CHAPTER VI

SUMMARY AND CONCLUSIONS
“Since premature mortality, significant undernourishment and widespread illiteracy are deprivations that directly impoverish human life, the allocation of economic resources as well as arrangements for social provision must give some priority to removing these disadvantages for the affected population.”

Amartya Sen (1999)

In this concluding part of the study major findings of this work are summarized. Suggestions on corresponding points are incorporated for providing guidelines for policy making and administrative operations to improve the situation of human development in India.

Human development is an essential ingredient of economic development and health is one of the important cornerstones. The present study examines public expenditure on health and how it impacts on human development. Human development is a wide term, the two most important aspects of it being health and education. It is the health aspect that has been taken up for analysis in this study. Since the inception of the concept of human development there have been many approaches to development of which the most accepted and applied form is defined as enhancement of people’s capabilities to lead a better life. Income, education and health emerge as the foremost pillars of this approach. Emphasising on health Amartya Sen is of opinion that it is among the basic capabilities that give value to human life.

In this context the major approaches to development are ‘Human Development’ and ‘Human Resource Development’ approach; the first one is more comprehensive and humane and is practiced by UNDP and other institutions of national and international importance. The theoretical aspect of the concept establishes that a higher level of economic development will automatically lead towards a higher level of human development but the empirical aspect shows that it is not necessary and even the reverse is possible. A moderately affluent economy can also realize a comparatively better level of
human development through appropriate policy. For example, at international level many countries of lower income than India such as Cuba and Sri Lanka which have maintained better health outcomes in terms of lower infant as well as maternal mortality rate. And this is also true in the Indian perspective, in the case of Kerala particularly, and, southern states generally. The state of Kerala comparatively less affluent than other states like Maharashtra, Gujarat, Goa and Haryana has achieved far better levels of human development. Figures for Kerala are much better than of other states in terms of most of the health indicators taken up for study like IMR, CMR, MMR, LEB and nutrition etc. ‘Kerala model’ of development proves that even with a relatively low level of economic growth, basic needs of the people can be met through appropriate redistribution strategy.

One of the notable features of human development in Indian perspective is the persistence of widespread disparities among the states as well as within the states. Among the states Kerala, Tamil Nadu, Andhra Pradesh and Punjab etc. are performing far better than Uttar Pradesh, Bihar, Orissa, Madhya Pradesh etc. There are glaring disparities in infant and child mortality at regional (rural/urban) and sex levels in major Indian states. The rural/urban gap is more than double in most of the less developed states. This situation is also observed in maternal health as well as overall health conditions measured here in terms of MMR and LEB respectively. This is so because rural areas have been historically neglected and their infrastructure as well as facilities are meagre than that in urban areas. Disparity at sex level is reflected in the form of more female child deaths, poor maternity care and higher percentage of malnourished and anaemic women. Disparity within the state can also be seen such as in eastern and western Uttar Pradesh, Vidarbha and Mumbai regions of Maharashtra. In the context of Uttar Pradesh, in spite of economic advantage, western region fares no better than the eastern in terms of the available indicators of well-being and social advancement. Western Uttar Pradesh had a higher child mortality rate than eastern Uttar Pradesh, with a particularly large
east-west gap for female children. Western Uttar Pradesh also has considerably higher fertility levels.

The study demonstrates that India’s health profile is poor in the international perspective. It stands with the world’s poorest countries like Nigeria and Ethiopia in many respects. It is apparent that this is so because more than one third BPL population survives at the starvation line and the larger proportion of remaining population is not able to bear the costly medical facilities. The situation becomes harsher due to government’s apathy reflected through less than 20 percent contribution by the budgets to this crucial sector. Health infrastructure and facilities are inadequate whose resultant effect is reflected in low LEB and high IMR, CMR and MMR etc. As per the World Health Statistics (2009) health expenditure as percentage of GDP is much lower in India at 3.6 when compared to the advanced countries of the world. France, Germany, Canada and USA spend between 10 to 15 percentages of their large GDP on health for a much lower population that works out to around four-fifth of total health spending by the government.

In such a deficit situation, the best policy would be to allocate more funds to this crucial sector. As proved by this study state health spending exercises significant impact on health outcomes. Percentage share of health spending to the total budgetary expenditure has declined over the period. Whatever meagre allocation is made, its appropriation is not according to the norms prescribed by various institutions of respect in the field.

