 1.7 | 3.4 | 1.0 | 5.4 | 70.4 | 2.0 | 616 |
| 0-9@ years | 98.5 | 1,385 | 31.2 | 87.3 | 25.3 | 22.3 | 5.1 | 7.3 | 2.4 | 6.7 | 50.5 | 3.3 | 1,365 |
| 10 and above | 99.9 | 1,607 | 40.9 | 96.3 | 62.0 | 39.5 | 9.4 | 7.0 | 5.1 | 7.5 | 45.5 | 2.9 | 1,606 |
| Religion |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hindu | 98.2 | 3,125 | 34.0 | 88.2 | 37.0 | 24.9 | 6.5 | 6.2 | 3.2 | 6.9 | 52.6 | 2.4 | 3,069 |
| Muslim | 98.9 | 300 | 38.4 | 94.0 | 41.7 | 42.6 | 6.7 | 11.5 | 3.7 | 7.8 | 43.8 | 6.9 | 296 |
| Christian | 99.5 | 201 | 30.9 | 92.2 | 46.7 | 32.1 | 5.8 | 3.7 | 6.2 | 4.2 | 50.1 | 2.9 | 200 |
| Casteltribe\# |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Scheduled caste | 98.4 | 738 | 35.1 | 78.9 | 23.3 | 17.2 | 5.6 | 7.6 | 3.9 | 11.2 | 61.2 | 3.7 | 726 |
| Other backward class | 98.4 | 2,807 | 33.6 | 91.6 | 40.9 | 28.6 | 6.8 | 6.2 | 3.3 | 5.7 | 49.6 | 2.7 | 2,762 |
| Other | 96.2 | 75 | 56.5 | 90.4 | 69.7 | 66.0 | 1.4 | 7.7 | 2.4 | 5.7 | 43.4 | 0.3 | 73 |
| Standard of living index |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Low | 95.8 | 464 | 29.4 | 58.1 | 11.9 | 11.8 | 2.1 | 7.8 | 2.5 | 10.2 | 66.1 | 3.1 | 444 |
| Medium | 97.1 | 961 | 31.5 | 84.2 | 25.8 | 18.4 | 5.9 | 6.8 | 2.3 | 8.4 | 58.0 | 2.4 | 933 |
| High | 99.4 | 2,223 | 36.4 | 97.2 | 48.5 | 33.8 | 7.6 | 6.2 | 4.0 | 5.4 | 46.1 | 3.1 | 2,209 |
| Total | 98.3 | 3,647 | 34.3 | 89.0 | 38.1 | 27.1 | 6.5 | 6.5 | 3.4 | 6.8 | 51.7 | 2.9 | 3,587 |

 women with other category in caste/tribe who have heard about HIVIAIDS were not shown separately.

Table 8.11 and Figure 8.4 shows the percentage of husbands of currently married women who had heard about HIV/AIDS. In Pondicherry, the proportion of men (100 percent) who had heard about HIV/AIDS is slightly higher than that of women ( 98 percent). It has been increased by 28 percent points from Round-I (72 percent).

Figure 8.4
Awarness of HIVIAIDS by Sex According to Residence


About 100 percent of urban men and 99 percent of rural men had heard about HIV/AIDS. Knowledge of HIV/AIDS is not varied much by men's age, it is 99 percent for the age group 45 and above years and 100 percent in the age group of less than 25 years and 35-44 years. Awareness of HIV/AIDS is also not varied much by standard of living households. Ninety-eight percent of non-literate men had heard of HIV/AIDS, and it increased up to 100 percent for literate men with 0-9 years of education and who had completed 10 or more years of schooling.

Table 8.11 also shows the percentage of husbands of currently married women who were aware of HIV/AIDS by different sources. As reported by the men of Pondicherry, the most prominent source of information of HIV/AIDS were Television (91 percent) and newspapers/books/magazines ( 67 percent) followed by radio and slogans or pamphlets, posters or wall hoardings (44 percent each). Other important sources of information of HIV/AIDS are the relatives/friends (40 percent) and community meetings (10 percent). Seven percent of men reported that doctor had informed them about HIV/AIDS and six percent of men had received information of HIV/AIDS from health worker and two percent from school teacher and 'other' sources.

| Percentage of husbands of currently married women who have heard about HIVIAIDS and percentage who received information from specific sources by selected background characteristics, Pondicherry, 2002-04. |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Among those who have heard about HIVIAIDS, percentage who received information from |  |  |  |  |  |  |  |  |  | Number of men who have heard about HIVIAIDS |
| Background Characteristic | Percentage who have heard about HIVIAIDS | Number of men | Radio | Television | Newspaper / Books/ Magazines | Slogan/ <br> Pamphlets/ <br> Posters/ Wall Hoardings | Doctor | Health worker | School teacher | $\begin{aligned} & \text { Commun } \\ & \text {-ity } \\ & \text { Meeting } \end{aligned}$ | Relative/ Friends | Others |  |
| Age group (in years) |  |  |  |  |  |  |  |  |  |  |  |  |  |
| $<25$ | 100.0 | 56 | 38.8 | 86.8 | 64.7 | 38.0 | 16.2 | 6.3 | 1.9 | 3.0 | 49.0 | 1.5 | 56 |
| 25-34 | 99.4 | 874 | 45.1 | 91.6 | 66.5 | 43.5 | 6.4 | 5.4 | 1.6 | 9.8 | 40.4 | 1.8 | 869 |
| 35-44 | 99.7 | 1,221 | 44.7 | 92.6 | 68.1 | 45.5 | 6.6 | 7.2 | 2.1 | 10.8 | 41.0 | 2.1 | 1,217 |
| 45+ | 99.4 | 621 | 42.9 | 89.0 | 66.6 | 40.7 | 5.4 | 4.3 | 1.7 | 8.4 | 36.5 | 1.4 | 618 |
| Residence |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Rural | 99.2 | 688 | 33.3 | 88.0 | 56.9 | 35.7 | 5.2 | 10.2 | 2.9 | 5.6 | 37.2 | 2.3 | 683 |
| Urban | 99.7 | 2,085 | 47.9 | 92.4 | 70.6 | 46.2 | 6.9 | 4.6 | 1.5 | 11.1 | 40.9 | 1.7 | 2,078 |
| Education 2,085 |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Non-literate | 98.0 | 282 | 28.3 | 72.8 | 7.3 | 0.8 | 0.7 | 5.7 | 1.1 | 5.6 | 54.0 | 0.5 | 276 |
| 0-9@ years | 99.7 | 1,100 | 36.8 | 90.3 | 53.0 | 35.4 | 3.9 | 5.4 | 1.5 | 7.1 | 40.8 | 1.8 | 1,096 |
| 10 and above | 99.8 | 1,391 | 53.4 | 95.8 | 90.3 | 58.6 | 9.7 | 6.5 | 2.2 | 12.7 | 36.5 | 2.1 | 1,388 |
| Religion |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hindu | 99.5 | 2,422 | 43.0 | 90.7 | 65.8 | 42.8 | 5.8 | 5.6 | 1.8 | 9.5 | 40.1 | 1.7 | 2,410 |
| Muslim | 99.8 | 176 | 53.7 | 96.1 | 71.2 | 44.8 | 9.8 | 6.5 | 3.7 | 11.7 | 35.7 | 4.2 | 175 |
| Casteltribe\# 100 20.0 |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Scheduled caste | 99.6 | 603 | 43.1 | 85.6 | 61.2 | 41.5 | 6.3 | 9.0 | 2.7 | 8.7 | 40.0 | 1.6 | 600 |
| Other backward class | 99.5 | 2,098 | 44.4 | 93.0 | 68.4 | 44.4 | 6.0 | 5.1 | 1.6 | 9.8 | 38.9 | 2.0 | 2,089 |
| Other | 99.7 | 58 | 54.4 | 86.8 | 80.5 | 38.1 | 22.2 | 4.5 | 2.3 | 20.2 | 71.6 | 0.2 | 58 |
| Standard of living index |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Low | 98.6 | 387 | 37.3 | 72.4 | 42.9 | 20.3 | 4.1 | 7.5 | 1.8 | 7.4 | 43.3 | 1.9 | 382 |
| Medium | 99.2 | 766 | 41.3 | 91.3 | 53.5 | 34.3 | 3.4 | 5.5 | 1.7 | 7.8 | 45.5 | 2.0 | 760 |
| High | 99.9 | 1,621 | 47.4 | 95.8 | 79.3 | 53.5 | 8.5 | 5.8 | 1.9 | 11.2 | 36.6 | 1.7 | 1,619 |
| Total | 99.6 | 2,773 | 44.3 | 91.3 | 67.2 | 43.6 | 6.5 | 6.0 | 1.8 | 9.8 | 40.0 | 1.8 | 2,761 |
| Note: @ Literate men with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Table includes 21 cases of other religion and 6 case of scheduled tribe category on caste who have heard about HIVIAIDS were not shown separately. |  |  |  |  |  |  |  |  |  |  |  |  |  |

