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Access to Health Care and per capita income

Scenarios for the 1.2 billion people living with less than $1.25 per day

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Περίληψη

Το άρθρο αυτό, επιχειρεί να παρουσιάσει τη σχέση που αναπτύσσεται ανάμεσα στο κατά κεφαλήν εισόδημα και την πρόσβαση στην υγειονομική περίθαλψη. Η άποψη ότι όσο μεγαλύτερη η οικονομική επιφάνεια κάποιου, τόσο καλύτερη και η υγεία του, θεωρείται σχεδόν παγιωμένη. Όταν ωστόσο 1 δισεκατομμύριο άνθρωποι στον κόσμο ζουν με λιγότερο από $1 την ημέρα και άλλοι 2 δισεκατομμύρια με λιγότερα από $2 και τα 1.3 δισεκατομμύρια αυτών στερούνται πρόσβασης στην βασική υγειονομική περίθαλψη, σκοπός αυτής της έρευνας είναι να παρουσιάσει κατά πόσο το εισόδημα κάποιου λειτουργεί καθοριστικά στην πρόσβασή του στην υγειονομική περίθαλψη, αν η σχέση αυτή είναι «αναγκαία» ή αναστρέψιμη και ποιοι είναι οι κυριότεροι παράγοντες που την επηρεάζουν.

Η προσέγγιση του παραπάνω θέματος έγινε με βιβλιογραφική ανασκόπηση στις τελευταίες χρονολογικές επιστημονικές αναφορές και παράλληλη μελέτη των παγκόσμιων δεικτών ανάπτυξης υγείας, όπως αυτοί παρουσιάζονται από επίσημους φορείς, όπως ο Παγκόσμιος Οργανισμός Υγείας και η UNICEF.

Το οξύμωρο που εμφανίζεται, είναι οι χώρες ή οι περιοχές μιας χώρας που έχουν τις μεγαλύτερες ανάγκες από υγειονομική κάλυψη, να είναι συνήθως αυτές που τελικά παρουσιάζουν τις μεγαλύτερες ελλείψεις σε δημόσιες υπηρεσίες υγείας. Αλλά και όταν αυτές υφίστανται είναι συνήθως ανεπαρκείς και πολύ χαμηλής ποιότητας. Το θέμα της γεωγραφικής απόστασης ενός πληθυσμού από ένα οργανωμένο σύστημα υγειονομικής περίθαλψης, φαίνεται αξεπέραστο για ένα μεγάλο κομμάτι, ιδιαίτερα του «μη αναπτυγμένου» κόσμου. Οι μεγάλες αποστάσεις, το κακό οδικό δίκτυο και το μεγάλο κόστος της μεταφοράς δεν μπορούν να ξεπεραστούν εύκολα, με αποτέλεσμα να πεθαίνουν 10 εκατ. άνθρωποι το χρόνο από ασθένειες που προλαμβάνονται ή θεραπεύονται.

Όπως λοιπόν προκύπτει από την παρούσα επισκόπηση, κάθε χρόνο 100 εκατομμύρια άνθρωποι στον κόσμο «ολισθαίνουν» στη φτώχια, εξαιτίας εξόδων που αναγκάστηκαν να κάνουν για υγειονομική περίθαλψη και άλλοι 150 εκατ. αναγκάζονται να ξοδέψουν σχεδόν τα μισά από τα εισοδήματά τους

σε ιατρικές δαπάνες. Αυτό συμβαίνει σαν αποτέλεσμα απουσίας υγειονομικής ασφάλειας και αποκλεισμού από την υγειονομική περίθαλψη.

Η έλλειψη πρόσβασης στις υπηρεσίες υγείας παρουσιάζεται όχι μόνο στις λεγόμενες «φτωχές χώρες», αλλά και στις πλούσιες και αναπτυγμένες χώρες και συνοδεύεται συνήθως από μεγάλες κοινωνικό-οικονομικές ανισότητες. Στην Αμερική για παράδειγμα, όπως πολύ καλά γνωρίζουμε, η πρόσβαση στις υπηρεσίες υγείας είναι σημαντικά μειωμένη στα άτομα με χαμηλό εισόδημα, σε σχέση με τον υπόλοιπο πληθυσμό. Αντίθετα η Κούβα, μια χώρα με χαμηλούς δείκτες οικονομικής ανάπτυξης, κατάφερε – στοχεύοντας στην καλή υγεία όλου του πληθυσμού της και ενισχύοντας ιδιαίτερα τον τομέα της πρωτοβάθμιας φροντίδας και της πρόληψης- να ξεπεράσει τη «νομοτελειακή» σχέση μεταξύ εισοδήματος και προσβασιμότητας στην υγειονομική περίθαλψη, γνωστό και ως «το παράδοξο της Κούβας». Έτσι οι δείκτες υγείας στην Κούβα εμφανίζονται συγκρίσιμοι με αυτούς των οικονομικά αναπτυγμένων χωρών.

