

Chhattisgarh and UN Millennium Development Goals (MDGs)

Status and Progress at Half Way Mark (2007)

A snapshot

In September 2000, the world leaders representing 189 countries adopted the United Nations Millennium Declaration, calling for stronger global efforts to reduce poverty, improve health, and promote peace, human rights and environmental sustainability. The UN Secretary-General at the behest of the UN General Assembly prepared a road map for achieving the commitments made in the Declaration-resulting in the Millennium Development Goals (MDGs). The Goals reflect key aims of various UN development conferences in the 1990s. They also built on the International Development Goals created by the Organisation for Economic Co-operation and Development (OECD) in 1996. The Millennium Development Goals include all but one of the OECD International Development Goals. The Millennium Development Goals were affirmed at the March 2002 Monterrey Conference on Financing for Development, the September 2002 Johannesburg Declaration on Sustainable Development, and the June 2003 G8 summit in Evian. The Goals are now widely accepted as a framework for measuring development progress. Bilateral and multilateral institutions, including the World Bank, have made the MDGs a central focus of their development assistance.

The overall aim of the MDGs is to reverse the spread of poverty and disease by 2015. The eight goals are backed by a plan of action that sets out 18 quantifiable targets. Each target is using specified indicators. Three goals and four targets are directly related to health. The focus of the health-related Goals, as of the MDGs in general, is on poor tropic countries where 99 percent of world-wide maternal deaths occur.

Chhattisgarh and MDGs

Following statehood, Chhattisgarh initiated several measures to improve the status of its people and to move towards universal access to health care. The State recognised the distress caused to its people due to ill health and under-nutrition and the challenges inherent in revitalising the public health sector to address these issues. The physical inability to ensure outreach coupled with the poor economic status of rural majority has continued to be the key factors constraining efforts to improve health and health service indicators of the state. Recent State health sector reforms and related State and central initiatives have accelerated the pace of public health sector strengthening.

Recent Demographic Profile of Chhattisgarh

Demographic Profile

	Chhattisgarh	India
Population Total (2001)	20833803	1028737436
Males	10474218	532223090
Females	10359585	496514,346
Rural	16648056	742490639
Urban	4185747	286119689
Scheduled Caste	2418722 (11.6%)	166635700 (16.2%)
Scheduled Tribe	6616596 (31.8%)	84326240 (8.2%)
Decadal Growth Rate		
1981-1991	25.73	23.87
1991-2001	18.27	21.54
Change in Percentage Growth Rate Decadal	-7.46	-2.33
Child Population in age group 0-6 years	3469774 (16.68%)	163819614 (15.9%)
Males	1756441 (16.80%)	84999203 (16.0%)
Females	1713333 (6.56%)	78820411 (15.9%)
Density of Population (per SQ kms)		
1991	130	267

2001	154	325
Difference	+24	+58
Sex Ratio (females/1000 males)		
1991	985	927
2001	989	933
Difference	+4	+6
Sex Ratio (0-6 age group)		
1991	984	945
2001	975	927
Difference	-9	-18
Total Fertility Rate	2.79	3.0

Source: Registrar General of India, 200 I

Objectives

The main objectives of the report are to look into the state of progress that has been made in attaining the MDGs, thereby bringing out constraints and future concerns. Specifically it attempts: (i) to assess and analyse the progress towards MDGs using selected indicators to judge the progress and; (ii) to identify and analyse the key indicators which require urgent policy attention.

The report relies on secondary source produced by the State Government, websites, civil society assessments and academic literature. Interaction with people is also reflected in the report. Chhattisgarh came into existence in 2000 and so the report reflects the situation of the new state only. This is also because of data formats availability. It may be mentioned here that as Chhattisgarh is new state, it was difficult to organise data for most indicators from 1991. The state departments also do have limited information to provide on the concerned variables. Time was another constraint that limited the in-depth review of few variables. The literature on Chhattisgarh is also limited, that one could rely on. Despite the limitations, the subsequent chapters do provide a status report and concerns.

Policy Directions

Chhattisgarh since it came into existence has initiated few very important policy initiatives that directly impacts on the achievement of MDGs in the state. There are two important policy initiatives worth discussing.

Chhattisgarh initiated a policy for women as it recognised the need for increased participation of women for achieving rapid social, economic and cultural development of the state and to effectively integrate and enhance participation of women in the process of development which requires political will and commitment. The objectives of the policy are to (i) facilitate a conducive environment to enable women to realise their full potential and promote self reliance, (ii) achieve equality in access to economic resources including forests, common property, land and other means of production; (iii) ensure participation of women in social, political and economic life of the state; and (iv) encourage NGOs and Women Groups to effectively participate in the developmental process.

The various initiatives that the policy document states to achieve the stated objectives include creating a responsive statutory and institutional mechanism, integrating gender perspective in economic development, and creating an enabling environment for social development of women. To achieve these, steps needs to be taken to Create a Responsive Legal and Institutional Mechanism; Integrate Gender Perspective in Economic Development; Create an Enabling Environment for Social Development and; Implement Integrated Health and Population Policy 2006.