tribe category on caste who have heard about HIVIAIDS were not shown separately.

A higher proportion of rural men received information about HIV/AIDS from Health workers and community meetings than urban men. The information on awareness of HIV/AIDS through mass media, such as television and newspapers or books or magazines was received more by men aged 44 or less years, urban men, and men from Christian religion and 'other castes' category, men with at least 10 or more years of schooling, and men from households with a high standard of living. Younger men below age 25, non-literate men, Christian men, men from other castes and men from households with a medium standard of living received more information from relatives/friends.

### 8.5.2 Knowledge of Mode of Transmission about HIV/AIDS

Women who were aware of HIV/AIDS were asked about the mode of transmission and this is presented in Table 8.12. Among women who reported awareness of HIV/AIDS, about one percent ( 0.8 percent) of them did not know about the mode of transmission.
Table 8.12 SOURCE OF KNOWLEDGE ABOUT MODE OF TRANSMISSION OF HIVIAIDS AMONG WOMEN
Percentage of currently married women aged 15-44 years who have heard of HIV/AIDS, knowledge of mode of transmission by selected background characteristics, Pondicherry, 2002-04

|  | Percentage by knowledge of mode of transmission |  |  |  |  |  |  | Number |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Background characteristic | Homo sexual intercourse | Hetero sexual intercourse | Needles/ blade/ skin puncture | Mother to child | Transfusion of infected blood | Others | $\begin{gathered} \text { Do } \\ \text { not } \\ \text { know } \end{gathered}$ | women who have heard of HIVIAIDS |


| Age (in years) |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| <25 | 4.9 | 95.0 | 54.3 | 16.7 | 48.2 | 4.3 | 0.7 | 645 |
| 25-29 | 6.4 | 95.8 | 60.6 | 18.2 | 54.2 | 3.9 | 0.4 | 821 |
| 30-34 | 5.6 | 96.1 | 52.7 | 14.5 | 49.2 | 2.7 | 0.3 | 782 |
| 35-39 | 6.4 | 95.7 | 56.3 | 12.7 | 45.0 | 3.3 | 1.7 | 710 |
| 40-44 | 5.7 | 96.4 | 48.9 | 12.6 | 42.9 | 4.0 | 1.1 | 629 |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 2.1 | 95.9 | 39.5 | 8.8 | 28.2 | 3.0 | 2.2 | 726 |
| Urban | 6.8 | 95.8 | 58.7 | 16.6 | 53.3 | 3.7 | 0.4 | 2,861 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 3.2 | 95.1 | 18.3 | 2.9 | 10.8 | 1.6 | 2.3 | 616 |
| 0-9@ years | 5.4 | 95.1 | 42.5 | 8.4 | 34.3 | 3.1 | 0.7 | 1,365 |
| 10 years and above | 7.3 | 96.7 | 79.4 | 25.4 | 74.4 | 4.8 | 0.3 | 1,606 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 5.2 | 96.2 | 54.5 | 14.9 | 48.0 | 3.3 | 0.7 | 3,069 |
| Muslim | 15.4 | 89.5 | 55.8 | 16.8 | 45.7 | 5.0 | 2.3 | 296 |
| Christian | 1.6 | 99.3 | 58.0 | 16.5 | 51.8 | 6.4 | 0.2 | 200 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 4.0 | 95.2 | 43.9 | 12.4 | 34.0 | 3.3 | 1.5 | 726 |
| Other backward class | 6.0 | 96.1 | 57.1 | 14.3 | 51.2 | 3.7 | 0.6 | 2,762 |
| Other | 12.7 | 93.0 | 73.8 | 64.3 | 70.7 | 0.9 | 0.5 | 73 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 2.4 | 95.3 | 29.7 | 9.0 | 19.2 | 2.7 | 2.2 | 444 |
| Medium | 6.9 | 94.4 | 41.7 | 10.1 | 32.7 | 2.5 | 1.2 | 933 |
| High | 6.1 | 96.5 | 65.4 | 18.4 | 60.6 | 4.2 | 0.3 | 2,209 |
| Total | 5.8 | 95.8 | 54.8 | 15.1 | 48.2 | 3.6 | 0.8 | 3,587 |

Note: @ Literate women with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 22 cases of other religion and 12 cases of scheduled tribe on caste who were not shown separately.

This proportion is relatively higher among rural women, women in 35-39 years, non-literate women, Muslim women, women from scheduled caste and women with a low standard of living. Two percent of the rural women do not know about the mode of transmission of HIV/AIDS compared to less than one percent of urban women.

Among women who reported different ways of transmission of HIV/AIDS, a large proportion (96 percent) mentioned heterosexual intercourse as a mode of transmission. All the socio-economic groups reported that heterosexual intercourse was the main mode of transmission of HIV/AIDS. Other modes reported by women were transmission through needle or blade or skin puncture ( 55 percent), transfusion of infected blood ( 48 percent), mother to child, if pregnancy occurs during a stage of HIV (15 percent); only five percent of the women mentioned that homosexual intercourse could also be a mode of transmission. Only four percent stated that there were other ways of transmission of HIV/AIDS. Generally knowledge of all specific mode of transmission is more among women age 25-29 years, urban women, literate women with 10 or more years of schooling, Christian women and women from high standard of living as compared to their counterparts.