On the nutritional front, around one third of children born in India are underweight at the time of birth. In terms of prevalence of anaemia in ever married women (15-49 years), the situation has become more pathetic. This figure has shot up by 7 percent during the high growth period of NFHS-2 (1997-98) and NFHS-3 (2005-06). Expenditure on food constitutes a very large share in the total consumption expenditure of the bottom one-third population. The soaring cost of cereals led to increase in food cost and consequently
declining purchasing power of the poor. It has been observed by ‘Eighth Report of the Commissioners of the Supreme Court’ that 70 percent of slum children are malnourished compared to the national average of 46 percent. Performance of the states is different at the front of nutritional anaemia in women. State of Kerala which is doing better on other fronts has failed to maintain its respectable position and registered the highest percentage increase in malnutrition during the above mentioned period of high growth. Punjab, Tamil Nadu, and even Orissa and Assam have registered an improvement in this respect. On the other side, Karnataka, Andhra Pradesh, Gujarat, Haryana and Rajasthan are the states showing an upward trend. An anomalous situation prevails in the fast growing economies of Gujarat and Haryana which have failed to improve their nutritional status. This is so because factors responsible for malnutrition are other than poverty, and include the age of marriage, teenage pregnancy, age of women at first child birth, prevalence of early breast feeding of children and awareness among women about health.

Measures to increase age of women at the time of their first child birth would help in lessening this intergenerational transfer of malnourishment from mother to child. India along with the international community has to take steps immediately to check the soaring prices of cereals to achieve MDGs within the stipulated period. The Centre has initiated appreciable steps to address this issue by launching the National Rural Health Mission (NRHM), a flagship programme of ministry of health and family welfare (MOHFW), and the ICDS of Ministry of Women and Child Development (MWCD) the two key programmes of the government of India. Mid-day meal program at primary school level is a good step to reduce child under-nutrition. But it is not sufficient and there is need to introduce this program with increased availability and better quality, at least up to upper primary level. Adolescent girls should be especially targeted as they are more susceptible to malnutrition and anaemia.
At the front of maternal health, a large disparity prevails among states in MMR. Nutritional improvement and better health facilities at the time of delivery, along with other measures have had a positive effect. The results of institutional and safe deliveries are observed directly in improved maternal and infant health (Table 3.16). It is evident that low institutional and safe delivery areas are pockets of high MMR and IMR. Kerala maintains its first rank and Uttar Pradesh is relegated to the last among the group of fifteen major states. Disparity at rural/urban level in case of safe-delivery is again more than double.

The present UPA government and other state governments have expressed serious concern and taken initiatives towards improvement in maternal and child health. *Janani Suraksha Yojana* (JSY) for instance emphasizes ‘the high focus’ states under National Rural Health Mission documents to increase institutional delivery but by cash assistance only. This is not sufficient. Government has to take initiatives to develop a full-fledged, accessible and affordable health infrastructure. Central government has taken the right initiative under National Rural Health Mission (2005-2012) and Reproductive and Child Health Programme Phase-II (2005-2010), to actively pursue the goals of reduction in maternal mortality by focusing on the four major strategies of (a) essential obstetric and new born care for all, (b) skilled attendance at every birth, (c) emergency obstetric care (EmOC) for those having complications and (d) referral services. The National Population Policy-2000 and National Health Policy-2002 have set the goal of reducing MMR to less than 100 per 1,00,000 live births by the year 2010. *Cheeranjivi* scheme of the Gujarat government is a successful scheme. The focus has to be on overall health condition of mother rather than only at the time of delivery. Study shows that 1,17,000 maternal deaths can be prevented by an expenditure of only Rs.1000 crore.
Life-expectancy at birth (LEB) is indicative of health as well as overall socio economic condition of the country. It shows the expectation of life in a prevalent socio economic scenario. If various mortality rates, for instance IMR, CMR, MMR etc. and/or deaths due to HIV/AIDS, malaria, tuberculosis or by any other cause are high, the chances of survival will be low and consequently LEB will also be low. Low LEB is indicative of poor health infrastructure and socio-economic conditions of developing countries. It is an established fact that developed countries have a much higher life expectancy than developing ones. There is a gap of almost 15 years between India and the advanced countries. To increase LEB or to reduce the gap we have to execute the ‘Kerala model’ of development as mentioned above.

It is established that this poor health scenario in India is caused by continuous neglect of this sector reflected by the low allocation of funds by the government. The state health spending is much lower with a large interstate variation in many respects viz. in terms of per capita expenditure on health, health expenditure as percentage of GSDP, as percentage of social services and as percentage of budgetary expenditure. It is evident in the study that state health spending as percentage of budgetary expenditure is very low (3-8%) and almost 90 percent is on revenue account for all the states, of which major part is appropriated by salaries and wages. In some of the years of the study revenue expenditure is more than 99 percent, as in Andhra Pradesh. In spite of growth in revenue expenditure on health a large part of out of pocket expenditure takes place which imposes a heavy burden on the poor.