Future Goals of Health Sector

	Indicator	NFHS-2- 1998-99	2016
1	Birth Rate	25.2	<15
2	Death Rate	8.5	<5
3	Life Expectancy at Birth	61.4	72
4	Infant Mortality Rate	70	30
5	Child Mortality Rate	122.7	60

6	Maternal Mortality Ratio	498	100
7	Total Fertility Rate	2.79	2.1
8	Contraceptive Prevalence Rate (%)	39.9	65
9	Registration of Births, Deaths and Marriages	-	100
10	Unmet needs of Family Planning	13.5	0
11	Median Months of use of Spacing Methods	31.6	48
12	Median age at marriage among women	18.1	21
13	Median age at first child birth among women	18.1	21
14	ANC registration in first trimester (%)	26.7	100
15	Percentage of safe delivery	42.13	100
16	Percentage of institutional delivery	21.05	80
17	Access to emergency obstetric care at PHC level	-	100
18	Fully immunised children (%)	57.58	100
19	Percentage of children received Vitamin A	35	100
20	Use of ORS for management of childhood diarrhoea (%)	48.4	100
21	Percentage of children with ARI	61.6	0
22	Malaria Prevalence (API)	10.21	<2.1
23	Prevalence of Leprosy, Measles, Polio, Yaws, Cholera, Tetanus	-	0
24	Children having primary education (%)	72.1	100

An operational plan will be prepared for each policy intervention with details of specific activities to be implemented. Roles and responsibilities of people/department and time frame with outcomes will be developed. At the state level the State Health Mission will be constituted with the Chief Minister as Chairperson, the Health and Family Welfare Secretary as Member Secretary and representatives of other development departments and other sectors such as NGOs, organisation and professional bodies as members. The District Health Society will be entrusted with the responsibility of planning for monitoring and the implementation of the Chhattisgarh State Integrated Health and Population Policy at the district level.

The Chhattisgarh's health policy is comprehensive as it covers all aspects related to health sector. It not only details the objectives, but also gives the plan of action. Hoping against the hope, if this policy is implemented with a time frame, which is missing, MDGs are not far from reach of Chhattisgarh. However, financing of set objectives would be constraint. Also bureaucratic inertia would be a hurdle, especially at the lower levels. Trained manpower is also a constraint.

Assessment of Chhattisgarh MDGs: Progress and Challenges

Goal 1: Eradicate Extreme Poverty and Hunger

- * The economy of Chhattisgarh is primarily agriculture based and it provides livelihood to 80 percent of the rural population. The growth rate of state income has been fluctuating over the years since the formation of the state in 2000. Data shows an inconsistent performance of the economy. The per capita income at 1999-2000 prices was Rs.13685 in 1999-2000 that went up to Rs.17675 in 2005-06.
- * 82 percent of rural wage earners find employment in agricultural activities. Cattle-rearing is the second most important activity and provides employment to 6 percent of all rural wage earners. This too is contractual work. Forest based activities provide employment to another 5 percent rural wage earners. Construction labour provides employment to about 2.7 percent wage earners. There are of course regional differences in this pattern. State being primarily rural, 56.02 farmers are marginal and small farmers with another 30.16 percent medium farmers and 13.82 percent large farmers.
- * Chhattisgarh in comparison to the country as a whole is worse off. Rural Chhattisgarh is worse of compared to urban Chhattisgarh if one looks at monthly per capita expenditure (MPCE).
- * MPCE of 66.5 percent in rural Chhattisgarh is below Rs.410 and only 3.3 percent have MPCE of Rs.890 or more. On the other hand, in urban Chhattisgarh, the corresponding proportions are 48.6 percent and 7.5 percent. The rural conditions are appalling as one-fourth have MPCE of Rs.270 or less.
- * The glimpses of poverty and economic well-being are provided by NSSO survey on

level and pattern of consumer expenditure for the year 2004-2005 that reports 55 percent of villagers were living below the MPCE level of Rs.365 or Rs.12 per day and 24 percent are living below the MPCE of Rs.270 or Rs.9 per day.

- * In urban areas 50 percent of urban dwellers live below the MPCE of Rs.580 or Rs.19 per day and 25 percent live below the MPCE of Rs.395 or Rs.13 per day.
- * Almost 98 percent villagers and 96.4 percent urban dwellers live on Rs.38.50 per day that is less than a dollar a day.
- * On poverty nutrition nexus, the NFHS- 2 reported that in 1998-99, 48.1 percent of ever married women were with Body Mass Index (BMI) of below normal and this percentage did go down to 41 percent, which is still high by 2005-2006 (NFHS-3). The rural situation (45.7%) is worse than urban situation (23.5%). Among women, education plays an important role in improving the nutritional status. For instance, 45.8 percent of women having BMI of below normal had no education as against 19 percent women with 10 years complete or above education. The impact of education is visible only after 8-9 years of education. In case of men, as per the NFHS- 3, 31.8 percent ever married men had BMI of below normal; rural 35.6 percent and urban 17.9 percent. Education is important here too. For instance, 40.1 percent of men having BMI of below normal had no education as against 17.6 percent men with 10 years complete or above education. The impact of education is visible only after 8-9 years of education.
- * Considering over-weight or obesity as another indicator reflecting on nutritional status, as per the NFHS-2, only 2.1 percent ever-married women were over-weight or obese. The deterioration is observed in this indicator as per the NFHS-3I. In 2005-2006, 6.7 percent women were over-weight or obese. Obesity is mainly an urban problem- 22.6 percent urban compared to only 2.5 percent rural area. In case of men, 6.5 percent were over-weight or obese. The regional proportions were 20.1 percent urban and 2.8 percent rural. Surprisingly, higher the education higher is the chance of obesity in both rural and urban areas. 25.2 percent women and 18.6 percent men with 10 years complete or above education are obese compared to 7.3 and 2.4 percent with no education.
- * The rural poverty line in 2004-05 was defined as Rs.322.41 and urban as Rs.560.00 (Rs. per capita per month). Overall, the number of population below poverty line in Chhattisgarh in 2004-05 as per MRP (mixed recall period) were 71.11 lakh or 32.0

percent. The corresponding figures for rural areas are 54.72 lakh or 31.2 percent. In urban areas the number of poor people are 16.39 lakh or 34.7 percent. Rural poverty is marginally better than urban poverty.

- * The number of population below poverty line in Chhattisgarh in 2004-05 as per the URP (uniform recall period consumption) were 90.96 lakh or 41.4 percent. The corresponding figures for rural areas are 71.50 lakh or 40.8 percent. In urban areas the number of poor people are 19.47 lakh or 41.2 percent. Thus, rural poverty situation is marginally better than urban poverty situation.