Table 8.13 SOURCE OF KNOWLEDGE ABOUT MODE OF TRANSMISSION OF HIVIAIDS AMONG MEN
Percentage of husbands of currently married women who have heard of HIVIAIDS, knowledge of mode of transmission by selected background characteristics, Pondicherry, 2002-04

| Background characteristic | Percentage by knowledge of mode of transmission |  |  |  |  |  |  | Number of men who have heard of HIVIAIDS |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Homosexual intercourse | Heterosexual intercourse | Needles/ blade/ skin puncture | Mother to child | Transfusion of infected blood | Others | Do not know |  |
| Age (in years) |  |  |  |  |  |  |  |  |
| <25 | 7.0 | 97.1 | 52.2 | 12.0 | 59.0 | 4.5 | 0.0 | 56 |
| 25-34 | 3.1 | 98.8 | 59.1 | 13.0 | 53.4 | 1.5 | 0.4 | 869 |
| 35-44 | 5.2 | 98.1 | 56.2 | 14.7 | 54.1 | 1.6 | 0.7 | 1217 |
| 45+ | 4.2 | 97.9 | 48.8 | 14.8 | 43.6 | 2.6 | 0.8 | 618 |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 2.1 | 97.6 | 51.6 | 9.4 | 42.2 | 3.1 | 0.8 | 683 |
| Urban | 5.1 | 98.5 | 56.6 | 15.7 | 54.8 | 1.4 | 0.8 | 2,078 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 0.1 | 98.3 | 25.5 | 2.0 | 18.0 | 0.6 | 1.2 | 276 |
| 0-9@ years | 2.6 | 97.9 | 42.2 | 7.5 | 39.4 | 1.9 | 0.7 | 1,096 |
| 10 years and above | 6.6 | 98.6 | 71.7 | 21.8 | 68.0 | 2.0 | 0.4 | 1,388 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 4.2 | 98.3 | 54.4 | 13.3 | 51.2 | 1.5 | 0.6 | 2,410 |
| Muslim | 7.2 | 97.0 | 54.2 | 17.5 | 44.9 | 6.3 | 0.3 | 175 |
| Christian | 4.7 | 98.8 | 65.1 | 20.6 | 59.6 | 2.4 | 0.3 | 154 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 2.7 | 96.5 | 51.6 | 9.3 | 42.3 | 2.0 | 1.7 | 600 |
| Other backward class | 4.7 | 98.8 | 55.8 | 15.0 | 53.9 | 1.8 | 0.3 | 2,089 |
| Other | 6.9 | 99.0 | 80.2 | 29.7 | 70.2 | 0.9 | 0.4 | 58 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 1.4 | 95.8 | 35.7 | 8.4 | 27.0 | 2.0 | 1.9 | 382 |
| Medium | 3.5 | 98.4 | 50.2 | 9.4 | 44.7 | 1.2 | 0.4 | 760 |
| High | 5.5 | 98.8 | 62.4 | 17.7 | 60.7 | 2.1 | 0.4 | 1,619 |
| Total | 4.4 | 98.3 | 55.4 | 14.1 | 51.6 | 1.8 | 0.6 | 2,761 |

Note: @ Literate men with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 21 cases about other in religion and 6 case of scheduled tribe on caste category are not shown separately.

Table 8.13 presents the knowledge about mode of transmission of HIV/AIDS among men. Less than one percent ( 0.6 percent) of the men who had heard about HIV/AIDS mentioned that they do not know the mode of transmission. The relatively high percentage of men not knowing the mode of transmission were non-literate, scheduled caste, and men from households with a low standard of living. Among whom reported ways of transmission of HIV/AIDS, 98 percent of them mentioned heterosexual intercourse as a mode of transmission. Other modes reported by men are transmission through needle or blade or skin puncture ( 55 percent), transfusion of infected blood (52 percent), mother to child if pregnancy occurs during a stage of HIV (14 percent) and homosexual intercourse (4 percent). Only two percent stated that there were other ways of transmission of HIV/AIDS. Generally knowledge of all specific modes of transmission of HIV/AIDS is more among urban men, literate with 10 or more years of schooling, men belong to other caste and household with high standard of living as compared to their counterparts.

### 8.5.3 How to avoid HIV/AIDS

All the respondents, male and female, were asked about how to prevent HIV/AIDS. The percentage of women who said that HIV/AIDS could be avoided by various ways has been presented in Table 8.14 by some selected background characteristics.

Among women who reported about awareness of HIV/AIDS, only two percent of them did not know how to avoid becoming infected by HIV/AIDS. This percentage is higher among rural women than among urban women. The percentage of women who did not know of any way to avoid infection decreases with increasing levels of education and household standard of living. Seven percent of non-literate women reported that they did not know of any way to avoid infection as compared to less than one percent ( 0.2 percent) of women who had completed ten or more years of schooling. Similarly, seven percent of women with a low standard of living stated that they did not know any way to avoid infection as compared to one percent of women with a high standard of living. The percentage of women who did not know ways to avoid infection is also relatively high among Hindu and Muslim women, scheduled caste and women in the age group of less than 25 years and women in 35-44 years.

Among women who mentioned ways to avoid HIV/AIDS, majority of women said that "sex with only one partner is the way to avoid it" (96 percent). Other ways to prevent HIV/AIDS mentioned by women were 'sterilizing needles and syringe before injecting' (52 percent), 'checking blood prior to transfusion' ( 48 percent), 'using a condom correctly during each sexual intercourse' ( 14 percent) and only 10 percent of the women reported that the pregnancy should be avoided if couples were infected by HIV/AIDS. All the specific ways to avoid becoming infected by HIV/AIDS reported by women are proportionally higher in urban areas, women who belong to 'other castes' category, women with a high level of education and women with a high standard of living.