Η Ινδία, της οποίας τα χαρακτηριστικά μελετήθηκαν περισσότερο στο παρόν άρθρο, είναι σήμερα η δεύτερη ταχύτερα αναπτυσσόμενη οικονομία στον κόσμο, με αύξηση του ΑΕΠ της τάξης του 9.2%, με εκτόξευση του εξωτερικού της εμπορίου και των συναλλαγματικών της αποθεμάτων και παράλληλη μείωση του εξωτερικού της χρέους. Ωστόσο παραμένει η περιοχή με τους περισσότερους φτωχούς πολίτες στον κόσμο, γεγονός που αποδεικνύει ότι η οικονομική ανάπτυξη μιας χώρας δε συνεπάγεται απαραίτητα και τη βελτίωση των συνθηκών διαβίωσης των πολιτών της. Στην Ινδία περισσότερο από το 50% του πληθυσμού της στερείται πρόσβασης στη βασική υγειονομική κάλυψη, ζει χωρίς τις στοιχειώδεις συνθήκες υγιεινής και τα μισά παιδιά κάτω των 5 ετών παρουσιάζουν χαμηλό σωματικό βάρος. Οι ανισότητες, οικονομικές και κοινωνικές, ολοένα και αυξάνουν, με τις μεγαλύτερες να παρατηρούνται ανάμεσα στις αστικές και αγροτικές περιοχές. Μόνο το 15% καλύπτεται από κάποιου είδους ασφάλεια υγείας, συμπεριλαμβανομένης της δημόσιας, γεγονός που λειτουργεί σαν αξεπέραστο εμπόδιο για την πρόσβαση στις ιατρικές υπηρεσίες. Και παρά τις κάποιες προόδους που έγιναν τις τελευταίες δεκαετίες, η Ινδία παραμένει με τα υψηλότερα ποσοστά, παγκόσμια, στους δείκτες νοσηρότητας και θνησιμότητας. Παρόλα αυτά, οι δημόσιες επενδύσεις για την υγεία μειώνονται

και αυτό έχει δραστική αντανάκλαση στα έξοδα που καλείται ο κάθε πολίτης να καλύψει μόνος του για την υγειονομική του περίθαλψη, με αποτέλεσμα ένα μεγάλο ποσοστό ανθρώπων κάθε χρόνο να χάνουν την όποια περιουσία τους και να γίνονται φτωχότεροι.

Οι βασικότερες λοιπόν προκλήσεις που παραμένουν για την Ινδία στον τομέα της υγείας, είναι η αντιμετώπιση της φτώχιας και του υποσιτισμού, η ασφαλιστική κάλυψη του πληθυσμού της και η οργάνωση ενός συστήματος υπηρεσιών υγείας επαρκές και προσβάσιμο σε όλους τους πολίτες της.

Abstract

This paper explores the relationship between per capita income and access to health care. The main objective of this study is to determine whether there is a correlation between these two parameters. As it can be drawn from this research, the relationship between income and health is well established: the higher an individual's income, the better his or her health. Lack of access to health care can be seen not only in so called poor countries, but also in rich and developed countries, where it also co-exist with considerable socio-economic inequities. In particular in India, where this paper tends to focus, although its strong economic growth, has large-scale poverty and yet the main source of financing healthcare is out-of-pocket expenditure. This is a cause of the huge inequities we see in access to healthcare. The economic gains are far from equally distributed, with subsistence level, isolated rural communities and those living in urban slum areas hardly benefiting at all.