Goal 2: Achieve universal primary education

- * Chhattisgarh had 3743 upper primary schools in 1993 and this number increased to 6293 in 2002, a 68.13 percent improvement. The increase in rural upper primary schools has been slower than urban schools. However, the number of rural upper primary schools is much higher than urban upper primary schools. The increase in secondary and higher secondary in rural areas has been greater than urban areas. All this indicates that rural schools have spread in Chhattisgarh.
- * As per the Seventh School Education Survey 2002, at the primary level in 2002, the enrolment was 24.92 lakh with gender ratio of 0.94. The rural gender ratio is lower compared to urban gender ratio. As one moves to upper primary level, the enrolment goes down to 9.57 lakh and the gender ratio too declines to 0.77. The decline is across areas. This trend continues at the secondary level too and further at the higher secondary level. The gender ratio declines to 0.66 at the higher secondary level. In rural areas, the gender ratio is 0.50 and the urban gender ratio is 0.83, much higher. These trends indicate that enrolment of girls after primary level goes down significantly and more so in rural areas. This is reflected by number of higher secondary rural schools.
- * With regard to class-wise enrolment figures boys outnumber girls in enrolment in all classes (I-V) and there is not much difference in gender ratio across classes and regions, though a dip is observed in class IV. A significant finding is that a clear continuous decline is visible in enrolment of boys and girls since class I from 295000 and 284803 to 196066 and 172400 in class V in rural Chhattisgarh respectively. Urban areas do not reflect a similar pattern.

* Gross enrolment figures show that at the primary level, the percentage of girls is 48.13 percent rural and 47.94 percent urban. There is a decline in percentage of girls enrolled in classes VI-VIII and XI-XII in rural Chhattisgarh. The similar is the pattern in urban areas but decline is only marginal in percentage of girls' enrolment.

* The positive sign on enrolment front are also there. In rural Chhattisgarh, the enrolment of girls improved by 39.8 percent at the primary level (I-V), by 139.1 percent at the upper primary level (VI-VIII), by 130.9 percent at secondary level (IX-X) and by 140.1 percent at higher secondary level (X-XII) between 1993 and 2002. In urban Chhattisgarh, the enrolment of girls improved at much slower rates across classes. For instance, enrolment increased by 31.4 percent at the primary level (I-V), by 66.1 percent at the upper primary level (VI-VIII), by 41.7 percent at secondary level (IX-X) and by 55.1 percent at higher secondary level (XI-XII).

These differences may reflect improvement in educational infrastructure in rural areas. But a note of caution is also there that enrolment figures may be overestimated as even out of school children may figure in school registers, especially in rural areas.

* *Pratham's* survey in 2006 for rural areas show that in rural Chhattisgarh, 76.6 percent of children aged 3-5 are either in *Anganwadi* or school and this percentage varies between 100 percent in Bastar and 51.4 percent in Korba district in 2006. With regards to children aged 6-14 years, 7.3 percent are out of school and only 8.5 percent are in private schools. The percentage of out of school children is the highest in Bastar (18.6%) and the lowest percentage in Mahasamund (2.1%). There are only four districts where proportion of out of school children is higher than the state average.

* Privatisation of schooling appears to have not touched significant proportions in rural Chhattisgarh. Jashpur district does report 23 percent children aged 6-14 in private schools. The other districts that have reasonable percentage of children of this age group in private schools are Kawardha, Bilaspur, Janjgir- Champa, Raigarh and Surguja.

* On performance of top five and bottom five districts in Chhattisgarh based on percentage of all children in Standard V who cannot read level 2 are:

Top 5	Bottom 5
Durg	0.0% Janjgir-Champa 76.2%
Bastar	0.0% Rajnandgaon 48.1%

Bilaspur	4.5%	Mahasamund	44.7%
Dantewada	9.6%	Kawardha	43.4%
Kanker	14.2%	Jashpur	39.5%

- Chhattisgarh has a drop out rate of 5-10 percent. The drop out rates in Chhattisgarh at primary level are the highest in class V (17.12%) and followed by class I (9.53%), class III (7.02%), class IV (6.32%) and class II (4.23%). The repetition rate is of 16.68 percent. This is despite Sarva Siksha Abhiyan (SSA) programme in place. Chhattisgarh has repetition rate (cohort 2003-04) of 22.28 percent in class I, 15.33 percent in class II, 17.08 percent class III, 14.83 percent in class IV, 11.21 percent in class V and 16.01 percent in class VI. The average rate for all these classes is 16.68. This means that without improving promotion rate in class I, efforts being made through SSA initiatives in attaining goal of universal primary enrolment is not likely to be realised. Data shows that in class I roughly 50 percent of boys and girls get promoted. The repetition rate of girls, however, goes on falling after class I.
- The promotion rate of boys goes down significantly in the upper primary school where girls perform much better. The major reasons for repetition are long absenteeism, failures, and re-admissions.
- * About 61 children (boys and girls in both rural and urban areas) out of 100 reached class V in 2005. More boys (62) survived up to class V compared to their girl counterparts (59). The gap is not much. Only 43 children out of 100 reached class VII in 2005 and this number was 47 for boys and 39 for girls. Here the gap is more than that was in class V.

Goal 3: Promote Gender Equality and Empower Women

- * During the past decade (1991-2001), gender difference in school attendance has been greatly reduced, but many girls still do not have equal access to education. The difference is greatest with lowest overall primary completion rates and the lowest incomes. Overall literacy rates in 2001 were 64.70 percent and male literacy rates were higher at 77.40 percent compared to female literacy rate of 51.90 percent. This is significant improvement over 1991 when the corresponding literacy rates were 42.91,

58.07 and 27.52 percent respectively. The gender difference in 1991 was 30.55 percentage points that reduced to 25.50 percentage points in 2001. Thus there is a movement towards gender parity, but a long way to go. It is not impossible though.