| Table 8.14 KNOWLEDGE ABOUT AVOIDANCE OF HIVIAIDS AMONG WOMEN |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Among currently married women aged 15-44 years who have heard about HIVIAIDS, the percentage of women reported HIVIAIDS can be avoided in specific ways by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
|  | Percentage reported HIV/AIDS can be avoided by |  |  |  |  |  |  |  |
| Background characteristic | Sex <br> With <br> Only one partner | Using condoms correctly during each sexual intercourse | Checking blood prior to transfusion | Sterilizing needles and syringes for injection | Avoiding pregnancy when having HIVIAIDS | Others | Do not know to avoid HIV/AIDS | Number of women |
| Age (in years) |  |  |  |  |  |  |  |  |
| <25 | 95.6 | 11.7 | 45.8 | 50.6 | 9.5 | 0.8 | 3.6 | 645 |
| 25-29 | 98.2 | 14.1 | 54.4 | 58.6 | 12.0 | 1.8 | 0.3 | 821 |
| 30-34 | 96.8 | 16.4 | 48.0 | 50.1 | 8.4 | 2.1 | 0.4 | 782 |
| 35-39 | 95.9 | 12.3 | 45.6 | 51.7 | 8.7 | 2.7 | 2.5 | 710 |
| 40-44 | 95.2 | 13.6 | 42.3 | 49.2 | 8.1 | 2.2 | 2.9 | 629 |
| Residence | 92.2 | 8.2 | 24.4 | 31.4 | 3.5 | 1.6 | 5.2 | 726 |
| Rural | 97.5 | 15.1 | 53.5 | 57.6 | 11.0 | 2.0 | 1.0 | 2,861 |
| Urban |  |  |  |  |  |  |  |  |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 90.7 | 3.5 | 9.3 | 13.7 | 1.6 | 0.7 | 6.8 | 616 |
| 0-9@ years | 96.0 | 8.5 | 33.2 | 39.5 | 5.2 | 1.7 | 1.5 | 1,365 |
| 10 years and above | 98.9 | 22.1 | 74.5 | 78.0 | 16.1 | 2.6 | 0.2 | 1,606 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 96.6 | 13.5 | 47.4 | 51.7 | 9.4 | 1.8 | 1.9 | 3,069 |
| Muslim | 93.6 | 16.0 | 45.5 | 52.4 | 10.5 | 3.3 | 2.1 | 296 |
| Christian | 99.9 | 11.4 | 51.1 | 59.5 | 10.1 | 1.8 | 0.0 | 200 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 91.6 | 10.7 | 30.5 | 39.0 | 7.1 | 1.6 | 4.7 | 726 |
| Other backward class | 97.7 | 13.6 | 51.2 | 55.1 | 9.0 | 2.0 | 1.1 | 2,762 |
| Other | 97.5 | 40.9 | 73.1 | 70.1 | 52.6 | 2.0 | 0.5 | 73 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 90.1 | 7.6 | 17.9 | 26.8 | 4.4 | 0.8 | 6.5 | 444 |
| Medium | 95.2 | 8.9 | 32.1 | 38.0 | 5.9 | 1.4 | 2.8 | 933 |
| High | 98.2 | 17.0 | 60.2 | 63.4 | 12.0 | 2.4 | 0.5 | 2,209 |
| Total | 96.4 | 13.7 | 47.6 | 52.3 | 9.5 | 1.9 | 1.8 | 3,587 |
| Note: @ Literate women with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 22 cases about other in religion and 12 case of scheduled tribe on caste category were not shown separately. |  |  |  |  |  |  |  |  |

Table 8.15 shows the percentage of men who reported that HIV/AIDS could be avoided by some selected background characteristics. Among men who are aware of HIV/AIDS, less than one percent ( 0.4 percent) of them did not know of any method to avoid infection, compared to two percent of women in the state.

In Pondicherry a higher proportion of men reported that 'sex with only one partner' is the way to avoid HIV/AIDS (98 percent) and this was the most commonly reported way to avoid HIV/AIDS in all the groups.

Other ways to prevent by HIV/AIDS mentioned by men are 'checking blood prior to transfusion'(52 percent), 'sterilizing needles and syringe before injecting’ (51 percent) and 'using a condom correctly during each sexual intercourse' (40 percent). All the specific ways to avoid becoming infected by HIV/AIDS reported by men are proportionally higher in urban areas than in rural areas except using condoms correctly during each sexual intercourse, and among men who belong to Christian, men with a high level of education and men with a high standard of living. Rural, Muslim and scheduled caste men were more likely to report using a condom correctly during each sexual intercourse than urban, Hindu and other backward caste.

| Among husbands of currently married women who have heard about HIV/AIDS, the percentage of men reported HIV/AIDS can be avoided in specific ways by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Percentage reported HIVIAIDS can be avoided by |  |  |  |  |  |  |  |
| Background characteristic | Sex with only one partner | Using condoms correctly during each sexual intercourse | Checking blood prior to transfusion | Sterilizing needles and syringes for injection | Avoiding pregnancy when having HIVIAIDS | Others | Do not know to avoid HIVIAIDS | Number of men |
| Age (in years) |  |  |  |  |  |  |  |  |
| <25 | 98.6 | 33.0 | 53.2 | 46.8 | 7.6 | 0.5 | 0.3 | 56 |
| 25-34 | 97.9 | 42.2 | 52.5 | 53.1 | 9.7 | 1.3 | 0.3 | 869 |
| 35-44 | 98.5 | 40.6 | 55.0 | 53.7 | 11.6 | 1.2 | 0.2 | 1,217 |
| 45+ | 98.2 | 38.4 | 43.1 | 43.7 | 10.2 | 1.8 | 0.8 | 618 |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 97.2 | 57.9 | 40.2 | 40.2 | 3.3 | 1.3 | 0.3 | 683 |
| Urban | 98.6 | 34.7 | 55.2 | 54.7 | 13.0 | 1.4 | 0.4 | 2,078 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 97.7 | 19.9 | 18.3 | 24.4 | 1.7 | 0.1 | 1.9 | 276 |
| $0-9 @$ years | 98.1 | 34.9 | 38.6 | 37.8 | 4.8 | 1.1 | 0.3 | 1,096 |
| 10 years and above | 98.4 | 48.9 | 68.3 | 67.0 | 17.0 | 1.8 | 0.1 | 1,388 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 98.3 | 39.7 | 51.1 | 50.5 | 10.0 | 1.3 | 0.4 | 2,410 |
| Muslim | 95.7 | 49.0 | 45.6 | 46.4 | 13.9 | 3.3 | 0.7 | 175 |
| Christian | 98.8 | 38.5 | 57.4 | 59.5 | 15.3 | 0.3 | 0.0 | 154 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 97.8 | 43.1 | 43.0 | 43.8 | 6.8 | 1.1 | 0.6 | 600 |
| Other backward class | 98.3 | 39.6 | 53.6 | 52.6 | 11.5 | 1.4 | 0.3 | 2,089 |
| Other | 97.9 | 38.9 | 64.3 | 77.6 | 18.8 | 1.2 | 0.8 | 58 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 96.7 | 38.3 | 25.3 | 28.6 | 4.9 | 0.8 | 1.5 | 382 |
| Medium | 98.4 | 42.1 | 43.0 | 43.7 | 6.7 | 1.1 | 0.3 | 760 |
| High | 98.5 | 40.1 | 61.7 | 59.9 | 13.8 | 1.6 | 0.1 | 1,619 |
| Total | 98.2 | 40.4 | 51.5 | 51.1 | 10.6 | 1.4 | 0.4 | 2,761 |

Note: @ Literate men with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 21 cases about other in religion and 6 case of scheduled tribe on caste category are not shown separately.

### 8.5.4 Misconception about HIV/AIDS

People generally have misconceptions about the ways of transmission of HIV/AIDS, such as 'shaking hands with a person having AIDS', hugging and kissing with them, sharing their clothes or sharing eating utensils, stepping on urine/stool, through insect bites, for example, being bitten by mosquitoes, fleas and bedbugs. All these questions were asked to the respondents who had heard of HIV/AIDS.