Introduction

> *"Our children have dramatically different life chances depending on where they were born. In Japan or Sweden they can expect to live more than 80 years; in Brazil, 72 years; India, 63 years; and in one of several African countries, fewer than 50 years. And within countries, the differences in life chances are dramatic and are seen worldwide. The poorest of the poor have high levels of illness and premature mortality. But poor health is not confined to those worst off. In countries at all levels of income, health and illness follow a social gradient: the lower the socioeconomic position, the worse the health".*
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> (WHO, 2008)

When more than one billion people live on less than $1 per day and 2 billions on less than $2 per day, and while most people agree that the Human Health is determined not only by exposure to microbes and toxins that directly cause illnesses or by systems failures, but also by other biological and social factors (WHO, 2007b) - such as accessibility to Health Care- this article review explores the relationship between income per capita and accessibility

to Health Care and how it affects the population's health. There will be presented the main views and the recent clues about the issue in question through bibliographical survey of the latest chronological reports and also investigation of the most important indicators. As a population of discussion was chosen India, in which 37% of the population (about 410 million people) lies below poverty line, as it was measured by the United Nations Human Development Index. It has also been mentioned that more than one million people die every day due to lack of access to Health Care. Additionally, by choosing India in this survey, it is intended to present the great contradictions that may arise in a country whose economy follows an 8.5 rate of growth (Economist, 2008), while at the same time public expenditure on health lies just on 1.1 and by consequence how that influences the Health indicators of the population.

Inequalities in access to Health Care

The positive correlation between health and income per capita is one of the best- known relationships in international development. Health and poverty are inextricably intertwined (figure 1). Being able to breast-feed, attend school, work to grow food, earn a living or feed a family all depend on a baseline level of good health. Yet, when more than a billion people live on less than $1 per day and 2 billion on less than $2 a day, many have little scope to save against future costs of poor health or even to pay for health services today.

Extreme poverty interacts with health in many ways and undermines a whole range of human capabilities, possibilities and opportunities (Krawinkel, 2005). Evidence from all parts support a link between poverty, hunger and poor child health. Poor child health and hunger lead to poor school performance and therefore to a later inability to find good work and support their future family. Thus, the downward spiral that maintains poverty continuous (Murray, 2006).

Poverty also leads to increased dangers to health: working environments of poorer people often hold more environmental risks for illness

and disability other environmental factors such as lack of access to clean water, disproportionately affect poor families. Over 40% of the world's population does not have basic sanitation and more than 1 billion people still use unsafe sources of drinking water (Millennium Project).

Poor countries or areas often cannot provide adequate preventive and curative health services, and poor individuals and households cannot move from unhealthy surroundings, buy enough food or use the existing services. Poor communities usually do not have the political power needed to get better services. These poor countries also have greater proportions of people living below poverty line and vulnerable to serious health risks. Even in countries now achieving high growth rates and rising out of massive poverty, the economic gains are far from equally distributed, with subsistence level, isolated rural communities and those living in urban slum areas hardly benefiting at all (WHO, 2007b).

While health care can, to some extent, address their greater burden of morbidity, the poor experience systematically lower access to health services than the non poor. When health services are available, the costs of seeking them are often more than poor patients and households can afford, thus causing the poor to delay or disrupt treatment, and often forcing them deeper into poverty.

Each year 100 million people slide into poverty as a result of medical care payments. Another 150 million people are forced to spend nearly half their incomes on medical expenses. That is because in many countries, people have no access to social health protection- affordable health insurance or government- funded health services.

Maternal mortality rates (MMR) mirror the disparities between wealthy and poor countries more than any other measure on health. As an indicator of inequality, it also reflects women's inferior place in society, with respect to household decision-making power, access to social support, economic opportunities and health care. The prenatal health and nutritional status of women and their ability to access obstetrical and other health facilities are determinants of maternal and child mortality. In the least- developed countries, high maternal mortality is related to measures of poor health system repressiveness (George A., Lyer A., Sen G. 2005). The percentage of

births attended by skilled personnel is an indicator of women's access to health services, and is closely associated with low MMR. The very poor populations and those living in rural and remote areas of a country have the worst access.

Paradoxically, people in the world's poorest countries relatively more for health care than those in wealthy industrialized nations. In Germany, for example, where the average GDP per capita is US$32,860 and almost everyone has social health protection, 10% of all medical expenses nationwide are borne by households. In the Democratic Republic of Congo, by contrast, where GDP per capita is only US$120 and where social health protection is scant, about 70% of the money spent on medical care is paid directly by households (WHO, 2005).

At least 1.3 billion people worldwide lack access to the most basic healthcare. Often it is because they cannot afford it. As a result, millions become very sick or die every year from preventable or curable medical conditions. For example, the toll from treatable infections and preventable complications of pregnancy and delivery is more than 10 million deaths each year.

Typically, health services are scarce in the areas where poor people live, forcing them to travel long distances to seek care. Poor roads and high transport costs can make this difficult, expensive and time-consuming. Particularly in rural areas, people stress the difficulty of handling emergencies and lack of local health centres.