- * At the district level, large inter-district variations are visible in literacy rates. In 2001, the highest literacy rate of 77.20 percent was in Rajnandgaon and the lowest rate of 30.20 percent in Dantewada, but the gender difference was the same at 19.60 percentage points in both the districts. Male literacy rates in only Dantewada were below 50 percent and Rajnandgaon achieved the highest male literacy rate. The gender difference in 2001 as against 1991 has reduced in all the districts except Kabirdham, Surguja, Bastar and Dantewada.
- * An important measure of women's empowerment is the extent of their participation in the labour force. Women's share of employment is lower compared to men's across activities. Moreover, women are clearly far less likely than men to be working as managers, or running their own enterprises. They are less likely to be legislators or senior officials and managers. Women also make up only a small proportion of members of parliament and state assemblies. Then women are less likely to participate in household decision making, facing domestic violence, face greater social discrimination and encounter greater crime against them. In this section, the attempt is to look at some of these indicators so as to judge the situation in Chhattisgarh with regard to women empowerment.
- * In 2001 in Chhattisgarh, women constituted 49.72 percent total population. In rural areas, the female population was 50.10 percent and it was lower at 48.23 percent in urban areas. Women constituted 42.78 percent of all workers in Chhattisgarh in 2001. The corresponding proportions in rural and urban areas were 46.57 and 20.09 percent. This means that women participation in rural Chhattisgarh is more than double of that in urban areas. Across districts rural female share in work force is much higher compared to urban rates. This could be because social restriction of women working is more in urban areas as against rural areas. Thus, it is still a long way to go before gender parity in the labour market is achieved.
- * The artisans of Chhattisgarh are famous for their craftsmanship. The Chhattisgarh Human Development Report 2005 that collated data from 184000 families in rural

Chhattisgarh in 19128 villages shows that around 1.8 percent of total rural workforce (population aged 15 plus) earn their livelihood from artisanship. About 17 percent of them are women. Among the rural artisans, 30.62 percent are involved in stitching and embroidery related activities. Of the total women artisans in the State, 34.07 percent are engaged in stitching/ embroidery activities compared to 27.17 percent of male artisans. Pottery is another rural artisan activity where 33.3 percent of all women artisans are involved in. The other activities where women are involved are art/painting, mining, carpentry, iron smithy, weaving and dyeing and colouring. Still women are engaged in traditional activities in rural areas, but some are in men dominated activities too and this is primarily due to family occupation.

- * The National Crime Records Bureau reports (in 2005) that every hour, 25 crimes take place in the country while 59 housewives commit suicide every day. There are two accidental deaths every two minutes across the country. The violent crime includes two rapes, four murders, 10 culpable homicides, and one dowry death on an hourly basis. In Chhattisgarh, crimes against women reported are 38.4 percent of a total of 146678 cases registered nationwide. Besides, the *tonhi pratarna* (witchcraft torture) is inflicted upon women. Women are often beaten up and murdered. 22 cases of such atrocities were reported.
- In recent years, there has been growing concern about domestic violence in India. As per NFHS-2 (1998-99), in Chhattisgarh there is widespread acceptance among ever-married women that the beating of wives by husbands is justified under some circumstances. Almost two-third of ever-married women (62%) accepted at least one of six reasons as a justification for a husband beating his wife. Seventeen percent of ever-married women in Chhattisgarh have experienced beating or physical mistreatment since age 15, and 9 percent experienced such violence in the last 12 months preceding the survey.
- Most of these women have been beaten or physically mistreated by their husbands. The battering is more in families with low standard of living index (21.8% low; 16.9% medium; and 8.6% high status). It is irrespective of whether the women had children or not (the proportion of wife battering is almost same), no religious or caste or regional differences, but recently married are experiencing less this situation.

- Education helps in reducing incidence of violence against ever-married women as NFHS-2 reports that only 8.8 percent affirmed wife beating who are high school complete and above as against 20.2 percent of illiterate women. Family violence is more committed by the husband on his wife than in-laws or other persons. The incidence of wife beating is relatively more in case of nuclear families.
- NFHS-3 reports that 37.1 percent of ever-married women experienced spousal violence. It was relatively more in urban areas compared to rural areas. Only 13.0 percent affirmed wife beating who are high school complete and above as against 33.9 percent of illiterate women. This indicates an increase in violence by spouse.
- NFHS-3 does report higher incidence of wife beating among scheduled castes (45.6%), followed by scheduled tribes (43.9%), OBC (37.7%) and others (30.0%).
- As regards the wealth index of the ever-married women, 49.2 percent experienced spousal violence in the lowest quintile, 46.1 percent in the second quintile, 40.4 percent in the middle quintile, 33.0 percent in the fourth quintile and 18.3 percent in the highest quintile. This shows that rich women experience less spousal violence.
- Gender representation as well as entry of persons with criminal background into the political arena and particularly their entry into representative institutions; have dominated the discourse on representation. The issue of gender representation have been at the centre stage since the *Panchayati Raj* Institutions and urban local bodies were given constitutional protection of one-third representation to women under the 73rd and the 74th amendments to the constitution. During the last election, there were 50711 women office bearers and members of the *Panchayati Raj* bodies.
- Women account for 38 percent of all *panchayat* representatives and it is 5 percent more than the stipulated requirement. Of these 50711 women representatives, 41943 are *Panch* and 7697 *Sarpanch*. There are 5 *Zila Panchayat* presidents and 55 *Janpad Panchayat* presidents. The high participation of women may be ascribed to better sex ratio in Chhattisgarh and socio- cultural conditions of the state. Districts like Koriya, Surguja, Korba and Bilaspur are the only districts with adverse rural sex ratio.
- * Traditionally, women in Indian society had limited role in household decision making. Education and socio-economic status of the family does make difference in involvement of women in decision-making. There are rural-urban differences. As per NFHS- 2