Interstate disparity is more pronounced during the period of study. It can be seen that public expenditure on health as percentage of total health expenditure has been increased recently from 23 percent in 2005-06 to 27 percent in 2008-09. But this increase is not uniform as is evident by an increase in coefficient of variation from 17.72 to 30.75 percent during the period 1987-88 to 2002-03. In the last five years of the study it came down from 30.75 to
23.56 percent. This indicates flaw in the allocation policy of the states and a corrective measure is required that can be based on principle of equalization.

The share of capital account remained much lower in total budgetary expenditure on health in the states. For instance, in the state of Andhra Pradesh it was less than half percent for almost half of the study period, while in the remaining period it was about two percent. In Uttar Pradesh for most of the years it varied between 5 to 10 percent. There was a phenomenal increase in the last two years of the study, increasing to a high of 34.4 percent in 2006-07 and, though falling, remaining high at 25.7 percent in 2007-08. Although this is a positive indication towards creation of better health infrastructure, how much actually gets spent is subject to speculation. High level of corruption incidences are frequently reported by media, especially in Uttar Pradesh. After the implementation of NRHM (2005-06) rural health infrastructure is set to increase, that is why capital expenditure has tremendously increased thereafter. Therefore, proper execution of the ‘Mission’ with people’s participation by checking corruption is urgently required. We have to develop a mechanism of transparency and accountability.

The study takes into account Medical and Public Health and Family Welfare. Of the total health spending, 15 to 20 percent is incurred on Family Welfare in all the selected states. Major share of this head goes to population control programs, like sterilisation and other birth reducing measures. Remaining bigger part of health expenditure is on Medical and Public Health, ranging from 70 to 90 percent. It was more than 90 percent in Maharashtra during 2003-04 to 2005-06. It should be noted that approximately 30 to 50 percent of medical expenditure is incurred on Urban Health Services in different states. On Rural Health Services it varies between 10 to 30 percent, and the situation is very unjust with Maharashtra spending much less, from less than 2 to 4 percent only. How paradoxical it is that areas with more than 70 percent population (rural areas) get only 30 percent share in health services.
while less than 30 percent population gets more than 70 percent share in health services. This flaw, reflected through expenditure on health in most of the states is, however, skewed towards tertiary health care services and lower shares are allocated to primary and secondary health care services. A study by NIPFP in the case of Rajasthan proves this skewness in health spending in the proportion of 43:28:29 towards primary, secondary and tertiary services respectively while the National Health Policy, 2002 suggested expenditure in the ratio of 55:35:10. Growth rate of allocation in state health spending on UHS and RHS varies from one state to another state. In most states UHS growth rate has been approximately 11 to 13 percent while a higher growth of 12 to 15 percent was registered for RHS which is a good sign to minimize disparity. The states of poor performance with the high incidence of IMR and MMR call for increase allocation for drugs and other medical supplies and maintenance of equipment and greater share of allocations to primary and secondary health care.

Health status of the people also depends on the spending on other social services too. These services work as strong preventive measures of health care. As part of budgetary expenditure, allocation to these services varies approximately between 20 to 40 percent, highest being obtained in Kerala. Southern states of India lay more emphasis on this sector than the northern Indian states as per this study. Kerala’s percentage share was the highest, and was little less than half of the total budgetary allocation during eighties (around 44%), subsequently coming down to a little more than 30 percent. In Maharashtra, Haryana and Uttar Pradesh it varied between 27 and was a little higher in Assam and Andhra Pradesh reaching 40 percent in some years. In this meagre share of social services in the budget, health expenditure is not even 20 percent of this head, except for a few years in Uttar Pradesh. In Haryana for most of the years it ranges from only 9 to 12 percent. In rest of the states under study it accounts for 13 to 17 percent of expenditure on social services.
Per capita average expenditure on health both at current as well as constant prices is recorded at 179.38/200.16 in Kerala (again the highest) followed by Andhra Pradesh (Rs. 128.06/139.83) and Maharashtra (Rs. 132.23/143.66). Uttar Pradesh (Rs. 92.34/103.93) lags far behind with Haryana and Assam, with a per capita government expenditure on health half that of Kerala. The World Health Organization (WHO) estimates that $35-40 (almost Rs. 1600-1800) per capita health expenditure is the bare minimum for basic health services (Human Development Report, 2003). This works out to barely Rs.10 per person per month, which does not even cover the cost of a single dose of an antibiotic. In Indian states it is less than 10 percent of the bare minimum recommended by W.H.O.