Having to pay for medical treatment can cause a farmer to lose his herd or a family to lose its business, as was recently the case for Amos and Gloria Chinwuba. The Chinwubas and their five children used to live comfortably in Abakpa, Kenya from the earnings of a small building supply shop they owned. When Gloria needed an emergency caesarean section they were suddenly faced with medical bills of US$200 more than their usual earnings for a four month period. Unable to pay the entire bill, Amos had to give his motorbike as a safety deposit to the hospital. Without it, he was unable to collect material from the wholesaler, and his business came to standstill. He had to pull the children out of school, because there was no money to pay for fees and uniforms and the family is now subsisting on one

meal a day (WHO, 2002). The World Health Organization (WHO) estimates that more than 150 million people worldwide suffer financial ruin every year, from unexpected emergency care.

Untreated sickness among poor people is recorded not only in countries with serious economic difficulties, but also in those with high and stable economic growth. A novel hypothesis suggests that the extent of income inequality in society determines its average health status: the greater the gap between the incomes of the rich and poor, the worse the health status of citizens (Wilkinson 1996). For example, access to essential health services in rural China was renowned, but has been drastically reduced despite a yearly economic growth rate of almost 10% in the past two decades. In household surveys in rural China, 35-40% of people who reported that they had had an illness did not seek health care, with financial difficulties cited by poor people as main reason. Additionally, 60% of those referred to hospital by a doctor never contacted the hospital because they knew they could not afford to pay the high user charges. Costs to individuals and society from untreated morbidity are potentially devastating (Margaret Whitehead, 2001).

The health systems of some countries, rich and poor alike are fragmented and inefficient, leaving many population groups underserved and often without health care access entirely. Even in countries as United States of America, we know that access to medical care for low-income persons is considerably less, on average, than for the rest of the population (Andersen, 2001). Numerous investigations have noted large inequities in access for low-income and minority populations regarding lack of health insurance coverage, lack of access to a regular source of care, gaps in receipt of preventive care, delays in obtaining needed care, and higher rates of morbidity, hospitalization, and mortality that could have been avoided with appropriate access to care (Institute of Medicine [IOM] 1993; Centre for Health Economics Research 1993; Commonwealth Fund 1995; Collins, Hall, and Nebus 1999; Mayberry et al. 1999; Brown, Ojeda, et al. 2000). (University of California et al., 2002)

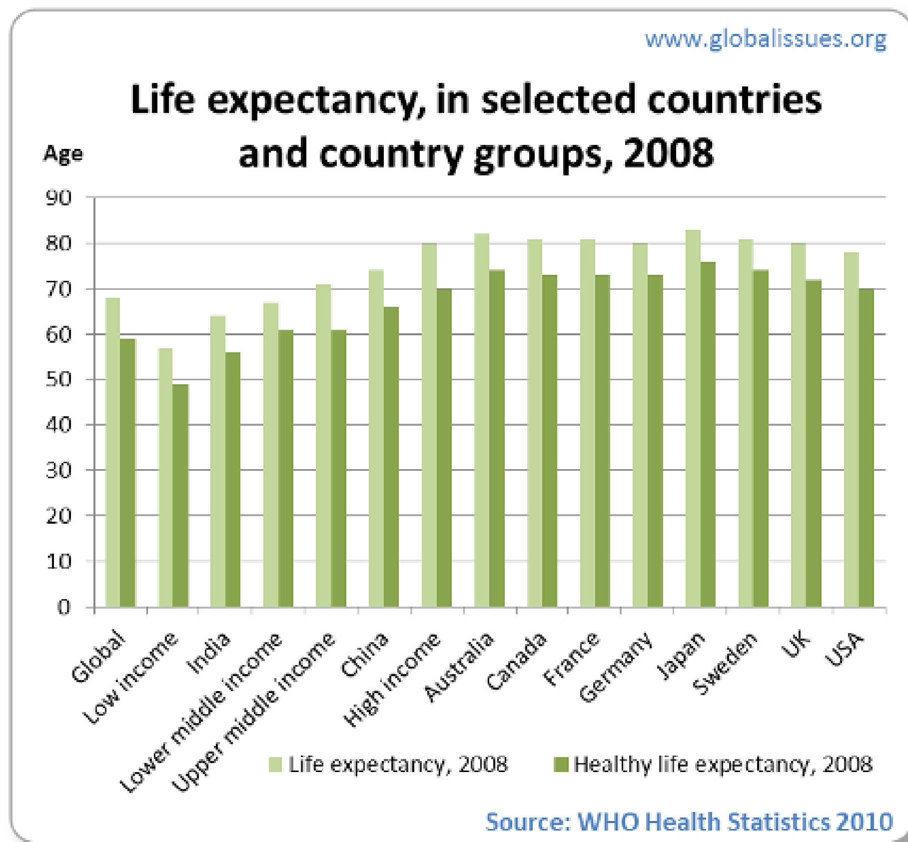


Figure 1.