(1998-99) 7.9 percent of ever-married women aged 15 plus reported no involvement in any decision-making at home. Younger women (15.8% aged 15-19), urban located (12%), high school plus educated (14%), non- Hindu (10.4%), general category (12.5%) and high status (12.5%) were never involved in decision-making compared to other categories. As per the NFHS-3 for 2005-2006, 51.3 percent women usually participate in household decisions (table 3.12). This proportion is higher in rural areas compared to urban areas and more among high school plus educated. And what are these issues/activities where ever-married women are involved in decision-making- what to cook (84.3%), own health care (49.2%), purchasing of jewel (54.2%), staying with her parents/ siblings (53.1%). In all this, more years the women are married greater are her involvement as she is further into her cycle- young wife, mother or may be mother-in law). Her earning capacity also furthers the cause of participation in decision-making. All indicators show that how a woman is placed and what time of her married phase determines her involvement in decision-making. Education and economic capacity do play a positive role.

Goal 4: Reduce Child Mortality

- * In Chhattisgarh, as per the NFH surveys, there is an improvement in infant mortality rates. In 1998-99, number of infant deaths per 1000 live births was 81 and it has reduced to 71 in 2005-2006. In 2005-2006, the urban infant mortality rate was 51 though rural infant mortality rate was still high at 75. At the all India level, in 1998-99, number on infant deaths per 1000 live births was 68 and it has reduced to 57 in 2005-2006. In 2005-2006, the urban infant mortality rate was 42, though rural infant mortality rate was still high at 62. Under five year mortality rate in 1998-99 was 122.7 per 1000 infants, which means that 123 children die before reaching age five. The child mortality rate was 45 (deaths of children age 1-4 years per 1000 children reaching age one). State has major role to play in tackling infant mortality.
- * Nutrition of the child is important for his/her survival and for this mother's health also has to be good. The Government of India recommends that breastfeeding should begin immediately after childbirth. First breast milk (colostrum) should be given to the child

rather than squeezed from the breast and discarded, because it provides natural immunity to the child. Although breastfeeding is universal in Chhattisgarh, most children do not begin breastfeeding immediately after birth (14% in the first hour after birth and 30% do so within one day of birth). NFHS-2 and NFHS-3 uses three internationally recognised standards to assess children's nutritional status viz., weight-for-age, height-for-age, and weight-for-height. Children who are two standard deviations below the median of an international reference population are considered underweight (measured in terms of weight-for-age), stunted (height-for-age), or wasted (weight-for-height). Stunting is a indication of chronic, long term under nutrition, wasting is a sign of acute, short-term under nutrition, and under weight is a composite measure that takes into account both chronic and acute under nutrition.

- As per NFHS-2 in 1998-99, 60.8 percent of children under age three years in Chhattisgarh are underweight, 57.9 percent are stunted, 18.5 percent are wasted. In the year 2005-2006 (NFHS-3), the corresponding percentages are 52.1, 45.4 and 17.9 percent are underweight, stunted and wasted respectively. This shows improvement in nutritional level in 2005-2006 over 1998-99. The most important indicator influencing child's nutrition status is mother's body mass index. In Chhattisgarh, female children are much more likely to be under nourished than male children according to all three measures.
- Children of under nourished mothers and children born less than two years after a previous birth are also more likely than other children to be under nourished according to most indicators. Also children from families with low standard of living, belonging to scheduled castes or tribes and having illiterate mothers are more likely to be under nourished.
- * 87.7 percent children age 6-35 months were anaemic in 1998-99 and this proportion reduced to 81 percent in 2005-2006. Female children are more likely to be anaemic. The anaemic tendencies are more among rural children. Also illiterate mothers are more likely to have anaemic children compared more educated mothers. The tendency to being anaemic child reduces with improvement in household standard of living. Children of anaemic mothers are more likely to be anaemic themselves than are other children.

- * Immunisation of children is an important component of child survival programmes in India. The focus is on six serious but preventable diseases viz., tuberculosis, diphtheria, pertussis, tetanus, polio and measles. In Chhattisgarh, only 21.8 percent of children age 12-23 months are fully vaccinated as per NFHS-2 and this proportion improved to 48.7 percent in 2005-2006 (NFHS-3). This status is result of very limited reach of the measles vaccine and the third dose of the DPT vaccine. Only 40 percent of children age 12-23 months received measles vaccine in 1998-99 and in 2005-2006 the percentage was 62.5 percent, a much-improved situation. Another 40.9 percent children age 12-23 received DPT vaccinations in 1998-99 and the proportion went up to 62.5 percent in 2005-2006.
- * The effect of Pulse Polio Immunisation Campaign is quite visible. In 1998-99, only 57.1 percent children age 12-23 had got three doses of polio vaccine, but in 2005-2006 the percentage went up to 85.1 percent. This is far from what is targeted. There is not much improvement in BCG vaccination as the percentage of children receiving BCG injection in 1998-99 was 74.3 and it increased to 84.6 percent in 2005-2006. However, urban coverage is much better compared to rural coverage. Thus, stress is required for greater rural coverage in a mission mode.
- * Child under five years should receive oral doses of vitamin A every six months starting at age of nine months. In Chhattisgarh, only one-third (35%) of children age 12-35 months have received any vitamin A supplement in 1998-99 and only 22 percent received a dose of vitamin A in the six months preceding the survey. In 2005-2006, only 12.7 percent received a dose of vitamin A in the six months preceding the survey and urban areas performed better than rural areas.
- * What about childhood diseases? As per (NFHS-2), 26 percent of children under age three were ill with fever during two weeks preceding the survey and 62 percent children who were ill with acute respiratory infection (ARI) were taken to a health facility. This proportion was 69.5 percent in 2005-2006. It could mean that health facility availability has improved over the period or more children were affected by ARI. In 1998-99, 59.3 percent of children who were taken ill with diarrhoea were taken to a health facility and this percentage was 65.3 in 2005-2006. Rural areas still suffer from lack of facilities as the numbers show.
- * In Chhattisgarh, since 2001 measles cases have gone down but are not out. Diarrhoea cases

have increased over the years. The rise in incident may be due to lack of potable water and hygienic living conditions. Chhattisgarh has to go a long way to get rid of these diseases.