Table 8.16 shows the percentage of women with misconceptions about spreading HIV/AIDS through specific ways by selected background characteristics. Being bitten by mosquitoes, fleas or bedbugs is commonly reported as the way of getting HIV/AIDS infection by women in all the groups, and this percentage is higher among rural areas (44 percent) than in urban areas (28 percent). Non-literate women, women from households with a low standard of living, Muslim women, and women from scheduled caste/other backward class mentioned this method of transmission more often. Other misconceptions about the spreading of HIV/AIDS were 'stepping on urine/stool' (20 percent), 'sharing eating utensils' (15 percent), 'sharing clothes’ and 'kissing’ (14 percent each), 'hugging’ (12 percent), and 'shaking hands’ (10 percent). The percentage of all these misconceptions is higher among rural women, women who belong to scheduled caste, Muslim women, non-literate women and women with a low standard of living.

| Among currently married women aged 15-44 years who have heard about HIVIAIDS, the percentage of women having misconception about the transmission of HIV/AIDS by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Percentage having misconception about the transmission of HIVIAIDS |  |  |  |  |  |  |  |
| Background characteristic | Shaking hands | Hugging | Kissing | Sharing clothes | Sharing eating utensils | Stepping on Urine / stool | Mosquito, flea, or bedbugs biting | Number of women |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 18.3 | 20.3 | 21.9 | 25.0 | 24.0 | 31.5 | 43.7 | 726 |
| Urban | 7.8 | 9.3 | 12.5 | 11.6 | 12.3 | 17.5 | 28.4 | 2,861 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 20.9 | 23.4 | 28.8 | 29.0 | 29.7 | 34.5 | 44.5 | 616 |
| 0-9@ years | 12.3 | 14.6 | 17.2 | 17.4 | 17.5 | 23.9 | 37.5 | 1,365 |
| 10 years and above | 3.7 | 4.4 | 6.5 | 6.2 | 6.5 | 11.9 | 21.4 | 1,606 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 10.1 | 11.8 | 14.2 | 14.0 | 14.3 | 19.9 | 30.9 | 3,069 |
| Muslim | 11.0 | 12.8 | 17.9 | 18.1 | 20.4 | 29.1 | 40.7 | 296 |
| Christian | 6.4 | 6.5 | 13.1 | 15.5 | 13.6 | 16.5 | 27.6 | 200 |
| Caste/tribe |  |  |  |  |  |  |  |  |
| Scheduled caste | 13.8 | 16.4 | 18.0 | 21.0 | 20.6 | 23.7 | 31.7 | 726 |
| Other backward class | 9.1 | 10.6 | 13.7 | 12.9 | 13.4 | 19.9 | 32.2 | 2,762 |
| Other | 2.5 | 3.1 | 5.0 | 3.6 | 4.3 | 7.2 | 9.5 | 73 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 17.3 | 20.9 | 26.7 | 28.3 | 28.7 | 33.9 | 44.1 | 444 |
| Medium | 12.8 | 15.0 | 17.4 | 16.2 | 17.1 | 22.2 | 34.6 | 933 |
| High | 7.2 | 8.2 | 10.6 | 10.7 | 10.8 | 16.8 | 27.7 | 2,209 |
| Total | 9.9 | 11.5 | 14.4 | 14.3 | 14.7 | 20.3 | 31.5 | 3,587 |
| Note: @ Literate women with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 22 cases about other in and 12 case of scheduled tribe on caste category were not shown separately. |  |  |  |  |  |  |  |  |

Table 8.17 presents the percentage of men with misconceptions about the spreading of HIV/AIDS through specific ways by selected background characteristics. Again, just like the women, men in all the groups reported that HIV/AIDS is transmitted through insect bites, mosquitoes, through flea or bedbugs. Thirty-six percent of the men in Pondicherry felt so. The percentage who reported that HIV/AIDS could be transmitted through the biting by mosquitoes or flees or bedbugs was higher among urban men ( 37 percent) than among rural men (33 percent). Non-literate, men from households with a medium and low standard of living, Hindu men, and scheduled caste men are of the impression that HIV/AIDS spreads when one is bitten by mosquitoes, fleas or bedbugs. Other misconceptions about the spread of HIV/AIDS are 'stepping on urine / stool’ (21 percent), 'sharing eating utensils’ and 'kissing’ (15 percent each), 'sharing clothes’ (12 percent), ‘hugging’ (8 percent), and 'shaking hands’ (7 percent). All the misconceptions reported by men except Mosquito, flea, or bedbugs biting and hugging are relatively lower than those reported by women. The percentage of all these misconceptions is also higher among rural men, men who belong to scheduled caste, Muslim men, non-literate men and men with a low standard of living.

| Table 8.17 MISCONCEPTION ABOUT TRANSMISSION OF HIVIAIDS AMONG MEN |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Among husbands of currently married women who have heard about HIVIAIDS, the percentage of men having misconception about the transmission of HIV/AIDS by selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
|  | Percentage having misconception about the transmission of HIVIAIDS |  |  |  |  |  |  |  |
| Background characteristic | Shaking hands | Hugging | Kissing | Sharing clothes | Sharing eating utensils | Stepping on Urine / stool | Mosquito, flea, or bedbugs biting | Number of men |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 13.2 | 15.2 | 21.7 | 22.0 | 23.2 | 27.5 | 32.6 | 683 |
| Urban | 4.7 | 5.9 | 12.3 | 8.7 | 12.9 | 19.4 | 36.5 | 2,078 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 18.3 | 25.4 | 32.9 | 32.3 | 36.1 | 41.9 | 49.4 | 276 |
| 0-9@ years | 8.9 | 10.9 | 19.5 | 15.6 | 20.4 | 28.9 | 44.8 | 1,096 |
| 10 years and above | 2.8 | 2.7 | 7.2 | 5.1 | 7.4 | 11.3 | 25.5 | 1,388 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 6.6 | 8.1 | 14.6 | 11.8 | 15.6 | 21.5 | 36.2 | 2,410 |
| Muslim | 12.6 | 10.8 | 16.9 | 14.7 | 16.4 | 21.8 | 35.1 | 175 |
| Christian | 4.0 | 8.2 | 15.2 | 14.0 | 14.3 | 21.6 | 31.1 | 154 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 12.7 | 14.9 | 21.2 | 18.5 | 22.4 | 24.6 | 39.0 | 600 |
| Other backward class | 5.2 | 6.4 | 13.1 | 10.4 | 13.9 | 20.9 | 35.3 | 2,089 |
| Other | 1.3 | 2.1 | 2.9 | 2.1 | 1.6 | 1.7 | 7.4 | 58 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 16.9 | 21.4 | 27.5 | 26.8 | 29.3 | 33.8 | 39.7 | 382 |
| Medium | 9.6 | 11.4 | 19.1 | 15.7 | 20.9 | 28.0 | 41.0 | 760 |
| High | 3.1 | 3.6 | 9.5 | 6.8 | 9.6 | 15.3 | 32.0 | 1,619 |
| Total | 6.8 | 8.2 | 14.6 | 12.0 | 15.4 | 21.4 | 35.5 | 2,761 |
| Note: @ Literate men with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 21 cases about other category in religion and 6 case of scheduled tribe on caste category were not shown separately. |  |  |  |  |  |  |  |  |