Predictably, wealthier nations have better life expectancy (Shah, 2011)

The Cuban Paradox

Cuba is an example worth mentioning that is how a country with low income per capita, has managed to ensure access to high quality health care services for the whole of the population. Although economic productivity is an important determinant of population health, Cuba does not conform to the expected relationship (Richard S Cooper, 2006). Cuba has achieved and sustained health indices comparable to those in development countries- the Cuban paradox (Spiegel, 2006). This happened because the government invested, taking into consideration the benefit of the population's health, through a simple but fundamental decision, making healthcare one of the highest priorities of the society and the economy. It is important to note that the expenditure on Public Health of GDP is 9.9%. In this direction they

emphasized on primary care and preventive care, addressing diseases and health problems, before they establish themselves and become major problems. Despite a 50-year trade embargo by the United States and the post-Soviet collapse in international support, the impoverished nation has developed a world class health care system. Average life expectancy is 77,5 years, compared to that of 78,1 years in the United States and infant mortality is 7,2 per 1000 live births. Cuba is now among the top 25 countries, having the lowest infant mortality worldwide.

The world in poverty

The most dire conditions exist in Sub-Saharan Africa. After a quarter – century (1981-2005) that witnessed the most extraordinary advances in technology, the percentage of people living in absolute poverty in that region remained unchanged. Some 50 percent of its population subsists on $1.25 a day or less (WHO, 2007a).

The actual number of the extremely poor in Sub-Saharan Africa almost doubled, from 200 million in 1981 to about 380 in 2005. *"If the trend continuous,"* notes a World Bank press release*, "a third of the world's poor will live in Africa by 2015*". Average consumption among poor people in Sub-Saharan Africa stood at a meager 70 cents a day in 2005 (Chen and Revallion, 2008).

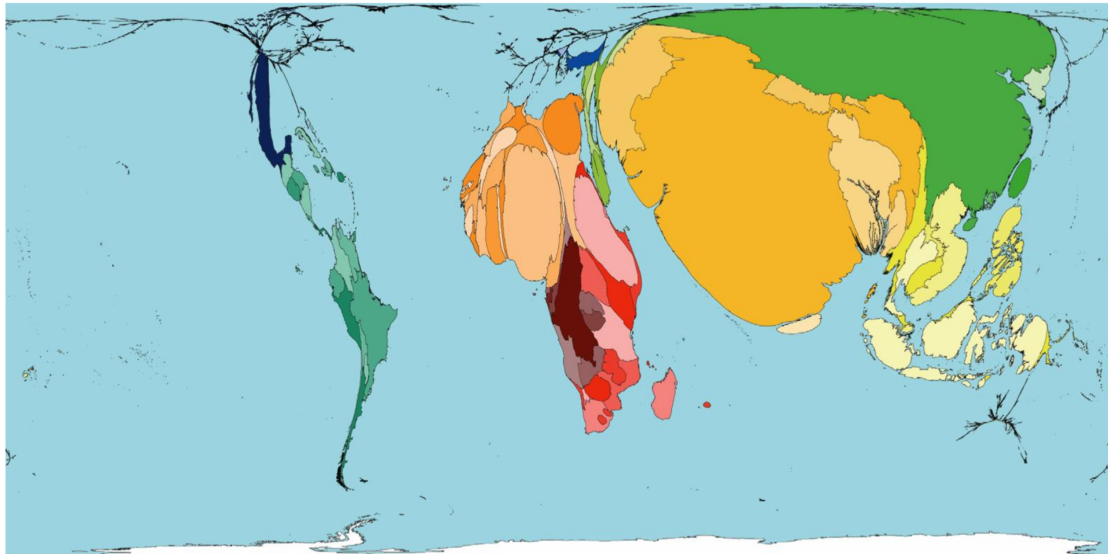
Most of the poorest countries in the world-Malawi, Ethiopia, Sierra Leone, Niger, Uganda, Gambia, Rwanda, Guinea-Bissau, Tanzania, Tajikistan, Mozambique, Chad, Nepal and Ghana-are located in Africa.