Goal 5: Improve Maternal Health

- Reduction of maternal mortality is an important MDG. In Chhattisgarh, the information provided by NFHS -2 (1998-99) show that no data are available on antenatal check-up, but 6.2 percent of pregnant women reported antenatal check-ups only at home from a health worker.
- As regards the antenatal check-ups outside the home, 39 percent reported doctor doing it with 12.3 percent reporting other health professional doing it. Further, 58 percent of births received two doses of tetanus toxoid (TT) injections, while 55 percent received iron and folic acid (IFA) tablets/syrup.
- The utilisation of ANC services for the last birth in Chhattisgarh is 46 percent and this low utilisation is attributed to inadequate outreach services. 48 percent women did not receive prenatal care from anyone and 12 percent did receive it at home from health workers while another 34 percent received it from a doctor. Those who did not receive antenatal check-ups at home or at health facility did not consider it necessary are 76 percent. 14 percent ever-married women in Chhattisgarh did not avail the antenatal check-ups for economic reasons while 10 percent cited reasons as customary or family did not allow. These results reinforce the fact that these women and their families' need to be informed about the benefits of ANC services.
- * Only two-fifths of women in Chhattisgarh received first antenatal check-up in the first trimester of pregnancy when the first antenatal check-up should take place at the latest during the second trimester of pregnancy. So the effort should be to see that more women receive first antenatal check-ups in first trimester. It is also necessary because the effectiveness of antenatal check-ups in ensuring safe motherhood depends largely on tests and advises received during the check-ups. As per the NFHS-2, more than two-fifths had abdominal examination, blood pressure was checked up in case of one-third, blood tests and urine tests were more common than internal examination or height measurement. The type of advice received for the last birth showed that dietary advice

was given more often than other advice. 33 percent women received advice on the danger signs of pregnancy. Advice on delivery care and newborn care was also poor and was the case. In India, it is mandatory that a pregnant woman should receive two doses of tetanus toxoid injections.

- * Place of residence is an important indicator of accessibility as health institutions/facilities are located more in urban areas than rural areas. Cultural taboos in rural areas coupled with lack of knowledge among pregnant mothers are also the reasons for low utilisation of ANC. In Chhattisgarh, urban women have more ANC check-ups compared to their rural counterparts. More women from other castes have gone for more number of ANC check-ups than their scheduled castes and tribes counterparts.
- * Women from lower economic strata went for less than three ANC check-ups (22%) compared with women from higher economic strata (34%). ANC check-ups are more among younger women (below 25 years age) *vis-a-vis* older women (aged 25 plus years). In Chhattisgarh, surprisingly the number of ANC check-ups was more among non-working women than working women. Literate women go in for more ANC check-ups than the illiterate women and so is the case with women exposed to media. Education of the spouse is also important as in Chhattisgarh, 55.3 percent women went in for four ANC check-up with husbands having high school education, 27.4 percent having husbands up to middle education complete and only 18.1 percent with illiterate husbands. This situation happens with nucleation of family structure more, where the role of the spouse in decision-making for pre-natal care becomes important.
- * Delivery care is also important for reducing maternal mortality rate. As per NFHS-2, in Chhattisgarh, more deliveries take place in the care of health professionals in urban areas (25%) in comparison with rural areas (8%). Utilisation of hospitals or health professionals is greater among women from other caste (11.5% from other caste and 9.1% from Scheduled caste/ tribe). 10.1 percent women from higher economic strata utilised hospital services or assistance of health professional during delivery than 9.6 percent women from lower economic strata. 11.4 percent women in Chhattisgarh who utilised health care facilities for delivery were aged 24 or less while only 9.3 percent did

so in the age group of 25 plus. More literate women also utilised delivery care (18.3%) compared to illiterate women (7.4%). Women whose spouses have high school and above education (15.8%) utilised more delivery care facilities compared to those with spouses with up to middle level education (10.6%) and illiterate spouses (6.9%). 11.8 percent not working women have utilised delivery care compared to 9.4 percent working women. This appears to be because of younger women delivering in hospitals etc. as noticed above. It is also the case with women exposed to media (13.9% compared to 6.5%) using delivery care services and lower birth order (below 3). Women with 3 or more ANC check-ups used more delivery care (15.4%) *vis-à-vis* women with less than 3 ANC check-ups (8.2%).

- NFHS-3 reports that 15.7 percent ever-married women had delivery in a hospital or other institution. The urban areas outscore rural areas in this regard significantly. In 44.3 percent delivery cases, a doctor/ nurse/ LHV/ ANM/ other health personnel assisted. This proportion was 32.3 percent in 1998-99. There are wide rural-urban differences (74% urban against 38.5% rural) pointing to the fact that rural health infrastructure is still poor.
- Women with at least 3 antenatal care visits for their last birth constituted 54.7 percent as per the NFHS-3 and it is a significant improvement over 1998-99. Also 82.3 percent women in urban areas had at least 3 antenatal care visits for their last birth compared to 49.2 percent rural women.
- IFA consumption is still low as only 21.8 percent women reportedly consumed IFA for 90 days or more when they were pregnant with their last child. Urban women fare better than their rural counterparts.
- Women who received postnatal care from a doctor/ nurse/ LHV/ ANM/ other health personnel within 2 days of delivery for their last birth constituted only 25.3 percent with 63.6 percent urban women and only 17.6 percent rural women.
- Hospital care is still a distant dream for rural women and even in urban areas not all women avail the facilities available.
- Rural-urban disparities are very wide in Chhattisgarh.
- Education of the women does come out to be an important factor along with the wealth of the family.