### 8.5.5 Knowledge of Curability of HIV/AIDS

Table 8.18 shows the percentage distribution of currently married women and their husbands who have heard about HIV/AIDS by knowledge of curability of the same, according to some selected background characteristics. Around 20 percent women and men have the notion that HIV/AIDS is curable, whereas 70 percent women and 76 percent men replied that the disease is not curable. Ten percent of women and five percent of men do not have any idea regarding the curability of the disease. It can be safely asserted from the figures that both men and women of urban area, having high level of education, other caste, and households of low and high standard of living are showing better performance as far as the knowledge of curability of HIV/AIDS is concerned. Hindu/Muslim women and Christian men are having better knowledge about the curability of the disease.

| Table 8.18 KNOWLEDGE OF CURABILITY ABOUT HIVIAIDS |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Among currently married women and their husbands, who have heard about HIV/AIDS, percent distribution of respondents by knowledge of curability about HIVIAIDS, according to some selected background characteristics, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
|  | Percent distribution of women |  |  | Number of women | Percent distribution of men |  |  | Number of men |
| Background characteristic | Yes | No | Do not know |  | Yes | No | Do not know |  |
| Residence |  |  |  |  |  |  |  |  |
| Rural | 24.5 | 55.9 | 19.6 | 726 | 26.8 | 70.4 | 2.9 | 683 |
| Urban | 19.3 | 72.9 | 7.8 | 2,861 | 17.1 | 77.7 | 5.2 | 2,078 |
| Education |  |  |  |  |  |  |  |  |
| Non-literate | 19.8 | 58.4 | 21.7 | 616 | 25.9 | 61.3 | 12.8 | 276 |
| 0-9@ years | 22.4 | 65.4 | 12.2 | 1,365 | 22.6 | 70.8 | 6.5 | 1,096 |
| 10 years and above | 18.8 | 77.2 | 4.0 | 1,606 | 15.7 | 82.8 | 1.5 | 1,388 |
| Religion |  |  |  |  |  |  |  |  |
| Hindu | 20.2 | 69.3 | 10.5 | 3,069 | 19.8 | 75.5 | 4.7 | 2,410 |
| Muslim | 20.6 | 66.5 | 12.8 | 296 | 25.0 | 71.0 | 3.7 | 175 |
| Christian | 24.5 | 73.0 | 2.5 | 200 | 11.5 | 83.5 | 5.1 | 154 |
| Caste/tribe\# |  |  |  |  |  |  |  |  |
| Scheduled caste | 15.1 | 69.3 | 15.5 | 726 | 18.4 | 77.8 | 3.8 | 600 |
| Other backward class | 22.1 | 69.0 | 8.8 | 2,762 | 20.1 | 75.0 | 4.9 | 2,089 |
| Other | 5.3 | 85.6 | 9.1 | 73 | 3.6 | 91.9 | 4.5 | 58 |
| Standard of living index |  |  |  |  |  |  |  |  |
| Low | 20.3 | 56.8 | 23.0 | 444 | 17.1 | 74.9 | 7.7 | 382 |
| Medium | 20.6 | 66.1 | 13.3 | 933 | 23.7 | 71.2 | 5.0 | 760 |
| High | 20.2 | 73.5 | 6.3 | 2,209 | 18.1 | 78.3 | 3.7 | 1,619 |
| Total | 20.3 | 69.5 | 10.2 | 3,587 | 19.5 | 75.9 | 4.6 | 2,761 |

Note: @ Literate persons with no year of schooling are also included. \#Total figure may not add to N due to do not know cases. Total includes 21 cases about other category in religion and 6 case of scheduled tribe on caste category were not shown separately.

### 8.6 Awareness of RTI/STI and HIV/AIDS by District

Table 8.19 shows the percentage distribution of currently married women and their husbands who are aware of RTI/STI and HIV/AIDS by districts.

According to DLHS, 39 percent and 98 percent of women were aware of RTI/STI and HIV/AIDS respectively and the corresponding figures for husbands of eligible women are 82 and 100 percent respectively. The awareness of RTI/STI and HIV/AIDS among men is higher than that among women by 43 and one percentage points.

In general, in all of the districts men are more aware of RTI/STI than women and equal awareness about HIV/AIDS. The highest level of awareness about RTI/STI among women was reported in Mahe ( 52 percent) followed by Karaikal ( 43 percent) and Yanam ( 35 percent) to the lowest in Pondicherry ( 34 percent). Among men the highest level of awareness of RTI/STI was reported in Pondicherry ( 87 percent) followed by Mahe ( 81 percent) and Karaikal ( 65 percent) to the lowest in Yanam (39 percent).

The proportion of husbands of eligible women for currently married women ages 15-44 who are aware of HIV/AIDS in the districts of Pondicherry state are also presented Table 8.19. Among women the awareness about HIV/AIDS ranges from the 100 percent in Mahe to the lowest of 85 percent in Yanam. A maximum level of awareness of HIV/AIDS, i.e. 100 percent was reported by men in Karaikal, Mahe and Pondicherry and 99 percent in Yanam.

| Table 8.19 AWARENESS OF RTIISTI AND HIVIAIDS BY DISTRICT |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Percentage of currently married women and their husbands aware of RTI/STI and HIVIAIDS by district, Pondicherry, 2002-04 |  |  |  |  |
|  | Percentage of women |  | Percentage of men |  |
| District | Aware of RTI/STI | Aware of HIVIAIDS | Aware of RTI/STI | Aware of HIVIAIDS |
| Karaikal | 42.9 | 96.4 | 65.3 | 99.5 |
| Mahe | 52.3 | 99.6 | 80.7 | 99.5 |
| Pondicherry | 33.7 | 99.3 | 87.3 | 99.5 |
| Yanam | 34.6 | 85.2 | 39.1 | 99.3 |
| Pondicherry | 38.6 | 98.3 | 82.0 | 99.6 |

## Appendix-A

## Sampling Error Estimation

The accuracy of programme indicators such as contraceptive prevalence rate, unmet need and institutional delivery, antenatal coverage etc. estimated from DLHS-RCH can be assessed in terms of stability of the estimated indicators as measured by the standard errors. Standard errors reflect only the appropriateness and suitability of sampling design adopted for RCH survey. However, the accuracy of estimated programme indicator are also affected to a great extent by non-sampling errors arising from lack of proper operationalisation and nonresponse cases, and is inherent in large scale surveys. The estimation producers of District Level Reproductive \& Child Health survey takes into consideration design appropriateness and non-response rates. DLHS-RCH estimator of a programme indicators is design as

$$
\begin{equation*}
\mathrm{r}=\frac{\sum_{h} \sum_{j} \sum_{i} w_{h i j} y_{h j i}}{\sum_{h} \sum_{j} \sum_{i} w_{h j i} X_{h i i}}=\frac{y}{x} \tag{1}
\end{equation*}
$$

where the cell (h, j, i) stands for $\mathrm{i}^{\text {th }}$ observational unit in $\mathrm{j}^{\text {th }}$ primary sampling unit (PSU) in $\mathrm{h}^{\text {th }}$ stratum, basically rural-urban areas of a district are taken as strata. $\mathrm{W}_{\mathrm{hij}}$ is the sampling weight of $(h, j, i)^{\text {th }}$ cell inflated by response rates. The variables $y$ and $x$ denote the main and the auxiliary characteristics required for computation of proportion or ratios.