In south Asia, the percentage of those living below the $1.25 poverty rate has decreased from 60 to 40 percent over 1981-2005, but the absolute number of desperately poor people did not decline. There are some 600million in that category. In India, extremely uneven economic development reduced the poverty rate as a share of the total population from 60 percent in 1981 to 42 percent in 2005, but the number of the destitute increased from 420 million in 1981 to 455 million in 2005 (Walsh, 2008).

The largest factor in lowering the percentage of extremely poor people in East Asia has been the explosive industrialization of China. In 1981 East

Asia was the poorest region in the world. In China the number of people surviving on less than $1.25 a day in 2005 prices dropped from 835 million in 1981 to 207 million in 2005.

The poverty rate in Latin America and the Caribbean has also declined, but not enough to bring down the number of extremely poor people.



(Worldmaper, 2004)

The world in poverty

The world's children in numbers

Hundreds of studies have documented the association between family income and children's health. What does poverty means for children? How does the relative lack of income influence children's day-to-day lives? According to UNICEF (UNICEF, 2010) 2.5 million people lack access to improved sanitation and 101 million children are not attending primary school, with more girls than boys missing out. Poor children experience increased rates of low birth weight and elevated blood lead levels when compared with non poor children (148 million under 5s in developing region are underweight for their age). These conditions have, in turn been associated with reduced IQ and other measures of cognitive functioning in young children (Duncan, 1997). All over the world, 22 million children are not protected from diseases

by routine immunization and the number of children died worldwide before their 5th birthday was 8 million in 2009. As a result of lack of access to health care, 500.000 women die each year from causes related to pregnancy and childbirth and 4 million newborns worldwide are dying in the first month of life. Finally, AIDS is also a “children’s issue” with 2 million of them under 15 living with HIV.

Access to health care in India

In the past decade, India has witnessed accelerated economic growth, progress on most of the Millennium Development Goals, and has emerged as a goal player with the world’s fourth largest economy in purchasing power parity terms. However, poverty continuous to remain a major challenge (WorldBank, 2007). According to the newly revised poverty line, 37 percent of India’s population (about 410 million people) falls below the poverty line, making the country home to one-third of the world’s poor. And, although the impressive economic growth has brought significant economic as well as social benefits to the country, disparities in income and human development are on rise.

“The period since the neo-liberal economic reforms were introduced in India has been one of dramatically increased income inequality. The most dramatic and remarkable improvement in consumption has been of those who were already the richest people in India ‘that is, the top 20% of the urban population”, as Jayati Ghosh, economist and chairperson of the State Commission on Welfare of Farmers points out in “Income Inequality in India” (2004).

The growth of India’s economy during the past decade has had little effect on public health. Even in affluent states, the percentage of underweight children younger than 3 years has risen over the past 10 years. Despite having an economy growing at nearly 10% a year, widespread malnutrition, and its associated health problems, such as anaemia, remain one of India’s formidable challenges. The comment stemmed form India’s 2005-06 National Family Health Survey (NFHS), reveals that almost half of Indian children younger than 3 years are underweight (Chatterjee, 2007).

"Inequality in India has grown faster in the last 10-12 years than in any other time in our history since the colonial raj", P. Sainath, senior journalist and Rural Affairs Editor at The Hindu, says. The evidence is especially stark in such areas as health. In 2003, a national newspaper reported the deaths due to malnutrition-related causes, of over 9000 children below the age of 6. This was in 15 largely advise-populated districts of Maharashtra, just a few kilometres from super-specialty private hospitals in Mumbai (Nigam, 2005).

All over the country people are dying of diseases that should not kill them. For instance, 199 per 100000 people in India still die of tuberculosis every year (UNDP). And it is not specialised care they need, but basic preventive care. Instead, the Government of India reduced its expenditure on the children's nutrition programme from Rs 79.2 million to Rs77.7 million in the 2003 budget (Ramachandran, 2002). Government expenditure on health as a percentage of Gross Domestic Product (GDP) declined from 1.3 in 1990, to 0.6 in 2002. This is well below the 5% of GDP recommended by the World Health Organisation. While the budgetary allocation in the health sector by the central government over the last decade has been stagnant, in the states it has declined from 7% to 5.5% (Draft National Health Policy, 2001).