Goal 6: Combat HIV/AIDS, malaria and other diseases

This goal requires halting by 2015 and begun to reversing the spread of HIV/AIDS. The suggested indicators is HIV prevalence among pregnant women aged 15-24 years, condom use rate of the contraceptive prevalence rate (condom use at last high risk sex; percentage of population aged 15-24 years with comprehensive correct knowledge of HIV/AIDS; and contraception prevalence rate) and ratio of school attendance of orphans to school attendance of non-orphans aged 10-14 years.

It is surprising that in India proper data on persons affected by HIV/AIDS is not available.

As per the NFHS-2 for the year 1998-99, only 20 percent ever-married adults women aged 15-49 ever had heard of AIDS and this percentage went up to 41 in 2005-2006 (NFHS-3)- table 3.18. In rural Chhattisgarh, the corresponding proportions were 12 and 31 percent compared to 54 and 79 percent in urban Chhattisgarh. Awareness building among women had improved significantly, but still especially in rural areas lot needs to be done. As regards, ever-married adults men aged 15-49, the NFHS-3 reports that 67 percent of them have heard about AIDS and this proportion is 98 percent in urban areas compared to 59 percent in rural areas.

Against this at the All India level, as per the NFHS-2 for the year 1998-99, 40 percent ever-married adults women aged 15-49 ever had heard of AIDS and this percentage went up to 57 in 2005-2006 (NFHS-3). In rural India, the corresponding proportions were 30 and 46 percent compared to 70 and 81 percent in urban India. As regards, ever-married adults men aged 15-49, the NFHS-3 reports that 80 percent of them have heard about AIDS and this proportion is 94 percent in urban areas compared to 73 percent in rural areas. This shows that men urban areas of Chhattisgarh are better aware of AIDS compared to urban men at the all India level.

Many studies have made direct links between the consumption and trade in wild animals and various diseases like HIV/AIDS (MDG goal 6). The most recent debate focuses on the transmission of avian influenza between wild species and humans. Studies also point out that

loss bio-diversity impinges on potential cures of AIDS.

The aspect of bio-diversity that has link with HIV/AIDS involves search for medicines from natural sources to treat the disease. The story of the potential anti-HIV drug Calanolide provides a tragic reminder of what we risk losing with species loss. Chemists from the US National Cancer Institute identified a novel agent (Calanolide A) from the leaves and twigs of a tree Calophyllum langiurum found in Sarawak that the original tree was gone and that other C. langiurum trees could not be found. It was not clear whether the species was extinct. A close relative C. teymannii was identified and was found to contain a weaker drug, called Calanolide B, which, while having anti-HIV activity and the same mechanism of action, nevertheless was not as potent as Calanolide A. Calanolide B is currently in clinical trials, the result of a successful venture between MediChem Research and the Government of Sarawak (Brodnig, 2006).

Goal 7: Ensure Environmental Sustainability

- Chhattisgarh has 63.00 lakh hectares under forest cover and ranks third at the national level. The forest area is 44.2 percent of the state's geographical area. Protected forest cover is 25782.17 sq.km (43.13%) of all forest cover.
- Under the joint forest management scheme, 32 forest areas have been developed covering 1069 village forest committees. The area developed is 42514 hectares. The official sources report that Chhattisgarh has 7820 Joint Forest Management Committees protecting 32760 sq km area of 59772 sq. km. total forest area.
- Some districts of Chhattisgarh have always been rich in forest produce. The population being largely tribal, dependence on forests is near total. There are hardly any organisations of tribals to protect the forests. In 1999, the government set up an ***Imli Andolan*** in Bastar district to save the tribal population from traders' exploitation. It was an effort to provide a remunerative market, largely through administrative directives and official arrangements with TRIFED.

Goal 7 has a target number 10 that requires halving by 2015 the proportion of people without sustainable access to safe drinking water and sanitation.

- * At the district level, some improvement has taken in availability of safe drinking water and sanitation facilities across districts. This improvement is largely marginal. There are

some districts like Durg, which are far ahead of other districts. Some districts have not even crossed half way mark. There are districts, which have observed deterioration in availability of safe drinking water. If all habitations are not covered, means household coverage disparities must be huge. Thus, to have all habitations with safe drinking water and proper sanitation, Chhattisgarh has a long way to go.

- In 2001, Chhattisgarh had 4148518 households of which 19.01 percent had drinking water source within the premises while another 60.31 percent had a source near the premises and the remaining 20.68 percent had a source that was away from the living space.
- In rural areas, of the 788835 households, only 11.9 percent had drinking water source within the premises while 65.77 percent had a source near the premises and the remaining 22.33 percent had a source that was away from the living space.
- In urban areas, of the 2501821 households, 49.27 percent had drinking water source within the premises while 37.06 percent had a source near the premises and the remaining 13.67 percent had a source that was away from the living space.
- By June end 2006, 72775 habitations were covered by some type of safe drinking water source.

Goal 7 also states target number 11 that requires by 2020 to have achieved a significant improvement in the lives of at least 100 million slum dwellers

- Chhattisgarh in 2001 had slum population of 8.179 lakh in 12 towns with 26.05 lakh population. The urban population was 41.86 lakh in Chhattisgarh. This means that slum population constituted 31.4 percent of population of cities reporting slums and 19.5 percent of all urban population.
- Literacy rate of slum population in 2001 was 74.8 percent when male literacy rate was 85.5 percent and female literate rate of 63.4 percent. The gender difference recorded was 22.1 percent.
- The literacy rates at all India level are lower at aggregate level and for males compared to Chhattisgarh, but higher for female literacy. The gender differential is also lower at the all India level at 16.4 percent.