The equation for estimation of variance of programme indicator ( r ) is obtained after Taylor series linearisation as

$$
\begin{array}{r}
\operatorname{var}(\mathrm{r})=\frac{1}{x^{2}}\left[\operatorname{var}(\mathrm{y})+\mathrm{r}^{2} \operatorname{var}(\mathrm{x})-2 \mathrm{r} \operatorname{cov}(\mathrm{y}, \mathrm{x})\right] \ldots \ldots \ldots \ldots \ldots \ldots \ldots \\
\operatorname{var}(\mathrm{y})=\sum_{h} \frac{n_{h}}{n_{h}-1}\left[\sum_{j} \sum_{i}\left(w_{h j i} y_{h i j}\right)^{2}-\frac{\left(\sum_{j} \sum_{i} w_{h j i} y_{h j i}\right)^{2}}{n_{h}}\right] \ldots \\
\operatorname{cov}(\mathrm{y}, \mathrm{x})=\sum_{h} \frac{n_{h}}{n_{h}-1}\left[\sum_{j} \sum_{i} w_{h j i}^{2} y_{h j i} x_{h j i}-\frac{\left(\sum_{j} \sum_{i} w_{h j i} y_{h j i}\right)\left(\sum_{j} \sum_{i} w_{h j i} x_{h j i}\right)}{n_{h}}\right] \tag{4}
\end{array}
$$

and $n_{h}$ is the number of sampled PSUs representing rural or urban areas of a district/state.