In India less than 50% of the population has access to essential drugs, only 31% has adequate sanitation facilities, 47% of children below the age of 5 are underweight and only 42% of births are attended to by skilled health staff. More than a million people Indians die every year due to lack of healthcare access, most of them being women and children. Some 700 million Indians in the villages and not urban-areas don't have access to healthcare facilities because around 80% of the specialists and medical facilities are located in urban-areas. So, even when the medical services are available free, the poor lack the meager resources to travel to the nearest government-supported Health Centre located kilometres away from their village. In additional, these Health Centres are often under-equipped and under-staffed. In short, public health care expenditure does not mach people's health demands (UNDP, 2002). Unfortunately, less than 15% of the Indian population is covered under some form of health insurance, including government-supported schemes. Only around 2.2% of the population is

covered under private health insurance, of which rural health insurance penetration is less than 10% (PricewaterhouseCoopers, March 2011).

According to other recent estimates, there are only 4.48 hospitals, 6.16 dispensaries and 308 beds for every 100.000 of India's urban population. In rural areas, the situation is worse, with 0.77 hospitals, 1.37 dispensaries, 3.2 Public Health Centres and just 44 beds for every 100.000 people. In 1997 an estimated 68% of the hospitals, 56% of dispensaries, 37% beds and 75% of allopathic doctors were in private sector(Ravi, 2002)

Despite this dismal picture, today, in the name of pectoral reforms, many public health services are no longer provided free of cost. The citizens Report on Governance and Development 2003, Social Watch India, says, *"The level of public expenditure in the health sector is the lowest in the world…(less than in Pakistan, Bangladesh, Sri Lanka). Of the aggregate expenditure on health, 83% is allocated to private spending while 43% of the poor depend on public sector hospitals for care. Privatization and deregulation of the health system have resulted in rising drug prices. [The] New National Health Policy 2002 legitimizes the ongoing privatization of health."*

The healthcare scenario in India

The healthcare sector has made some advances in the past few decades. From 80 deaths per 1,000 live births in 1990, infant mortality went down to 50 in 2009. Maternal mortality fell to 230 in 2008 from 570 deaths per 100,000 in 1990 . Life expectancy almost doubled to 63.5 years in 2006 from less than 32 years in 1946. Despite the progress, India's morbidity and mortality rates are still higher than the global average, indicating there is substantial ground still to be covered (Devraj, 2010). Communicable diseases not only continue to be the single largest cause of mortality but prevalence of many diseases like tuberculosis and malaria has increased and diseases like AIDS, leptospirosis, dengue etc. have got added to the list.

Public investment in the health sector has declined and this is reflected in drastically reduced capital expenditures and no further expansion in the public health infrastructure. In addition, revenue expenditures on health have

declined both as a proportion to the GDP as well as a percentage of total public spending, and within this reduced expenditure allocation inefficiencies have increased (Gangolli et al., 2005).

Moreover, the discrepancy between rural and urban indicators of healthcare and the wide interregional disparities in health status are evident upfront. These rural-urban healthcare indicator differentials are substantial across all the age groups. Apart from the above shortcomings, the basic requirements for good health such as clean drinking water, proper sanitation facilities and wholesome daily nutrition also need to be addressed urgently.

Such a scenario is bound to impact on costs and increase the burden on the patients. Such a situation is not good for 70 per cent of the country's population that lives in poverty or at subsistence level.

Conclusion

> *"Inequalities in health between and within countries are avoidable. There is no necessary biological reason why life expectancy should be 48 years longer in Japan than in Sierra Leone or 20 years shorter in Australian Aboriginal and Torres Strait Islander peoples than in other Australians. Reducing these social inequalities in health, and thus meeting human needs, is an issue of social justice".*
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> (Marmot, 2005)

As it results from this research, accessibility to Health Care is closely related to per capita income, especially in countries which lack both an organized health system and public health insurance. Those were some of the basic facts that Cuba comprised into its program for health, in order to develop- despite the financial difficulties- a Health system addressing the whole population, surpassing the established correlation between per capita income and the access to Health Care. However, in a worldwide level, 1.3 billion people remain without access to Health Care because in most cases they cannot afford the cost of it. As a result, millions of people every year get sick or even worse die from preventable or curable medical conditions. As far

as India is concerned, that was used as a country of discussion in this survey, despite its intense financial growth that can be noticed the last few years (with a rate of growth approaching nearly 8.5), it keeps on having 37% of its population falling below poverty line and 50% of it lacking the possibility of access to Health Care. As the World Health Organization's indicators show public health is affected by this fact, since the life expectancy is 64.4 years and the under five mortality is 69 per 1000 live births. Even though the last decades progress has been made in relation to the control of some diseases like malaria, the indicators of sickliness and mortality in India remain higher than the worldwide average. In fact, the greatest challenge still remaining in India is eradicating extreme poverty and hunger and the creating opportunities of access to a well organized Health Care system to every single citizen.