- * In 2001, Chhattisgarh had slum population of 1.9 percent of the total population lived in slums. At the all India level, total slum population is 4 percent. The sex ratio among the slum population in 2001 was higher at 948 compared to non-slum sex ratio of 935. The male literacy rate among the slum population was 85.5 percent while the female literacy rate was 63.4 percent.
- On improvement if any occurred during last 5 years (prior to the survey) in all facilities in these slums, 31 percent notified slums reported had a road within the slum (none in case of non-notified slum).
- 69 percent had improved water supply, 31 percent improved electricity, streetlight and drainage, no improvement in latrines, sewerage or garbage disposal. The improvement was far poor in all the facilities in case of non-notified slums. There was improvement only in approach road to slum (24% slums), water supply (21%) and electricity (21%). Whatever improvement took place in facilities were at the government level; no private or civil society or community efforts.
- There was no notified slum reporting deterioration of facilities during last 5 years prior to the survey. However, 51 percent non-notified slums reported deterioration of road within the slum, 4 percent in water supply and streetlight, 68 percent in drainage, 24 percent in sewerage and garbage disposal.
- * The problem of slums further gets complex as most have high population density. For instance, 53 percent slums are located on an area of below 2 hectares.

Human rights position has not been very good. Naxalite movement has affected large section of the population, crime against women has increased, there is child labour, trafficking of women also exists, court cases are slow to settle, social deprivation on increase and bonded labour also is an issue.

Chhattisgarh has made some progress towards achieving MDGs over the last few years. Policy initiatives are right, but actions are slow. Intentions are also apparently clear, may be because international agencies which fund various programmes in the State are pushing the state government in the desired direction. The progress in achieving MDGs depends on the initial conditions. Chhattisgarh is a tribal state mostly and initially being part of Madhya Pradesh was

deprived of the gains of development process. It has been a fact in India that smaller states have made significant strides in economic growth and came out of poverty situation. Chhattisgarh lacks basic infrastructure like roads, bridges, rail network and other economic and social infrastructure that could boost economic growth. Since 2000 when it became separate state the new government took steps to move the engine of growth. Chhattisgarh has regional disparities as differences exist in northern, central and southern regions in all respects. Traditionally, the state had huge natural resources, but poor human resources to exploit them. All exploited the tribals. The main livelihood of people was agriculture and allied activities. Artisan activities also supported rural communities and women played a vital role. Socio-cultural values have not allowed modern systems to be fully functional. This is more so in case of girl child's education and health.

Future Concerns

Given the situation with regard to MDGs, a strong effort is required on the part of government, civil society organisation and communities.

- * On the education front, efforts are required to make investments for schools so as to increase access to education system, provisioning of facilities in the school, proper implementation of various schemes like mid-day-meal in schools to give boost to nutritional status of children and improve attendance in schools. Regular medical check-ups are also to be built into the system. To improve quality of school education, curriculum development requires attention, early childhood education requires attention, and improvement in surroundings of the schools is must. It is also must that teachers attend schools to impart education and teacher training has to be redesigned or introduced. If teachers do not go to school then no amount of investment in school infrastructure can ensure complete enrolment of children in schools. It is also important to retain children in schools, especially girls. Drop out rate has to be reduced.
- Hospital number has to increase in rural areas especially providing greater access to vulnerable people. Also qualified doctors and staff manning these facilities have to be increased. The present health policy does not ensure. More women hospitals are required in rural areas. Equipment is also necessary. A greater regulatory system is

required to be put in place to control female infanticide and then to raise the sex ratio. Sex ratio in Chhattisgarh in rural areas is high, but urban areas are observing a decline over the years. More attention is required to provide care to pregnant women. Antenatal check-ups required to be undertaken religiously.

- To improve nutrition status of women and girl child, food security at household level has to be improved and sustained. Market can destroy the access to poor of basic nutrition requirements by excluding from the system. Privatisation in the country has led to rising prices and many commodities are out of reach of poor in Chhattisgarh. Still as per the NSSO survey for 2004-2005, rural population spends major portion of income on cereals.
- User fee charges also exclude poor from hospital services. Private hospitals have become costly and out of reach of most poor. There should be no fee from poor for use of hospitals. Drug policy also has to tune itself to achieve the MDGs. Most medicines are also becoming out of reach of poor. Polio control programme has to be more rigorous and Chhattisgarh has not been able to cover all eligible children.
- In order to improve access to healthy delivery services, incomes of the poor has to improve and livelihood of poor in rural areas to be ensured. Employment guarantee scheme has to be implemented more properly. Labour market information has to be improved and migration controlled.
- * Financing is a major problem. Funds need to be properly utilised for social sector. There has to be short-term, medium-term and long-term plans for financing health related projects. Finances have to be mobilised from both public and private sources. The interlinkages of various sectors and linkage of economy with outside are important. Trade can work both ways, but efforts should be to use it effectively for betterment of poor. Tax structure requires a re-look to mobilise more resources for investment in social sector.
- * Institutions delivering services are weak and they need to be strengthened and new one created to have greater efficiency. Costing of specific intervention also require attention as it would depend up on institutions and policy environment. Selecting the best delivery system/ mechanism will reduce costs. Most MDGs cost estimates use a one-size fit all approach, based on linear relationships, which may not be true always. The

cost of expanding the coverage of a service in health and education by an extra ten percentage points, for instance would depend on whether the country's coverage moves from 50 to 60 percent or from 90 to 100 percent.

- * HIV/AIDS has not received the attention due to it. We have still put it under the carpet and prevention measures are half hearted. The use of condom is not universal as shown by NFHS surveys. The major reason is the cost of a condom and familiarity with its use. Women must be educated to use it and force their spouses use them. If we can reduce price of condom and make it accessible, then we can inch towards achieving the goals.

Chhattisgarh has taken few steps forward, but more serious efforts are called for. All stakeholders have to pitch in.