When we compare state health spending with the state’s GSDP, public expenditure on health is less than one percent of GSDP in most of the years in almost all the selected states. This share in GSDP which was somewhat larger prior to the reform years has declined since India became committed to the Structural Adjustment Program (SAP) under the World Bank dictate. During the nineties public health expenditures have declined rapidly both in terms of proportion of government spending as well as a ratio of GSDP. In contrast, private health investments and expenditures have grown rapidly. It is clear that growth in health expenditure could not catch-up with the growth rate of GSDP during this period, especially in the fastest growing economies of Maharashtra and Haryana. A very appropriate suggestion of a World Bank study on ‘Investment in Health’ can be added here that for decent health care services which reach out to most of the population more or less equitability, the state has to spend at least 5 percent of GNP (World Bank, 1993).

From the above discussion, first of all we come to the conclusion that allocation of funds to social services is very low, and share of health sector in social services is much lower. Prevalence of high poverty and poor health status of the people in less developed states warrants a much higher
expenditure by the government on this head. There is low level of allocation to health sector in terms of per capita and percentage of GSDP in poorer states. The problem is aggravated by the inability of the fiscal transfer system to offset the general fiscal disabilities of these states due to their low revenue raising capacities.

Therefore, alternative ways are suggested to raise additional resources through (a) charging health cesses and levies on health degrading products (if they cannot be banned) like cigarettes, beedis, alcohol, pan-masalas and gutka and personal vehicles. (b) Social insurance can be strengthened by making contributions similar to ESIS compulsory across the entire organised sector and integrating ESIS (Employees State Insurance Scheme), CGHS (Central Government Health Scheme) etc. with the general public health system. The Rashtriya Swasthya Bima Yojana has emerged as an effective instrument for providing a basic health cover to poor and marginal workers. It is now being extended to MGNREGA beneficiaries, beedi workers and others. (c) Social insurance must be gradually extended to other employment sectors using models from a number of experiments in collective financing. For example, the sugar cane farmers in Maharashtra pay Rs.1 per ton of cane as a health assist and their entire family is assured health care through sugar cooperatives. (d) There are many NGOs experiment in using micro-credit as a tool in health financing for the members and their family. (e) Public-private partnership (PPP) is another strong alternative to explore available private providers to provide health facilities where government services are non-functional or of poor quality. The government is encouraging foreign/private investment to stimulate the growth of private, social and community insurance. The NHP-2002, makes it clear that government policy supports medical tourism to earn foreign currencies and competitive environment.
Whatever allocation is made in future should be especially and judiciously focussed on preventive health care rather than on curative one. The first one is more cost-effective as well as equitable in nature.

One of the major problems of health sector due to low government funding is shortfall of health personnel that is the cause of deficit in SCs, PHCs and CHCs and this is reflected in the form of overburden on these inadequate health facilities that are available. The problem of non-availability and uneven distribution of skilled health care providers is the central challenge to meeting our health goals. WHO estimates that worldwide, this factor- more than any single factor- may lead to the failure in attaining the Millennium Development Goals within the stipulated time.

This issue can be addressed alternatively by the governments through hiring retired doctors as well as appointing doctors on an ad-hoc basis. Practitioners of Ayurveda and Unani systems should also be drawn into the state health systems, after giving them further scientific training when necessary. These Indian systems are very cost effective and it will ensure accessibility. The National Health Policy, 2002 put it succinctly: public health infrastructure is far from satisfactory, the equipment is often obsolete and unusable, availability of essential drugs is minimal, buildings are dilapidated, facilities grossly inadequate, thus leading to steep deterioration in the quality of the service. The Policy implications to improve the situation are: increased coverage with appropriate services, increased numbers of rural midwives, in-service training of existing staff in maternity issues and problems, culture-specific educational approaches using the existing value system, educational campaigns to discourage harmful practices and behaviour, continued efforts to create awareness and educate to upgrade the knowledge of TBAs (traditional births attendants), and a culturally sensitive integration of TBAs into the government programmes. Studies show that when good facilities are made available, even tribal women generally make use of them willingly.
More than sixty years ago the report of the Bhore committee recommended the lofty principle that ‘nobody should be denied access to health services for his inability to pay’ and that the focus should be on rural areas, with emphasis on preventive measures. The burden of expenditure on health care significantly increases with the increase in the distance of the households from the health centres. The extension of the network of rural PHCs will serve the cause of development by providing health care and also by providing economic relief to the population located in remote villages. Use of mobile health services is good alternative to increase the accessibility of health facilities to provide diagnostic and outpatient care closer to hamlets and villages in remote areas. Moreover, increased allocation to rural health care is also necessary to correct the imbalance in per capita public expenditure on health between rural areas and urban areas.