List of Selected Programme Variables for Sampling Errors, RCH 2002-04

| Variable | Estimate | Base Population |
| :--- | :--- | :--- |
| CPR (Any Method) | Proportion | Currently married women age 15-44 years |
| Unmet Need | Proportion | Currently married women age 15-44 years |
| Any ANC | Proportion | Last live/still births of the past three years |
| ANC3+ | Proportion | Last live/still births of the past three years |
| Institutional Delivery | Proportion | Last live/still births of the past three years |
| Safe Delivery | Proportion | Last live/still births of the past three years |
| BCG | Proportion | Children age 12-23 months |
| Measles | Proportion | Children age 12-23 months <br> BO3+ |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Variables | Estimate <br> (R) | $\begin{aligned} & \text { Sampling } \\ & \text { error (SE) } \end{aligned}$ | Number of cases |  | Design <br> Effect | Relative <br> Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  |  | $\begin{gathered} \mathrm{R}-1.96 \\ \mathrm{SE} \\ \hline \end{gathered}$ | $\begin{gathered} \mathrm{R}+1.96 \\ \mathrm{SE} \\ \hline \end{gathered}$ |
| Contraceptive Prevalence Rate (Currently Married Women age 15-44) |  |  |  |  |  |  |  |  |
| Total | 0.633 | 0.014 | 3647 | 3648 | 3.080 | 2.2 | 0.605 | 0.660 |
| Rural | 0.682 | 0.024 | 738 | 738 | 1.947 | 3.5 | 0.635 | 0.729 |
| Urban | 0.620 | 0.016 | 2909 | 2910 | 3.339 | 2.7 | 0.588 | 0.653 |
| Unmet Need (Currently Married Women age 15-44) |  |  |  |  |  |  |  |  |
| Total | 0.166 | 0.011 | 3647 | 3647 | 3.053 | 6.5 | 0.145 | 0.188 |
| Rural | 0.127 | 0.017 | 738 | 738 | 1.843 | 13.1 | 0.094 | 0.159 |
| Urban | 0.176 | 0.013 | 2909 | 2909 | 3.286 | 7.3 | 0.151 | 0.202 |
| Received Any Antenatal Check up (last livelstill birth of past 3 years) |  |  |  |  |  |  |  |  |
| Total | 1.000 | 0.000 | 1087 | 1041 |  | 0.0 | 1.000 | 1.000 |
| Rural | 1.000 | 0.000 | 224 | 221 | . | 0.0 | 1.000 | 1.000 |
| Urban | 1.000 | 0.000 | 863 | 820 | . | 0.0 | 1.000 | 1.000 |
| Received 3+ Antenatal Check up (last live/still birth of past 3 years) |  |  |  |  |  |  |  |  |
| Total | 0.979 | 0.008 | 1087 | 1041 | 3.499 | 0.8 | 0.963 | 0.995 |
| Rural | 0.993 | 0.005 | 224 | 221 | 0.761 | 0.5 | 0.984 | 1.003 |
| Urban | 0.975 | 0.010 | 863 | 820 | 3.735 | 1.1 | 0.955 | 0.996 |
| Institutional Delivery (last live/still birth of past 3 years) |  |  |  |  |  |  |  |  |
| Total | 0.972 | 0.007 | 1087 | 1040 | 1.813 | 0.7 | 0.958 | 0.985 |
| Rural | 0.982 | 0.005 | 224 | 221 | 0.346 | 0.5 | 0.972 | 0.992 |
| Urban | 0.969 | 0.009 | 863 | 819 | 2.062 | 0.9 | 0.952 | 0.986 |
| Safe Delivery (last live/still birth of past 3 years) |  |  |  |  |  |  |  |  |
| Total | 0.985 | 0.004 | 1087 | 1041 | 1.084 | 0.4 | 0.977 | 0.992 |
| Rural | 0.993 | 0.003 | 224 | 221 | 0.307 | 0.3 | 0.987 | 0.999 |
| Urban | 0.982 | 0.005 | 863 | 820 | 1.178 | 0.5 | 0.972 | 0.992 |
| Received BCG Vaccination (last and last but one living children, age 12-23 months) |  |  |  |  |  |  |  |  |
| Total | 0.986 | 0.012 | 335 | 322 | 3.484 | 1.2 | 0.963 | 1.010 |
| Rural | 0.995 | 0.005 | 72 | 63 | 0.346 | 0.5 | 0.986 | 1.005 |
| Urban | 0.984 | 0.015 | 263 | 259 | 3.625 | 1.5 | 0.955 | 1.013 |
| Received Measles (last and last but one living children, age 12-23 months) |  |  |  |  |  |  |  |  |
| Total | 0.964 | 0.017 | 335 | 322 | 2.765 | 1.7 | 0.931 | 0.998 |
| Rural | 0.954 | 0.033 | 72 | 63 | 1.784 | 3.5 | 0.888 | 1.020 |
| Urban | 0.967 | 0.019 | 263 | 259 | 3.072 | 2.0 | 0.929 | 1.005 |
| Birth order 3+ (birth in last three years) |  |  |  |  |  |  |  |  |
| Total | 0.136 | 0.017 | 1045 | 1037 | 2.678 | 12.8 | 0.102 | 0.170 |
| Rural | 0.205 | 0.042 | 228 | 219 | 2.362 | 20.5 | 0.123 | 0.288 |
| Urban | 0.117 | 0.019 | 817 | 818 | 2.783 | 16.0 | 0.080 | 0.154 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | $\begin{gathered} \text { Estimate } \\ (\mathrm{R}) \end{gathered}$ | Sampling error (SE) | Number of cases |  | Relative <br> Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Contraceptive Prevalence Rate (Currently Married Women age 15-44) |  |  |  |  |  |  |  |
| Karaikal | 0.586 | 0.025 | 899 | 899 | 4.2 | 0.537 | 0.634 |
| Mahe | 0.594 | 0.016 | 1,004 | 1,004 | 2.8 | 0.562 | 0.626 |
| Pondicherry | 0.652 | 0.017 | 824 | 824 | 2.6 | 0.618 | 0.685 |
| Yanam | 0.713 | 0.016 | 920 | 920 | 2.2 | 0.682 | 0.744 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | Estimate (R) | Sampling error (SE) | Number of cases |  | Relative Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Unmet Need (Currently Married Women age 15-44) |  |  |  |  |  |  |  |
| Karaikal | 0.188 | 0.021 | 899 | 899 | 10.9 | 0.148 | 0.229 |
| Mahe | 0.267 | 0.015 | 1,004 | 1,004 | 5.5 | 0.238 | 0.296 |
| Pondicherry | 0.150 | 0.013 | 824 | 824 | 8.4 | 0.125 | 0.174 |
| Yanam | 0.135 | 0.012 | 920 | 920 | 8.8 | 0.112 | 0.158 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | $\begin{gathered} \text { Estimate } \\ (\mathrm{R}) \\ \hline \end{gathered}$ | Sampling error (SE) | Number of cases |  | Relative <br> Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Received Any Antenatal Check up (last livelstill birth of past 3 years) |  |  |  |  |  |  |  |
| Karaikal | 1.000 | 0.000 | 292 | 300 | 0.0 | 1.000 | 1.000 |
| Mahe | 1.000 | 0.000 | 324 | 322 | 0.0 | 1.000 | 1.000 |
| Pondicherry | 1.000 | 0.000 | 224 | 228 | 0.0 | 1.000 | 1.000 |
| Yanam | 1.000 | 0.000 | 247 | 240 | 0.0 | 1.000 | 1.000 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | Estimate <br> (R) | Sampling error (SE) | Number of cases |  | Relative <br> Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Received 3+ Antenatal Check up (last live/still birth of past 3 years) |  |  |  |  |  |  |  |
| Karaikal | 0.994 | 0.003 | 292 | 300 | 0.3 | 0.988 | 1.001 |
| Mahe | 0.990 | 0.005 | 324 | 322 | 0.5 | 0.980 | 1.000 |
| Pondicherry | 0.977 | 0.010 | 224 | 228 | 1.0 | 0.958 | 0.996 |
| Yanam | 1.000 | 0.000 | 247 | 241 | 0.0 | 1.000 | 1.000 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | Estimate (R) | Sampling error (SE) | Number of cases |  | Relative Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Institutional Delivery (last live/still birth of past 3 years) |  |  |  |  |  |  |  |
| Karaikal | 0.938 | 0.015 | 292 | 300 | 1.6 | 0.910 | 0.967 |
| Mahe | 0.996 | 0.004 | 324 | 322 | 0.4 | 0.988 | 1.004 |
| Pondicherry | 0.988 | 0.007 | 224 | 228 | 0.7 | 0.974 | 1.002 |
| Yanam | 0.823 | 0.027 | 247 | 241 | 3.2 | 0.771 | 0.876 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | Estimate <br> (R) | Sampling error (SE) | Number of cases |  | Relative Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Safe Delivery (last live/still birth of past 3 years) |  |  |  |  |  |  |  |
| Karaikal | 0.957 | 0.013 | 292 | 300 | 1.3 | 0.933 | 0.982 |
| Mahe | 0.996 | 0.004 | 324 | 322 | 0.4 | 0.988 | 1.004 |
| Pondicherry | 0.997 | 0.003 | 224 | 228 | 0.3 | 0.990 | 1.003 |
| Yanam | 0.893 | 0.021 | 247 | 241 | 2.4 | 0.851 | 0.935 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | Estimate (R) | Sampling error (SE) | Number of cases |  | Relative <br> Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Received BCG Vaccination (last and last but one living children, age 12-23 months) |  |  |  |  |  |  |  |
| Karaikal | 0.992 | 0.008 | 87 | 77 | 0.8 | 0.976 | 1.008 |
| Mahe | 0.979 | 0.015 | 78 | 78 | 1.6 | 0.949 | 1.009 |
| Pondicherry | 0.987 | 0.013 | 62 | 61 | 1.4 | 0.960 | 1.013 |
| Yanam | 1.000 | 0.000 | 83 | 78 | 0.0 | 1.000 | 1.000 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | $\begin{gathered} \text { Estimate } \\ (\mathrm{R}) \end{gathered}$ | Sampling error (SE) | Number of cases |  | Relative <br> Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Received Measles (last and last but one living children, age 12-23 months) |  |  |  |  |  |  |  |
| Karaikal | 0.969 | 0.016 | 87 | 77 | 1.6 | 0.938 | 1.000 |
| Mahe | 0.946 | 0.027 | 78 | 78 | 2.9 | 0.892 | 0.999 |
| Pondicherry | 0.962 | 0.022 | 62 | 61 | 2.3 | 0.918 | 1.005 |
| Yanam | 0.978 | 0.013 | 83 | 78 | 1.3 | 0.952 | 1.004 |


| Sampling errors, Pondicherry, 2002-04 |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| District | Estimate <br> ( R ) | Sampling error (SE) | Number of cases |  | Relative <br> Error (\%) | 95\% Conf. Interval |  |
|  |  |  | Unweighted | Weighted |  | R-1.96 SE | R+1.96 SE |
| Birth order 3+ (birth in last three years) |  |  |  |  |  |  |  |
| Yanam | 0.222 | 0.030 | 221 | 215 | 13.4 | 0.164 | 0.280 |
| Pondicherry | 0.115 | 0.022 | 223 | 225 | 19.4 | 0.071 | 0.159 |
| Mahe | 0.157 | 0.022 | 295 | 301 | 14.0 | 0.114 | 0.200 |
| Karaikal | 0.245 | 0.045 | 306 | 315 | 18.3 | 0.157 | 0.333 |

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NOTES


[^0]:    ${ }^{1}$ For births in past three years, ${ }^{2}$ For live/still births during three years preceding the survey, ${ }^{3} 100$ or more IFA tablets/Syrup, ${ }^{4} \mathrm{~A}$ minimum of three visits for ANC, at least one TT injections and 100 or more IFA tablets/syrup, ${ }^{5}$ Either institutional delivery or home delivery assisted by Doctor/ANM/nurse, ${ }^{6}$ Children age below 3 years, ${ }^{7}$ Last but one living children below age 3 years, ${ }^{8}$ Last two weeks preceding the survey, ${ }^{9}$ Last but one living children (age 12-23 months) born during three years preceding the survey. ${ }^{10}$ BCG, three injections of DPT, three drops of polio and measles.