References

ANDERSEN, R. M., AND P. L. DAVIDSON. 2001. *Improving access to care in America: Individual and contextual indicators.,* San Francisco:Jossey-Bass.

CHATTERJEE, P. 2007. child malnutrition rises in India despite economic boom. *The Lancet,* 369**,** 1417-1418.

CHEN, S. & REVALLION, M. 2008. *The developing world is poorer than we thought, but no less successful in the fight against poverty.* development research group, World Bank.

DEVRAJ, R. 2010. Health-India:Hunger Haunts Hospitals. Available: www.globalissuess.org/news/2010/01/02/4096 [Accessed 29 May].

DUNCAN, J. B.-G. G. J. 1997. The effects of poverty on children. *The future of children.* Princeton Univercity.

ECONOMIST, T. 2008. India's Economy. *The Economist*.

GANGOLLI, L. V., DUGGAL, R. & SHUKLA, A. 2005. *Review of Healthcare in I ndia,* Mumbai, Cehat org.

GHOSH, J. 2004. Income Inequality In India. Available: www.countercurrents.org/eco-ghosh170204.htm [Accessed 16 May].

KRAWINKEL, O. M. A. M. 2005. Malnutrition and health in developing countries *CMAJ* 173**,** 279-86.

MARGARET WHITEHEAD, G. D., TIMOTHY EVANS 2001. Equity and health sector reforms: can low-income countries escape the medical poverty trap? *The Lancet,* 358**,** 834.

MARMOT, M. 2005. Social determinants of health inequalities. *Lancet,* 365.

MURRAY, S. 2006. poverty and health. *canadianmedicaljournal.ca,* 174.

NIGAM, R. 2005. Inequality in India: Income, access to healthcare and education for the poor. [Accessed May 27].

PRICEWATERHOUSECOOPERS. March 2011. Health Insurance and Healthcare Access
Available: www.pwc.com/india [Accessed may 22].
RAMACHANDRAN 2002. Unhealthy Policy. *Frontline.* The Hindu.
RAVI, D. (ed.) 2002. *Right to Health*: Cehat.org.
RICHARD S COOPER, J. F. K., AND PEDRO ORDUN˜ EZ-GARCIA 2006. Health in Cuba. *International Journal of Epidemiology35,* 35**,** 817.
SHAH, A. 2011. Health Care around the world. Available: www.globalissues.org [Accessed may 12].
SPIEGEL, J. M. Y., ANNALEE 2006. Lessons from the margins of globalization: appreciating the Cuban health paradox *Journal of Public Health Policy,* Volume 25**,** 86.
UNDP 2002. Human Development Report. *UNDP INDIA*.
UNICEF 2010. unicef humanitarian action. unicef.
UNIVERSITY OF CALIFORNIA, R. M. A., YU, H., WYN, R., DAVIDSON, P. L., BROWN, E. R. & TELEKI, S. 2002. Access to Medical Care for Low-Income Persons: How Do Communities Make a Difference? *Medical Care Research and Review.* Sage Publications.
WALSH, D. 2008. World Bank : Two and a half billion people live on less than $2 a day. Available: http://www.wsws.org/articles/2008/sep2008/pove-s02.shtml [Accessed 2 September].
WHO. 2002. Dying for change - poor people's experience of health and ill-health. Available: http://www.who.int/hdp/publications/dying_change.pdf [Accessed 12 May].
WHO. 2005. Medical costs push millions of people into poverty across the globe. Available: http://www.who.int [Accessed 5 December].
WHO 2007a. Poverty gap at $1.25 a day.
WHO 2007b. Social Determinants of health 2. *In:* HEALTH, C. O. S. D. O. (ed.). Geneva: WHO.
WHO 2008. Closing the gap in a generation. *Commision on Social Determinants of Health.*
WORLDBANK. 2007. challenges and World Bank support for India's health sector. Available: http://www.worldbank.org.in/WBSITE/EXTERNAL/COUNTRIES/SOUTHASIAEXT/INDIAEXTN/0 [Accessed 27 May].
WORLDMAPER. 2004. *absolute poverty* [Online]. Available: www.worldmapper.org/display.php?selected=180# [Accessed 4 June].