Obviously, such a programme would require increase in government’s capital expenditure on rural health sector and rural road construction. But it is evident through the study that capital expenditure is very low in most of the states that is the root cause of deficits of health infrastructure and shortfall in health facilities.

The study shows significant variations in the health outcomes across the states. It calls for a decentralized approach to health management based upon a holistic approach and convergence between basic services and health services. Such an approach should rely upon district-level epidemiological surveillance, flexibility in meeting gaps in requirement locally, and greater control over health related decisions and health care institutions by peoples’ committees linked to the representative institutions at the local level. A similar approach was recommended by the Bhore committee and is also the cornerstone of the health care system in the states such of Kerala and Karnataka.

The major findings of the study which came through statistical application show that health spending by government exercises significant
impact on all variables of health outcomes in terms of IMR, PMR, NMR, CMR, MMR and LEB. The results come out statistically more significant at current prices than at constant prices. The results vary significantly from one period to another and from one state to another which implies that government spending does matter but more than this is commitment and appropriate policies, backed by effective implementation which can achieve the desired goals. In the results, values of coefficient of determination (R²) are relatively low. Therefore, a need arises to explore variables other than only public spending on health such as private spending on health, PCGSDP, female literacy, gender empowerment, adequate housing, clean water, sanitation etc. as all these affect health in a significant manner. Policies should be formulated as well as implemented accordingly to achieve health targets.

**Future Direction for Research**

During the process of investigation many areas have emerged of such gravity that they are needed to be intensively explored. As per the limitation of time and to maintain flow of the topic to get fruitful results those aspects have not been dealt with and are noted down for further research. Hopefully, these aspects will contribute significantly in advancement of human development. They can be summarized as follows:

Health account of government consists of many heads and sub-heads. They are assimilated into three major divisions- primary, secondary and tertiary health services. This division is more rational to get impact of health spending on health outcomes. Moreover, the study takes into account only Medical and Public Health and Family Welfare parts of health leaving other important areas of nutrition, water supply and sanitation etc. These aspects also merit an intense exploration.
This study examines only public expenditure on health leaving out private health spending. Results of the study are not very strong as more than 80 percent private sector’s contribution is outside the purview of the study. It is repeatedly cited that public spending is very low in India by international standard and consequently out-of-pocket expenditure comes very high that is regressive in nature.

This study has taken only six states out of 28 states and 7 UTs in India. It covers over 40 percent of total population and almost 30 percent area under Indian Union. 60 percent population and 70 percent area remain to be researched on similar lines.

It would be a more just criterion to examine the allocation pattern on the different segments of society. If the vulnerable and destitute sections of population get the major portion, then it will ensure equity and rapid improvement in human development. In Indian perspective Schedule castes, tribal people and major proportion of Muslim minority constitute the most deprived sections and their entitlements are poor. Their contribution is much higher in our low performance on the front of human development. So the diagnostic test suggests that their problems should be especially and separately searched out for formulating developmental policies.

Health spending should not be based upon the layman criteria of population and administrative unit/area. But it must be based on needs. More backward regions should be allocated more funds to help in removing fiscal constraint. For example, Bundelkhand region of Uttar Pradesh, Telangana region of Andhra Pradesh and Vidarbha region of Maharashtra are comparatively far backward than other parts of the respective states. The Centre has identified 18 less affluent ‘focus states’ for NRHM and 235 less developed districts for special treatment to improve the situation. Problems of desert district of Jaisalmer and hilly area of Gulmarg are much different than
the plain district of Varanasi. It will be more appropriate to conduct a study on these regions which need special attention.

Problems of different age-groups are entirely different from one another. It also differs tremendously by sex. Problems of infants are significantly different from adolescent girls and expectant mothers. Old-age people face different kind of health problems. Hence, to formulate effective policy for human development, they should be studied separately.

Morbidity aspect of health has also not been dealt with. It directly impacts the capacity of workers to function efficiently. Resultant loss in productivity affects the functioning of the whole economy. Besides, it is burdensome for the family who have to spend large sums of money, sometimes without any positive results. It is difficult to get reliable data on this aspect of health. India is in the phase of epidemiological transition and actual situation is not clear due to under reporting. This is another significant area that needs the attention of researchers.